

# APPENDIX E: LABORATORY FORM 1S

---

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 17-Apr-2005 Time: 17:24:00

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-11R

Sample Size: 2.39 g (wet)

Initial Calibration Date: 09-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_194A S:9

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_194 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	23.7	5.59	3.37	1.000
3 - MoCB	2		UD		6.06		
4 - MoCB	3		UD		6.45		
2,2' - DiCB	4		D B	1700	27.8	1.59	1.001
2,3 - DiCB	5		D J	20.3	16.9	1.57	1.193
2,3' - DiCB	6		D	3240	16.3	1.56	1.172
2,4 - DiCB	7		D	76.1	16.0	1.51	1.152
2,4' - DiCB	8		D B	2520	15.5	1.48	1.204
2,5 - DiCB	9		D	222	16.0	1.49	1.141
2,6 - DiCB	10		D	80.7	16.9	1.66	1.012
3,3' - DiCB	11		D JB	31.7	17.7	1.37	0.968
3,4 - DiCB	12	12 + 13	C D B	89.0	17.4	1.46	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		16.7		
4,4' - DiCB	15		D B	1320	19.4	1.50	1.002
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD1\_1.xls. S3

Approved by: Mawthorne QA/QC Chemist

0051

25-05-2005  
dd-mm-yyyy



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	CX				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	CX				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	CX				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	CX				
2,2',3,6 - TeCB	45	45 + 51	CX				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	CX				
2,2',4,6 - TeCB	50	50 + 53	CX				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	CX				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	CX				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

*JK*

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4,5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5,6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C X				
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		X				
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111		X				
2,3,3',5,6 - PeCB	112		X				
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		X				
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5',6 - PeCB	121		X				
2',3,3',4,5 - PeCB	122		X				
2',3,4,4',5 - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C X				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6 - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6 - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5 - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6 - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6 - HxCB	147	147 + 149	C X				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 155	C X				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C X				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C X				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2',3,4',5,6,6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				

15449AD1\_1.xls S3

Approved by

QA/QC Chemist

25-05-2005  
aa-mm-yyyy

C055

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',6,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener, U = not detected, K = peak detected but did not meet quantification criteria, result reported represents the estimated maximum possible concentration, E = exceeds calibrated linear range see dilution data, D = dilution data, Z = compound not requested, J = concentration less than LMCL, B = analyte found in sample and the associated blank, X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation




Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID  
LDW-T2-E-SS-WB-comp-1

Lab Name	AXYS ANALYTICAL SERVICES	Sample Collection	00-Aug-2004
Contract No.	4033	Project No.	04-08-06-22
Matrix	TISSUE	Lab Sample ID	L7311-11R W2
Sample Receipt Date	26-Oct-2004	Sample Size	2.39 g (wet)
Extraction Date	06-Apr-2005	Initial Calibration Date	19-Apr-2005
Analysis Date	04-May-2005	Instrument ID	HR GC/MS
	Time: 6.46.35	GC Column ID	SPB-OCTYL
Extract Volume (µL)	4000	Sample Data Filename	PB5C_226 S-10
Injection Volume (µL)	10	Blank Data Filename	PB5C_256 S-5
Dilution Factor	200	Cal. Ver. Data Filename	PB5C_226 S-1
Concentration Units	ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15449AD6\_1.xls S2

Approved by

*M. H. H. H.*

QA/QC Chemist

25-05-2005  
aa-mm-yyyy

0059

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						

*WTL*

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4,6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5' - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6' - TeCB	69	49 + 69					
2,3',4',5' - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6' - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6' - TeCB	73						
2,4,4',5' - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6' - TeCB	75	50 + 62 + 75					
2',3,4,5' - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5' - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5' - TeCB	81						
2,2',3,3',4' - PeCB	82						
2,2',3,3',5' - PeCB	83	83 + 99					
2,2',3,3',6' - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5' - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6' - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5' - PeCB	90	90 + 101 + 113	C D B	686000	100	1.57	0.870
2,2',3,4',6' - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6' - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6' - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5' - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6' - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5' - PeCB	99	83 + 99					
2,2',4,4',6' - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6' - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5' - PeCB	106						

15449AD6\_1.xls S2

Approved by

QA/QC Chemist

0061

25-05-2006  
dd-mm-yyyy



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125					
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	906000	85.6	1.57	0.926
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D R	812000	282	1.64	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125					
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125					
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163					
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163					
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6 - HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149					

15449AD6\_1.xls S2

Approved by

QA/QC Chemist

0062

25-05-2005  
dd-mm-yyyy

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168					
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163					
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163					
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168					
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193					
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187						
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						

15449AD6\_1.xls S2

Approved by

QA/QC Chemist

0063

24-05-2005  
dd-mm-yyyy

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193					
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6' - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener. U = not detected. K = peak detected, but did not meet quantification criteria. result reported represents the estimated maximum possible concentration. E = exceeds calibrated linear range see dilution data. D = dilution data. Z = compound not requested. J = concentration less than LMCL. B = analyte found in sample and the associated blank. X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation

15449AD6\_1.xls S2

Approved by

QA/QC Chemist

25-05-2005  
10-mm-yyyy

0064

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID  
 LDW-T2-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No. 403

Matrix: TSS/E

Sample Receipt Date: 26-Apr-2005

Extraction Date: 06-Apr-2005

Analysis Date: 18-May-2005 Time: 17:23:44

Extract Volume (µL): 400

Injection Volume (µL): 1

Dilution Factor: 21

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 13-Apr-2004  
 Project No.: 14-06-06-22  
 Lab Sample ID: 17311 11R M  
 Sample Size: 2.3g (wet)  
 Initial Calibration Date: 21-Apr-2005  
 Instrument ID: HR GC/MS  
 GC Column ID: SPB-OCTYL  
 Sample Data Filename: PB5C\_255 S 10  
 Blank Data Filename: PB6C\_256 S 6  
 Cal Ver Data Filename: PB5C\_255 S 1

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	389	17.0	1.15	1.164
2,2',4 - TriCB	17		D B	7640	14.1	1.02	1.136
2,2',5 - TriCB	18	15 + 30	C D B	24900	11.6	1.04	1.112
2,2',6 - TriCB	19		D	2330	16.5	1.11	1.001
2,3,3' - TriCB	20	20 + 26	C D B	75100	15.0	1.02	0.849

15449AD9, 1 416 31

*Paul How*  
 ANALYST / QA/QC Chemist

23-05-2005  
 00:00:00

0067

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	1910	15.5	1.02	0.858
2,3,4' - TriCB	22		D	4730	16.5	1.03	0.872
2,3,5 - TriCB	23		UD		16.4		
2,3,6 - TriCB	24		D	155	10.2	1.00	1.158
2,3',4 - TriCB	25		D	55000	14.0	1.04	0.826
2,3',5 - TriCB	26	26 + 29	C D B	151000	15.8	1.03	1.299
2,3',6 - TriCB	27		D B	3390	9.75	1.04	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	55100	14.9	1.03	0.838
2,4',6 - TriCB	32		D B	9340	15.0	1.03	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	681	16.0	1.01	1.272
3,3',4 - TriCB	35		UD		17.4		
3,3',5 - TriCB	36		UD		15.6		
3,4,4' - TriCB	37		D B	6560	16.7	1.02	1.001
3,4,5 - TriCB	38		KD	223	16.3	0.82	0.969
3,4',5 - TriCB	39		D	183	15.3	1.01	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	32600	12.9	0.78	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	27900	13.6	0.77	1.310
2,2',3,5 - TeCB	43		D	1890	15.0	0.79	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	328000	11.7	0.78	1.284
2,2',3,6 - TeCB	45	45 + 51	C D	9600	12.5	0.77	1.147
2,2',3,6' - TeCB	46		D	3830	14.8	0.76	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	4650	12.5	0.77	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	396000	11.0	0.79	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	23000	12.2	0.78	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	770000	12.2	0.79	1.233
2,2',5,6' - TeCB	53	50 + 53	C60				
2,2',6,6' - TeCB	54		D	151	9.83	0.77	1.001
2,3,3',4 - TeCB	55		UD		54.9		
2,3,3',4' - TeCB	56		D	15800	54.0	0.77	0.906
2,3,3',5 - TeCB	57		D	11500	52.2	0.77	0.845
2,3,3',5' - TeCB	58		D	2700	51.0	0.76	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	20500	9.83	0.78	1.301
2,3,4,4' - TeCB	60		D	10300	54.0	0.76	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	335000	60.2	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	13500	49.5	0.78	0.866

15448ADH - 1 vs. SH

Approved By: 

QA/QC Chemist

0068

25-11-2005  
dg-mm-vvv

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4,6 - TeCB	64		D B	55900	9.85	0.78	1.346
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3,4,4' - TeCB	66		D B	217000	49.6	0.77	0.885
2,3,4,5 - TeCB	67		D	9160	46.6	0.76	0.857
2,3,4,5' - TeCB	68		D	12700	47.7	0.76	0.832
2,3,4,6 - TeCB	69	44 + 69	C49				
2,3,4,5' - TeCB	70	61 + 70 + 74 + 76	C61				
2,3,4,6 - TeCB	71	40 + 41 + 71	C40				
2,3,5,5' - TeCB	72		D	21100	48.6	0.77	0.823
2,3,5,6 - TeCB	73		D	1010	9.26	0.79	1.240
2,4,4,5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4,6 - TeCB	75	59 + 62 + 75	C59				
2,3,4,6 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3,4,4' - TeCB	77						
3,3,4,5 - TeCB	78		UD		55.7		
3,3,4,5' - TeCB	79		D	9580	46.7	0.73	0.971
3,3,5,5' - TeCB	80		UD		49.4		
3,4,4,5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	14700	25.5	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	686000	22.5	1.57	0.886
2,2',3,3',6 - PeCB	84		D	155000	25.2	1.57	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	80800	19.1	1.56	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	423000	19.4	1.56	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	105000	21.6	1.57	1.153
2,2',3,4,6' - PeCB	89		D	1680	23.2	1.56	1.181
2,2',3,4,5 - PeCB	90	90 + 101 + 113					
2,2',3,4,6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	241000	22.5	1.57	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	705000	20.8	1.57	1.119
2,2',3,5,6' - PeCB	94		D	2090	22.4	1.64	1.101
2,2',3,5,6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	2510	7.20	1.55	1.015
2,2',3,4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4,5 - PeCB	99	83 + 99	C83				
2,2',4,4,6 - PeCB	100	63 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113					
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,6 - PeCB	103		D	13500	19.4	1.57	1.002
2,2',4,6,6 - PeCB	104		D	730	7.92	1.60	1.001
2,3,3',4,4' - PeCB	105		D B	195000	77.6	1.54	1.001
2,3,3',4,5 - PeCB	106		JD		77.6		

10448ADU, 10/05/05

Method: EPA 8210

JAC Chemist

0069

25-05-2005  
08:00:00

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG†	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	19000	76.6	1.52	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	80300	71.7	1.53	0.997
2,3,3',4',6 - PeCB	110	110 + 115					
2,3,3',5,5' - PeCB	111		D	1310	16.7	1.65	0.946
2,3,3',5,6 - PeCB	112		UD		17.0		
2,3,3',5',6 - PeCB	113	90 + 101 + 113					
2,3,4,4',5 - PeCB	114		D	11400	77.3	1.56	1.000
2,3,4,4',6 - PeCB	115	115 + 115					
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118						
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	8780	16.4	1.62	0.958
2,3',4,5',6 - PeCB	121		D	275	16.3	1.65	1.198
2',3,3',4,5 - PeCB	122		D	3650	81.7	1.53	1.010
2',3,4,4',5 - PeCB	123		D	7750	82.5	1.60	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127		D	1550	76.6	1.46	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	124000	48.5	1.26	0.956
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	854000	47.9	1.25	0.929
2,2',3,3',4,5' - HxCB	130		D	56100	60.6	1.25	0.914
2,2',3,3',4,6 - HxCB	131		D	6270	55.6	1.27	1.166
2,2',3,3',4,6' - HxCB	132		D	209000	57.1	1.26	1.173
2,2',3,3',5,5' - HxCB	133		D	15000	55.1	1.26	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	44500	56.2	1.26	1.139
2,2',3,3',5,6' - HxCB	135	135 + 161 + 154	C D	202000	11.6	1.26	1.103
2,2',3,3',6,6' - HxCB	136		D B	73800	8.80	1.26	1.024
2,2',3,4,4',5 - HxCB	137		D	47800	55.1	1.24	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	17600	50.6	1.28	1.151
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	89900	53.8	1.25	0.904
2,2',3,4,5,6 - HxCB	142		UD		58.3		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		D	20300	11.9	1.26	1.121
2,2',3,4,6,6' - HxCB	145		D	224	9.07	1.26	1.033
2,2',3,4',5,5' - HxCB	146		D	139000	51.6	1.26	0.885
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	115000	49.9	1.25	1.132
2,2',3,4',5,6' - HxCB	148		D	1380	12.1	1.28	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

*AK*

15449ADH, v. 56

APL-000000

QA/QC Chemist

04-08-06-22  
 00-00-00-00

0070

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	988	8.65	1.32	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	639	8.40	1.17	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	710000	43.0	1.25	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	21.1	8.45	1.41	1.000
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	108000	49.5	1.25	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	81200	39.2	1.25	0.938
2,3,3',4,5,5' - HxCB	159		D	1740	41.1	1.20	0.982
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5,6' - HxCB	161		UD		39.9		
2,3,3',4',5,5' - HxCB	162		D	3670	40.8	1.13	0.980
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	48300	41.8	1.27	0.922
2,3,3',5,5',6 - HxCB	165		D	350	44.3	1.29	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	34900	39.3	1.25	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	96300	13.9	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	29600	13.8	1.03	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	14300	13.9	1.03	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	38700	12.5	1.04	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	3330	12.2	1.03	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	7260	9.23	1.03	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	49800	13.5	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		D	15800	12.6	1.04	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	23600	8.94	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 183	C D	175000	11.2	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	2070	12.6	1.02	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	825	12.4	1.14	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	55200	12.1	1.05	1.126
2,2',3,4,4',6,6' - HpCB	184		D B	86.9	8.61	1.11	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		9.39		
2,2',3,4',5,5',6 - HpCB	187		D B	93700	11.5	1.04	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	142	8.89	1.07	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	3970	24.9	1.02	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	18600	10.4	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	3850	10.5	1.08	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		10.7		



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	190	181 + 190	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	16700	7.43	0.91	1.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	7060	8.31	0.90	1.946
2,2',3,3',4,4',5,6' - OcCB	196		D	9790	7.612	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	1810	0.456	0.92	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	14900	0.619	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	2310	0.456	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	3690	0.502	0.94	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	12200	0.564	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D B	12.6	0.166	0.99	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	845	6.10	0.86	1.001
2,2',3,3',4,4',5,5',6 - NoCB	206		D	2950	18.4	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	394	15.3	0.76	1.019
2,2',3,3',4,5,5',6,6' - NoCB	208		D	591	16.5	0.84	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	221	0.391	0.70	1.001

(1) C = co-eluting congeners; U = not detected; \* = peak detected but did not meet quantification criteria; result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range; see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-11R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.39 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	04-Apr-2005
Analysis Date: 15-Apr-2005	Instrument ID:	HR GC/MS
Time: 14:15:04	GC Column ID:	DB-1
Extract Volume (µL): 20	Sample Datafile:	DT53_107A S: 5
Injection Volume (µL): 2.0	Blank Data Filename:	DT53_107A S: 4
Dilution Factor: N/A	Cal. Ver. Data Filename:	DT53_107A S: 1
Concentration Units: ng/kg (wet weight basis)		

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			5940	0.740	0.79	1.001
3,4,4',5 - TeCB	81			187	0.765	0.75	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			370	76.8	1.49	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		9.98		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected, K = peak detected but did not meet quantification criteria, result reported represents the estimated maximum possible concentration, E = exceeds calibrated linear range, see dilution data, D = dilution data, Z = compound not requested, J = concentration less than LMCL, B = analyte found in sample and the associated blank, X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation

15445cAD1

Approved by

*Trill Howard*

QA/QC Chemist

26-05-2005  
 20:00:00

0075

Form 1A  
 HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 17-Apr-2005 Time: 17 24 00

Extract Volume (µL): 400

Injection Volume (µL): 10

Dilution Factor: 20

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-11R

Sample Size: 2.39 g (wet)

Initial Calibration Date: 09-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_194 S:1

Sample Datafile(s):  
 PB5C\_255 S:10  
 PB5C\_226 S:10  
 PB5C\_194A S:9  
 DT53\_107A S:5

PCB HOMOLOGUE GROUP	LAB FI AG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		23.7	6.45
Total Dichloro Biphenyls		9300	27.8
Total Trichloro Biphenyls		399000	17.4
Total Tetrachloro Biphenyls		2350000	0.765
Total Pentachloro Biphenyls		5360000	76.8
Total Hexachloro Biphenyls		3400000	9.98
Total Heptachloro Biphenyls		633000	24.9
Total Octachloro Biphenyls		68500	8.31
Total Nonachloro Biphenyls		3940	18.4
Decachloro Biphenyl		221	0.391
TOTAL PCBs		12200000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
 Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

16448PCBTOTAL

Approved by

*Gaucho*

QA/QC Chemist

26-05-2005  
 dd-mm-yy

0077

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

CLIENT ID  
 LDW-T2-E-SS-WB-comp-1

Lab Name: **AXYS ANALYTICAL SERVICES**

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No. 04-08-06-22

Matrix: TISSUE

Lab Sample ID. L7311-11R

Sample Size: 2.3g (wet weight)

GC Column ID(s) SPB-UCITVL  
 DB-1

Concentration Units ng/kg (wet weight basis)

Sample Datafile(s)  
 PB5C\_255 S:10  
 PB5C\_226 S:10  
 PB5C\_194A S:9  
 DT53\_107A S:5

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			5940	0.740	0.0001	5.94E-01	5.94E-01
3,4,4',5-TetraCB	81			187	0.765	0.0001	1.87E-02	1.87E-02
2,3,3',4,4'-PentaCB	105			195000	77.6	0.0001	1.95E+01	1.95E+01
2,3,4,4',5-PentaCB	114			11400	77.5	0.0005	5.72E+00	5.72E+00
2,3',4,4',5-PentaCB	118			812000	282	0.0001	8.12E+01	8.12E+01
2',3,4,4',5-PentaCB	123			7750	82.5	0.0001	7.75E-01	7.75E-01
3,3',4,4',5-PentaCB	126			370	76.6	0.1	3.70E+01	3.70E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	108000	49.5	0.0005	5.39E+01	5.39E+01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			34900	39.3	0.00001	3.49E-01	3.49E-01
3,3',4,4',5,5'-HexaCB	169		U		9.98	0.01	4.99E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			3970	24.9	0.0001	3.97E-01	3.97E-01
<b>TOTAL TEQ</b>							199	199

- (1) C = co-eluting congener, U = not detected
- (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449PCB\*TEQ

Approved by

*[Handwritten Signature]*

QA QC Chemist

28/08/04  
 2004-08-22

0078

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 06-Apr-2005  
Analysis Date: 17-Apr-2005  
Extract Volume (µL): 400  
Injection Volume (µL): 1  
Dilution Factor: 20  
Concentration Units: µg/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
Project No: 04-08-06-22  
Lab Sample ID: L7311-17R  
Sample Size: 2.56 g (wet)  
Initial Calibration Date: 09-Apr-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Sample Data Filename: PB5C\_195 S:4  
Blank Data Filename: PB5C\_256 S:5  
Cal Ver. Data Filename: PB5C\_195 S:1

Time: 22:49:52

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	6.58	2.69	3.38	1.000
3 - MoCB	2		UD		2.90		
4 - MoCB	3		D JB	6.18	3.15	3.58	1.001
2,2' - DiCB	4		D B	11.0	2.80	1.43	1.000
2,3 - DiCB	5		UD		1.85		
2,3' - DiCB	6		D	63.7	1.76	1.57	1.173
2,4 - DiCB	7		KD J	5.46	1.72	1.02	1.152
2,4' - DiCB	8		D B	94.0	1.63	1.43	1.204
2,5 - DiCB	9		D J	17.4	1.73	1.35	1.142
2,6 - DiCB	10		D J	8.13	1.79	1.34	1.012
3,3' - DiCB	11		D JB	8.27	1.88	1.77	0.968
3,4 - DiCB	12	12 + 13	C D JB	12.4	1.85	1.35	0.974
3,4' - DiCB	13	12 + 13	C 12				
3,5 - DiCB	14		UD		1.77		
4,4' - DiCB	15		D B	151	2.16	1.44	1.000
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15448A05 1 xib S?

Approved by:

*Shawn Khow*  
QA/QC Chemist

25-05-2005  
00-mr-vvvs

0080

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4 - TriCB	21	21 + 32	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 78	C X				
2,3,4,6 - TeCB	62	56 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

*JK*

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		x				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		x				
2,3',4,5 - TeCB	67		x				
2,3',4,5' - TeCB	68		x				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		x				
2,3',5',6 - TeCB	73		x				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 75	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		x				
3,3',4,5 - TeCB	78		x				
3,3',4,5' - TeCB	79		x				
3,3',5,5' - TeCB	80		x				
3,4,4',5 - TeCB	81		x				
2,2',3,3',4 - PeCB	82		x				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		x				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		x				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		x				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		x				
2,2',3,5',6 - PeCB	95	91 + 95 + 98 + 100 + 102	C92				
2,2',3,6,6' - PeCB	96		x				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		x				
2,2',4,6,6' - PeCB	104		x				
2,3,3',4,4' - PeCB	105		x				
2,3,3',4,5 - PeCB	106		x				

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C X				
2,3,3',4',5' - PeCB	108	86 + 87 + 97 + 108 + 114 + 125	C86				
2,3,3',4',6' - PeCB	109		X				
2,3,3',4',6' - PeCB	110	110 + 130	C X				
2,3,3',5',5' - PeCB	111		X				
2,3,3',5',6' - PeCB	112		X				
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		X				
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4,5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		X				
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5,6' - PeCB	121		X				
2',3,3',4,5' - PeCB	122		X				
2',3,4,4',5' - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6' - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6' - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 164	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5' - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6' - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	143 + 143	C134				
2,2',3,4,5,6' - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6' - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

15449AD5\_1.xls 5/2

Approved by

QA/QC Chemist

25-06-2005  
00-mm-vvvv

0083



173-1-17R

CLIENT ID.

\_DW-T3-E-SS WB-comp-1

Project No.

04-08-06-22

Sample Data Filename

PB5C\_195 S 4

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	129 + 166	C129				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				

15449ADS 1 cis S:

Approved by

QA/QC Chemist

25-05-2005  
30-mm vvvv

0084

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	193 + 195	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener U = not detected \* = peak detected but did not meet quantification criteria result reported represents the estimated maximum possible concentration E = exceeds calibrated linear range see dilution data D = dilution data Z = compound not requested J = concentration less than LMCL B = analyte found in sample and the associated blank, X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: FISSUE

Sample Receipt Date: 26-Apr-2004

Extraction Date: 06-Apr-2005

Analysis Date: 22-Apr-2005

Extract Volume (µL): 2000

Injection Volume (µL): 10

Dilution Factor: 100

Concentration Units: ng/kg (wet weight basis)

Time: 4.48.38

Sample Collection: 03-Apr-2004  
 Project No: 04-08-06-22  
 Lab Sample ID: C7311-17R W  
 Sample Size: 2.58 g (wet)  
 Initial Calibration Date: 19-Apr-2005  
 Instrument ID: HR GC/MS  
 GC Column ID: SPB-OCTYL  
 Sample Data Filename: PB5C\_202 S.10  
 Blank Data Filename: PB5C\_206 S.4  
 Cal. Ver. Data Filename: PB5C\_202 S.1

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 26					

15449AD4 10 54

4033-1000-10

*Paul Horne*  
 QA/QC Chemist

25-05-2005  
 ds-mth-vvv

0088

L23111R.A

CLIENT ID

LDW-T3-E-S6-vWB-com1-1

Project No

04-08-06-22

Sample Data Filename

PB5C\_2025\_10

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	55 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	55 + 62 + 75					
2,3,4',5 - TeCB	63						

15449AD4

4,307,000

*JK*

QA/QC Chemist

25-05-2005  
10:00:00

0089

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4,6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3,4,4' - TeCB	66						
2,3,4,5' - TeCB	67						
2,3,4,5' - TeCB	68						
2,3,4,6 - TeCB	69	49 + 69					
2,3,4,5 - TeCB	70	41 + 70 + 74 + 76					
2,3,4,5 - TeCB	71	40 + 41 + 71					
2,3,5,5' - TeCB	72						
2,3,5,6 - TeCB	73						
2,4,4,5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4,6 - TeCB	75	56 + 62 + 75					
2,3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3,4,4' - TeCB	77						
3,3,4,5 - TeCB	78						
3,3,4,5' - TeCB	79						
3,3,5,5' - TeCB	80						
3,4,4,5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99					
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4,5 - PeCB	90	90 + 101 + 113					
2,2',3,4,6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5,6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	96 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4,5 - PeCB	99	93 + 99					
2,2',4,4,6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113					
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5,6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						

15448AD4 1 rls 54

Approved by

QA/QC Chemist

25-05-2005  
da-mm-yyyy

0090



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	96 + 87 + 97 + 108 + 119 + 125					
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115					
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113					
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115					
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118						
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125					
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125					
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	845000	91.9	1.25	0.929
2,2',3,3',4,6' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 136 + 160 + 163	C 1 2 B				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5 - HxCB	146						
2,2',3,4',5,6 - HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149					

*Handwritten signature*

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	151 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	1070000	41.2	1.26	0.899
2,2',4,4',5,6' - HxCB	154	154 + 161 + 164					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,6' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	126 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	1080000	15.2	1.05	0.411
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	549000	14.5	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						

15449AD4 11/15/04

AXYS

QA/QC Chemist

25-05-2005  
30-11-2005

0092

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	190 + 192	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener, U = not detected, K = peak detected but did not meet quantification criteria, result reported represents the estimated maximum possible concentration, E = exceeds calibrated linear range, see dilution data, D = dilution data, Z = compound not requested, J = concentration less than LMCL, B = analyte found in sample and the associated blank, X = results reported separately

These pages are part of a larger report that they contain information necessary for full data evaluation

15448AD4, 1 of 54

Approved by

*AK*

QA/QC Chemist

20-06-2005  
00-mm-0000

0093



Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4030

Matrix: TISSUE

Sample Receipt Date: 26-Dec-2004

Extraction Date: 06-Apr-2005

Analysis Date: 18-May-2005

Extract Volume (µL): 400

Injection Volume (µL): 1

Dilution Factor: 20

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 05-Aug-2004

Project No: 04-08-06-22

Lab Sample ID: L7311-17R M

Sample Size: 2.58 g (wet)

Initial Calibration Date: 21-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_255 S:9

Blank Data Filename: PB5C\_256 S:5

Cal Ver Data Filename: PB5C\_256 S:1

Time: 16:19:25

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	574	5.21	0.92	1.165
2,2',4 - TriCB	17		D B	341	4.31	1.04	1.136
2,2',5 - TriCB	18	18 + 30	C D B	1370	3.55	1.06	1.112
2,2',6 - TriCB	19		D	180	4.93	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C D B	5660	4.77	1.02	0.849

15449AD9\_1.rls S1

AXYS Method 51

*[Signature]*  
 QA/QC Chemist

20-02-2005  
 09-mm-yyw

0096

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4 - TriCB	21	21 + 23	C D	185	4.33	1.03	0.856
2,3,4' - TriCB	22		D	378	4.60	1.03	0.873
2,3,5 - TriCB	23		UD		4.58		
2,3,6 - TriCB	24		KD J	16.7	3.11	1.25	1.159
2,3,4 - TriCB	25		D	746	3.89	0.99	0.826
2,3,5 - TriCB	26	26 + 29	C D B	2470	4.41	1.03	1.294
2,3,6 - TriCB	27		D B	230	2.98	1.04	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4,5 - TriCB	31		D B	2850	4.16	1.04	0.838
2,4,6 - TriCB	32		D B	756	4.19	1.02	1.196
2,3,4 - TriCB	33	21 + 33	C21				
2,3,4 - TriCB	34		D J	29.2	4.47	1.16	1.272
3,3,4 - TriCB	35		UD		4.85		
3,3,5 - TriCB	36		UD		4.34		
3,4,4' - TriCB	37		D B	813	4.74	0.99	1.001
3,4,5 - TriCB	38		KD J	18.4	4.54	0.84	0.969
3,4,5 - TriCB	39		D J	20.5	4.27	0.91	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	1880	5.26	0.78	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	713	5.54	0.76	1.310
2,2',3,5 - TeCB	43		D	145	6.10	0.77	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	11100	4.75	0.78	1.284
2,2',3,6 - TeCB	45	45 + 61	C D	652	5.09	0.75	1.147
2,2',3,6' - TeCB	46		D	206	6.02	0.77	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	489	5.10	0.76	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	13500	4.46	0.78	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	1520	4.96	0.78	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	29100	4.95	0.78	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',5,6' - TeCB	54		D J	16.4	4.06	0.66	1.002
2,3,3',4 - TeCB	55		KD	104	21.4	1.00	0.890
2,3,3',4' - TeCB	56		D	954	21.0	0.76	0.906
2,3,3',5 - TeCB	57		D	182	20.3	0.78	0.845
2,3,3',5' - TeCB	58		D	61.7	19.8	0.76	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	1400	4.01	0.78	1.301
2,3,4,4' - TeCB	60		D	1870	21.0	0.76	0.912
2,3,4,5 - TeCB	61	61 + 70 + 71 + 76	C D B	18200	19.7	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4,5' - TeCB	63		D	704	19.2	0.74	0.866

15449AD9, 1 db St

Approved by

QA/QC Chemist

25-05-2006  
dd-mm-yyyy

0097

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		D B	4040	3.94	0.78	1.346
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3,4,4' - TeCB	66		D B	11900	19.3	0.76	0.885
2,3,4,5 - TeCB	67		D	533	18.1	0.78	0.857
2,3,4,5' - TeCB	68		D	342	18.6	0.77	0.832
2,3,4,6 - TeCB	69	44 + 69	C49				
2,3,4,5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3,4,6 - TeCB	71	40 + 41 + 71	C40				
2,3,5,5' - TeCB	72		D	616	19.0	0.78	0.823
2,3,5,6 - TeCB	73		D	516	3.78	0.76	1.240
2,4,4,5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4,6 - TeCB	75	59 + 62 + 75	C59				
2,3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3,4,4' - TeCB	77						
3,3,4,5 - TeCB	78		UD		21.7		
3,3,4,5' - TeCB	79		D	457	18.2	0.69	0.970
3,3,5,5' - TeCB	80		UD		19.2		
3,4,4,5 - TeCB	81						
2,2',3,3',4 - PeCB	92		D	877	33.7	1.62	0.934
2,2',3,3',5 - PeCB	93	83 + 99	C D B	65400	29.6	1.57	0.886
2,2',3,3',6 - PeCB	94		D	8910	33.3	1.59	1.162
2,2',3,4,4' - PeCB	95	85 + 116 + 117	C D	3070	25.1	1.57	0.921
2,2',3,4,5 - PeCB	96	86 + 87 + 97 + 108 + 119 + 125	C D B	44500	25.6	1.57	0.902
2,2',3,4,5' - PeCB	97	96 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	98	88 + 91	C D	5740	28.6	1.60	1.153
2,2',3,4,6' - PeCB	99		D	98.8	30.6	1.41	1.182
2,2',3,4,5 - PeCB	90	90 + 101 + 113	C D B	251000	25.8	1.56	0.870
2,2',3,4,6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	37800	29.7	1.56	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	115000	27.4	1.56	1.119
2,2',3,5,6' - PeCB	94		UD		29.6		
2,2',3,5,6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		U	170	3.31	1.52	1.016
2,2',3,4,5 - PeCB	97	96 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4,5 - PeCB	99	83 + 99	C83				
2,2',4,4,6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,6 - PeCB	103		D	1710	25.5	1.60	1.092
2,2',4,6,6' - PeCB	104		KD J	6.13	3.51	2.09	1.001
2,3,3',4,4' - PeCB	105		D B	21600	47.1	1.54	1.001
2,3,3',4,5 - PeCB	106		UD		46.4		

15448AD9, 1 rls 55

Supervised by

QA/QC Chemist

25-05-2005  
dd-mm-yyyy

0098

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C D	1960	45.7	1.51	0.990
2,3,3',4',5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4',6' - PeCB	109		D	7150	42.9	1.55	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C D B	93000	22.1	1.56	0.925
2,3,3',5',5' - PeCB	111		D	169	22.0	1.56	0.946
2,3,3',5',6' - PeCB	112		UD		22.4		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		D	1140	44.6	1.55	1.001
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3,4,4',5' - PeCB	118		C P	87100	43.0	1.54	1.001
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	1100	21.7	1.63	0.958
2,3',4,5',6' - PeCB	121		D	36.1	21.5	1.68	1.198
2',3,3',4,5' - PeCB	122		D	302	48.8	1.66	1.010
2',3,4,4',5' - PeCB	123		D	1240	48.5	1.50	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126						
3,3',4,5,5' - PeCB	127		D	241	45.8	1.48	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	67300	55.5	1.26	0.960
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163					
2,2',3,3',4,5' - HxCB	130		D	29300	60.3	1.25	0.914
2,2',3,3',4,6' - HxCB	131		D	1740	63.6	1.25	1.158
2,2',3,3',4,6' - HxCB	132		D	90500	65.3	1.25	1.173
2,2',3,3',5,5' - HxCB	133		D	11500	63.0	1.25	1.190
2,2',3,3',5,6' - HxCB	134	134 + 143	C D	19500	64.3	1.25	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	334000	4.11	1.26	1.102
2,2',3,3',6,6' - HxCB	136		D B	68200	3.13	1.26	1.024
2,2',3,4,4',5' - HxCB	137		D	6000	63.1	1.26	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163					
2,2',3,4,4',6' - HxCB	139	139 + 140	C D	3110	57.9	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	183000	61.5	1.25	0.904
2,2',3,4,5,6' - HxCB	142		UD		66.7		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		D	41700	4.24	1.26	1.121
2,2',3,4,6,6' - HxCB	145		UD		3.22		
2,2',3,4',5,5' - HxCB	146		D	58000	59.0	1.25	0.886
2,2',3,4',5,6' - HxCB	147	147 + 149	C D B	462000	57.1	1.25	1.132
2,2',3,4',5,6' - HxCB	148		D	630	4.30	1.32	1.083
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

15449AD6\_1.xls:SI

AXYS

QA/QC Chemist

25-05-2006  
do-mm-yy

0099

04-08-22

CLIENT ID

LDW T3-E-SS-WB-comp 1

Project No

04-08-06-22

Sample Data Filename

PB5C\_255 S 9

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RR1
2,2',3,4',6,6' - HxCB	150		D	267	3.08	1.27	1.012
2,2',3,5,5',6 - HxCB	151	15 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	44.6	2.99	1.32	1.007
2,2',4,4',5,5' - HxCB	153	153 + 166					
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	156		D	1.0	2.94	1.07	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	38500	58.8	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	74700	44.6	1.26	0.938
2,3,3',4,5,5' - HxCB	159		D	3970	47.0	1.29	0.982
2,3,3',4,5,6 - HxCB	160	129 + 136 + 160 + 163					
2,3,3',4,5',6 - HxCB	161		UD		45.6		
2,3,3',4',5,5' - HxCB	162		D	1290	46.7	1.25	0.989
2,3,3',4',6,6 - HxCB	163	129 + 136 + 160 + 163					
2,3,3',4',5',6 - HxCB	164		D	32500	47.8	1.25	0.922
2,3,3',5,5',6 - HxCB	165		UD		50.7		
2,3,4,4',5,6 - HxCB	166	126 + 166	C126				
2,3',4,4',5,5' - HxCB	167		D	22800	44.9	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168					
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	366000	3.91	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	109000	3.88	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	59700	3.90	1.04	0.897
2,2',3,3',5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	90000	3.52	1.04	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	14700	3.44	1.06	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	27200	2.60	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	223000	3.79	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		D	78800	3.55	1.05	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	119000	2.52	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193					
2,2',3,4,4',5,6 - HpCB	181		D B	985	3.54	1.02	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	807	3.50	1.11	1.115
4,4',3,4,4',5',6 - HpCB	183	183 + 185	C D B	310000	3.42	1.04	1.126
2,2',3,4,4',6,6' - HpCB	184		UD		2.42		
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		2.64		
2,2',3,4',5,5',6 - HpCB	187						
2,2',3,4',5,6,6' - HpCB	188		D B	139	2.50	1.05	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	9590	37.6	1.03	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	76800	2.92	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	15000	2.96	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		3.02		

10449AD9 1.00.51

Approved by

QA/QC Chemist

04-05-2006  
ad-mm-vvv

0100



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	195	190 + 193					
2,2',3,3',4,4',5,5',6 - OcCB	194		D B	97600	19.9	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	50700	22.2	0.90	0.946
2,2',3,3',4,4',5,6,6' - OcCB	196		D	63600	0.215	0.90	0.916
2,2',3,3',4,4',5,5',6 - OcCB	197	197 + 200	C D	9590	0.185	0.92	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	98800	0.221	0.91	1.114
2,2',3,3',4,5,5',6 - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	15300	0.163	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	21500	0.184	0.92	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	77100	0.201	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D B	15.2	0.166	0.91	1.019
2,3,3',4,4',5,5',6 - OcCB	205		D B	4700	16.0	0.89	1.001
2,2',3,3',4,4',5,5',6 - NoCB	206		D	9710	8.91	0.80	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	1680	7.69	0.80	1.019
2,2',3,3',4,5,5',6,6' - NoCB	208		D	1640	8.12	0.80	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	188	0.214	0.76	1.001

(1) C = co-eluting congener, U = not detected, K = peak detected but did not meet quantification criteria, result reported represents the estimated maximum possible concentration, E = exceeds calibrated linear range, see dilution data, D = dilution data, Z = compound not requested, J = concentration less than LMCL, B = analyte found in sample and the associated blank, X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation

15449AD6 1 of 55

ANALYST NAME

*JK*

QA/QC Chemist

25-05-2006  
30-mm-vvv

0101

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 15-Apr-2005 Time: 14:54:37

Extract Volume (µL): 20

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-17R

Sample Size: 2.58 g (wet)

Initial Calibration Date: 04-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: DB-1

Sample Datafile: DT53\_107A S: 6

Blank Data Filename: DT53\_107A S: 4

Cal. Ver. Data Filename: DT53\_107A S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			940	0.918	0.79	1.001
3,4,4',5 - TeCB	81			53.0	0.904	0.79	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			299	35.8	1.51	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			22.4	2.99	1.24	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449cAD1\_1.xls. S4

Approved by: Kau Shorne QA/QC Chemist

26-05-2005  
 dd-mm-yyyy

0104

Form 2  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-E-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-17R
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.58 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 15-Apr-2005	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_107A S: 6
Dilution Factor: N/A	Blank Data Filename: DT53_107A S: 4
Concentration Units : pg absolute	Cal. Ver. Data Filename: DT53_107A S: 1

LABELLED COMPOUND	IUPAC NO. <sup>1</sup>	CO-ELUTIONS	LAB FLAG <sup>2</sup>	SPIKE CONC.	CONC. FOUND	R(%) <sup>3</sup>	ION ABUND. RATIO <sup>4</sup>	RRT <sup>4</sup>
13C12-3,3',4,4' - TeCB	77L			4000	4410	110	0.78	1.457
13C12-3,4,4',5 - TeCB	81L			4000	4090	102	0.79	1.417
13C12-2,3,3',4,4' - PeCB	105L							
13C12-2,3,4,4',5 - PeCB	114L							
13C12-2,3',4,4',5 - PeCB	118L							
13C12-3,3',4,4',5 - PeCB	123L							
13C12-3,3',4,4',5 - PeCB	126L			4000	4710	118	1.53	1.432
13C12-2,3,3',4,4',5 - HxCB	156L							
13C12-2,3,3',4,4',5' - HxCB	157L							
13C12-2,3',4,4',5,5' - HxCB	167L							
13C12-3,3',4,4',5,5' - HxCB	169L			4000	4240	106	1.27	1.281
13C12-2,2',3,3',4,4',5 - HpCB	170L							
13C12-2,2',3,4,4',5,5' - HpCB	180L							
13C12-2,3,3',4,4',5,5' - HpCB	189L							
13C12-2,2',3,3',4,4',5,5',6' - DeCB	209L							
<b>CLEAN-UP STANDARD</b>								
13C12-2,3,3',5,5' - PeCB	111L							
13C12-2,2',3,3',5,5',6 - HpCB	178L							

(1) Suffix "L" indicates labeled compound.  
 (2) E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; X = results reported separately  
 (3) R% = percent recovery of labeled compounds  
 (4) Required limits for ion abundance ratios are specified in Tables 8, Method 1668A. Required limits for RRTs are based on a +/- 0.5% of the mean RRT determined from the initial calibration

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449cAD1\_1.xls, S4

Approved by:  QA/QC Chemist

26-05-2005  
dd-mm-yyyy

0105



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-17R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.58 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 17-Apr-2005	Instrument ID:	HR GC/MS
Time: 22:49:52	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 400	Blank Data Filename:	PB5C_256 S:5
Injection Volume (µL): 1.0	Cal. Ver. Data Filename:	PB5C_195 S:1
Dilution Factor: 20	Sample Datafile(s):	PB5C_255 S:9 PB5C_202 S:10 PB6C_105 S:4 DT53_107A S: 6
Concentration Units : µg/kg (wet weight basis)		

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		12.8	3.15
Total Dichloro Biphenyls		464	2.80
Total Trichloro Biphenyls		16000	5.21
Total Tetrachloro Biphenyls		102000	0.918
Total Pentachloro Biphenyls		747000	35.8
Total Hexachloro Biphenyls		3570000	2.99
Total Heptachloro Biphenyls		3130000	37.8
Total Octachloro Biphenyls		439000	22.2
Total Nonachloro Biphenyls		13000	8.91
Decachloro Biphenyl		188	0.214
TOTAL PCBs		8010000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-17R

Sample Size: 2.58 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s):  
 DB-1  
 PB5C\_255 S:9  
 PB5C\_202 S:10  
 PB5C\_195 S:4  
 DT53\_107A S: 6

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			940	0.918	0.0001	9.40E-02	9.40E-02
3,4,4',5-TetraCB	81			53.0	0.904	0.0001	5.30E-03	5.30E-03
2,3,3',4,4'-PentaCB	105			21600	47.1	0.0001	2.16E+00	2.16E+00
2,3,4,4',5-PentaCB	114			1140	44.6	0.0005	5.69E-01	5.69E-01
2,3',4,4',5-PentaCB	118			87100	43.0	0.0001	8.71E+00	8.71E+00
2',3,4,4',5-PentaCB	123			1240	48.5	0.0001	1.24E-01	1.24E-01
3,3',4,4',5-PentaCB	126			299	35.8	0.1	2.99E+01	2.99E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	38500	58.8	0.0005	1.93E+01	1.93E+01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			22800	44.9	0.00001	2.28E-01	2.28E-01
3,3',4,4',5,5'-HexaCB	169			22.4	2.99	0.01	2.24E-01	2.24E-01
2,3,3',4,4',5,5'-HcptaCB	189			9590	37.8	0.0001	9.59E-01	9.59E-01
<b>TOTAL TEQ</b>							<b>62.2</b>	<b>62.2</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-F-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 17-Apr-2005

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units : ng/kg (wet weight basis)

Time: 23:54:10

Sample Collection: 04-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-18R

Sample Size: 2.84 g (wet)

Initial Calibration Date: 09-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_195 S:5

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_195 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	7.55	2.89	2.69	1.001
3 - MoCB	2		UD		3.22		
4 - MoCB	3		D JB	5.15	3.62	3.56	1.001
2,2' - DiCB	4		D B	90.0	12.1	1.77	1.001
2,3 - DiCB	5		UD		8.86		
2,3' - DiCB	6		D	61.3	8.42	1.52	1.173
2,4 - DiCB	7		UD		8.24		
2,4' - DiCB	8		D B	73.3	7.81	1.59	1.204
2,5 - DiCB	9		D J	14.6	8.27	1.69	1.142
2,6 - DiCB	10		UD		8.57		
3,3' - DiCB	11		KD B	57.2	8.07	1.22	0.953
3,4 - DiCB	12	12 + 13	C UD		8.85		
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		8.48		
4,4' - DiCB	15		D B	119	10.9	1.56	1.001
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls. S3

Approved by: Klaus Horn QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0109

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5',6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C X				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				

15449AD5\_1.xls. S3

Approved by  QA/QC Chemist

25-05-2005  
dd-mm-yyyy  
0111

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAR FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C X				
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		X				
2,3,3',4',6' - PeCB	110	110 + 115	C X				
2,3,3',5,5' - PeCB	111		X				
2,3,3',5,6' - PeCB	112		X				
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		X				
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		X				
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5',6' - PeCB	121		X				
2',3,3',4,5' - PeCB	122		X				
2',3,4,4',5' - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C X				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6' - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6' - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5' - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6' - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6' - HxCB	147	147 + 149	C X				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2'.4.4'.6.6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2.3.4.4'.5.6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C X				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2'.3.4'.5.6.6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 HpCB	102		X				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6' - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-F-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Project No.: 04 08 06 22

Contract No.: 4033

Lab Sample ID: L7311-18R W

Matrix: TISSUE

Sample Size: 2.84 g (wet)

Sample Receipt Date: 26-Oct-2004

Initial Calibration Date: 19-Apr-2005

Extraction Date: 06-Apr-2005

Instrument ID: HR GC/MS

Analysis Date: 22-Apr-2005

Time: 3:44:22

GC Column ID: SPB-OCTYL

Extract Volume (µL): 1000

Sample Data Filename: PB5C\_202 S:9

Injection Volume (µL): 1.0

Blank Data Filename: PB5C\_256 S:5

Dilution Factor: 50

Cal. Ver. Data Filename: PB5C\_202 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15449AD4\_1.xls. S3

Approved by:  QA/QC Chemist

25-05-2005  
dd-mm-yyyy

0117

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAC <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	03						

15449AD4\_1.xls.S3

Approved by: \_\_\_\_\_



QA/QC Chemist

25-05-2005  
dd-mm-yyyy

0118

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125					
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115					
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113					
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115					
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118						
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125					
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125					
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163					
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163					
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6 - HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149					

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	388000	30.6	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163					
2,3,3',4,5,6' - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163					
2,3,3',4',5,6' - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	420000	6.16	1.05	0.911
2,2',3,4,4',6,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187						
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-F-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Contract No.: 4033

Project No.: 04-08-08-22

Matrix: TISSUE

Lab Sample ID: L7311-18R M

Sample Receipt Date: 26-Oct-2004

Sample Size: 2.84 g (wet)

Extraction Date: 06-Apr-2005

Initial Calibration Date: 21-Apr-2005

Analysis Date: 18-May-2005

Time: 15:14:58

Instrument ID: HR GC/MS

Extract Volume (µL): 400

GC Column ID: SPB-OCTYL

Injection Volume (µL): 1.0

Sample Data Filename: PB5C\_255 S:8

Dilution Factor: 20

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_255 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	46.7	6.30	1.10	1.165
2,2',4 - TriCB	17		D B	295	5.22	1.02	1.137
2,2',5 - TriCB	18	10 + 30	C D B	1280	4.30	1.04	1.113
2,2',6 - TriCB	19		D	156	6.15	1.09	1.001
2,3,3' - TriCB	20	20 + 28	C D B	6030	4.01	1.02	0.849

15449AD9\_1.xls.S4

Approved by: *Michelle Williams* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0125

L7311-18R M

CLIENT ID:

LDW-T3-F-SS-WB-comp-1

Project No.:

04-08-06-22

Sample Data Filename:

PB5C\_255 S:8

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	148	4.01	0.95	0.858
2,3,4' - TriCB	22		D	289	4.27	0.98	0.873
2,3,5 - TriCB	23		UD		4.25		
2,3,6 - TriCB	24		D J	13.3	3.76	1.04	1.160
2,3',4 - TriCB	25		D	1060	3.61	1.00	0.826
2,3',5 - TriCB	26	26 + 29	C D B	3250	4.09	1.03	1.300
2,3',6 - TriCB	27		D B	212	3.60	1.09	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	2820	3.86	1.03	0.838
2,4',6 - TriCB	32		D B	690	3.88	1.00	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	29.2	4.14	0.92	1.272
3,3',4 - TriCB	35		UD		4.50		
3,3',5 - TriCB	36		UD		4.02		
3,4,4' - TriCB	37		D B	751	4.29	1.03	1.001
3,4,5 - TriCB	38		UD		4.21		
3,4',5 - TriCB	39		UD		3.96		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	1700	4.00	0.79	1.335
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	723	4.22	0.77	1.310
2,2',3,5 - TeCB	43		D	102	4.64	0.78	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	14800	3.62	0.78	1.283
2,2',3,6 - TeCB	45	45 + 51	C D	576	3.87	0.78	1.147
2,2',3,6' - TeCB	46		D	190	4.58	0.80	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	373	3.88	0.77	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	21100	3.40	0.78	1.257
2,2',4,6 - TeCB	50	50 + 53	C D B	1680	3.77	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	47000	3.77	0.79	1.232
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D J	16.6	3.22	0.86	1.001
2,3,3',4 - TeCB	55		UD		33.8		
2,3,3',4' - TeCB	56		D	796	33.2	0.77	0.905
2,3,3',5 - TeCB	57		D	362	32.1	0.78	0.845
2,3,3',5' - TeCB	58		D	152	31.4	0.79	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	1630	3.05	0.78	1.301
2,3,4,4' - TeCB	60		D	2300	33.3	0.77	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	28000	31.2	0.76	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	1140	30.5	0.77	0.865

15449AD9\_1.xls, S4

Approved by



QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0126

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	4900	2.99	0.79	1.346
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	19500	30.6	0.78	0.885
2,3',4,5 - TeCB	67		D	628	28.7	0.77	0.857
2,3',4,5' - TeCB	68		D	736	29.4	0.78	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	1210	30.1	0.72	0.824
2,3',5',6 - TeCB	73		D	55.0	2.87	0.76	1.240
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78		UD		34.3		
3,3',4,5' - TeCB	79		D	650	28.8	0.71	0.971
3,3',5,5' - TeCB	80		UD		30.4		
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	862	6.45	1.60	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	123000	5.67	1.57	0.886
2,2',3,3',6 - PeCB	84		D	6910	6.37	1.55	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	8540	4.81	1.56	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	53600	4.90	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	9580	5.45	1.58	1.153
2,2',3,4,6' - PeCB	89		D	81.1	5.86	1.58	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	173000	4.95	1.56	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	30300	5.69	1.56	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	57900	5.25	1.56	1.119
2,2',3,5,6' - PeCB	94		D	73.6	5.66	1.40	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	203	2.88	1.69	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	2220	4.89	1.58	1.092
2,2',4,6,6' - PeCB	104		D J	12.4	3.22	1.74	1.001
2,3,3',4,4' - PeCB	105		D D	46100	10.1	1.64	1.000
2,3,3',4,5 - PeCB	106		UD		20.2		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	2670	19.9	1.51	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	12900	18.7	1.54	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C D B	78600	4.22	1.57	0.926
2,3,3',5,5' - PeCB	111		D	300	4.22	1.58	0.946
2,3,3',5,6 - PeCB	112		UD		4.29		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		D	2650	20.0	1.51	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		D B	158000	18.8	1.54	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	1650	4.15	1.58	0.958
2,3',4,5',6 - PeCB	121		D	129	4.12	1.57	1.198
2',3,3',4,5 - PeCB	122		D	380	21.3	1.59	1.010
2',3,4,4',5 - PeCB	123		D	2180	21.4	1.58	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127		D	456	19.9	1.33	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	40400	19.2	1.26	0.959
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	378000	19.0	1.25	0.929
2,2',3,3',4,5' - HxCB	130		D	18500	24.0	1.26	0.914
2,2',3,3',4,6 - HxCB	131		D	751	22.0	1.31	1.159
2,2',3,3',4,6' - HxCB	132		D	19500	22.6	1.25	1.173
2,2',3,3',5,5' - HxCB	133		D	9250	21.8	1.24	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	7080	22.2	1.25	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	90400	2.11	1.26	1.103
2,2',3,3',6,6' - HxCB	136		D B	14900	1.60	1.26	1.024
2,2',3,4,4',5 - HxCB	137		D	13300	21.8	1.25	0.010
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	4960	20.0	1.25	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	32700	21.3	1.25	0.904
2,2',3,4,5,6 - HxCB	142		UD		23.1		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		D	9210	2.18	1.26	1.121
2,2',3,4,6,6' - HxCB	145		D J	19.2	1.65	1.32	1.034
2,2',3,4',5,5' - HxCB	146		D	86400	20.4	1.25	0.885
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	83800	19.7	1.25	1.133
2,2',3,4',5,6' - HxCB	148		D	1290	2.20	1.26	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	465	1.58	1.25	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	62.3	1.53	1.20	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168					
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D	60.4	1.52	1.14	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	29500	19.8	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	31300	15.5	1.26	0.938
2,3,3',4,5,5' - HxCB	159		D	562	16.3	1.23	0.982
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		15.8		
2,3,3',4',5,5' - HxCB	162		D	818	16.1	1.26	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	6460	16.5	1.27	0.922
2,3,3',5,5',6 - HxCB	165		D	370	17.5	1.14	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	11900	15.4	1.25	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168					
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	119000	2.05	1.04	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	31500	2.04	1.04	1.161
2,2',3,3',4,5,5' - HpCB	172		D B	19400	2.05	1.05	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	12100	1.85	1.04	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	4170	1.80	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	3930	1.36	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	64800	1.99	1.04	1.144
2,2',3,3',5,5',6 - HpCB	178		D	28500	1.86	1.03	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	23500	1.32	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193					
2,2',3,4,4',5,6 - HpCB	181		D B	624	1.86	1.07	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	927	1.84	1.04	1.114
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	94000	1.79	1.04	1.126
2,2',3,4,4',6,6' - HpCB	184		D B	65.8	1.27	1.06	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		1.39		
2,2',3,4',5,5',6 - HpCB	187		D B	208000	1.70	1.04	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	273	1.34	1.06	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	3070	25.7	1.01	1.001
2,3,3',4,4',5,6 - HpCB	190		D B	28200	1.53	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	4850	1.55	1.03	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		1.59		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193					
2,2',3,3',4,4',5,5' - OcCB	194		D B	55700	17.6	0.89	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	23800	19.7	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	30100	0.199	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	3310	0.148	0.90	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	43500	0.201	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	7320	0.148	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	11800	0.163	0.90	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	43600	0.183	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D JB	12.1	0.151	0.95	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	2660	14.5	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	8810	8.87	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	1330	7.57	0.80	1.019
2,2',3,3',4,5,5',6,6' - NoCB	208		D	1230	7.90	0.78	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	197	0.147	0.63	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-F-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 15-Apr-2005 Time: 15:34:06

Extract Volume (µL): 20

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 04-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-18R

Sample Size: 2.84 g (wet)

Initial Calibration Date: 04-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: DB-1

Sample Datafile: DT53\_107A S: 7

Blank Data Filename: DT53\_107A S: 4

Cal. Ver. Data Filename: DT53\_107A S: 1

COMPOUND	IUPAC NO.	C.O.-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			1250	0.497	0.77	1.001
3,4,4',5 - TeCB	81			72.8	0.523	0.80	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			179	40.7	1.55	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			6.06	0.847	1.09	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	04-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-18R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.84 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 17-Apr-2005 Time: 23:54:10	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_195 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_255 S:8 PB5C_202 S:9 PB5C_195 S:5 DT53_107A S: 7

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		12.7	3.62
Total Dichloro Biphenyls		358	12.1
Total Trichloro Biphenyls		17100	6.30
Total Tetrachloro Biphenyls		152000	0.523
Total Pentachloro Biphenyls		772000	40.7
Total Hexachloro Biphenyls		1280000	0.847
Total Heptachloro Biphenyls		1070000	25.7
Total Octachloro Biphenyls		222000	19.7
Total Nonachloro Biphenyls		11400	8.87
Decachloro Biphenyl		197	0.147
TOTAL PCBs		3520000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-18R

Sample Size: 2.84 g (wet)

GC Column ID(s): SPB-OCTYL  
 DB 1

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s): PB5C\_255 S:8  
 PB5C\_202 S:9  
 PB5C\_195 S:5  
 DT53\_107A S: 7

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			1250	0.497	0.0001	1.25E-01	1.25E-01
3,4,4',5-TetraCB	81			72.8	0.523	0.0001	7.28E-03	7.28E-03
2,3,3',4,4'-PentaCB	105			46100	19.1	0.0001	4.61E+00	4.61E+00
2,3,4,4',5-PentaCB	114			2650	20.0	0.0005	1.32E+00	1.32E+00
2,3',4,4',5-PentaCB	118			158000	18.8	0.0001	1.58E+01	1.58E+01
2',3,4,4',5-PentaCB	123			2180	21.4	0.0001	2.18E-01	2.18E-01
3,3',4,4',5-PentaCB	126			179	40.7	0.1	1.79E+01	1.79E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	29500	19.8	0.0005	1.47E+01	1.47E+01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			11900	15.4	0.00001	1.19E-01	1.19E-01
3,3',4,4',5,5'-HexaCB	169			6.06	0.847	0.01	6.06E-02	6.06E-02
2,3,3',4,4',5,5'-HeptaCB	189			3070	25.7	0.0001	3.07E 01	3.07E-01
<b>TOTAL TEQ</b>							<b>55.2</b>	<b>55.2</b>

(1) C = co-eluting congener. U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-D-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033  
 Matrix: TISSUE  
 Sample Receipt Date: 26-Oct-2004  
 Extraction Date: 06-Apr-2005  
 Analysis Date: 18-Apr-2005  
 Extract Volume (µL): 400  
 Injection Volume (µL): 1.0  
 Dilution Factor: 20

Time: 0:58:27

Sample Collection: 03-Aug-2004  
 Project No.: 04 08-06-22  
 Lab Sample ID: L7311-51R (A)  
 Sample Size: 2.64 g (wet)  
 Initial Calibration Date: 09-Apr-2005  
 Instrument ID: HR GC/MS  
 GC Column ID: SPB-OCTYL  
 Sample Data Filename: PB5C\_195 S:6  
 Blank Data Filename: PB5C\_256 S:5  
 Cal. Ver. Data Filename: PB5C\_195 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	3.90	2.75	3.13	1.000
3 - MoCB	2		UD		2.98		
4 - MoCB	3		D JB	3.52	3.25	3.43	1.001
2,2' - DiCB	4		D B	77.7	7.64	1.49	1.001
2,3 - DiCB	5		UD		5.27		
2,3' - DiCB	6		D	65.4	5.01	1.47	1.173
2,4 - DiCB	7		UD		4.90		
2,4' - DiCB	8		D B	114	4.65	1.60	1.204
2,5 - DiCB	9		D J	11.7	4.92	1.63	1.141
2,6 - DiCB	10		UD		5.10		
3,3' - DiCB	11		UD		5.34		
3,4 - DiCB	12	12 + 13	C UD		5.27		
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		5.05		
4,4' - DiCB	15		D JB	25.7	6.29	1.76	1.001
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls, S4

Approved by: *Shawn Shown* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0138

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FI AG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	50 + 62 + 76	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

COMPOUND	IUPAC NO.	CO-ELUTIONS	I AB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5',6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C X				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	C X				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C X				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C X				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2',3,4',5,6,6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-D-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Project No.: 04-08-06-22

Contract No.: 4033

Lab Sample ID: L7311-51R i (A)

Matrix: TISSUE

Sample Size: 2.64 g (wet)

Sample Receipt Date: 26-Oct-2004

Initial Calibration Date: 19-Apr-2005

Extraction Date: 06-Apr-2005

Instrument ID: HR GC/MS

Analysis Date: 18-May-2005

Time: 4:25:29

GC Column ID: SPB-OCTYL

Extract Volume (µL): 400

Sample Data Filename: PB5C\_254 S:9

Injection Volume (µL): 1.0

Blank Data Filename: PB5C\_256 S:5

Dilution Factor: 20

Cal. Ver. Data Filename: PB5C\_254 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	232	6.26	1.00	1.165
2,2',4 - TriCB	17		D B	515	5.14	1.04	1.137
2,2',5 - TriCB	18	18 + 30	C D B	1280	4.20	1.05	1.113
2,2',6 - TriCB	19		D	126	5.32	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C D B	4120	5.78	1.04	0.849

15449AD7\_1.xls. S2

Approved by: *M. Hill* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0146

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	398	5.82	1.05	0.858
2,3,4' - TriCB	22		D	266	6.14	1.05	0.873
2,3,5 - TriCB	23		UD		6.13		
2,3,6 - TriCB	24		D J	14.3	3.73	0.94	1.158
2,3',4 - TriCB	25		D	289	5.13	1.05	0.826
2,3',5 - TriCB	26	26 + 29	C D B	1920	5.99	1.05	1.300
2,3',6 - TriCB	27		D B	225	3.59	1.06	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	1570	5.51	1.04	0.838
2,4',6 - TriCB	32		D B	492	5.61	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D J	26.2	6.01	1.08	1.272
3,3',4 - TriCB	35		UD		6.39		
3,3',5 - TriCB	36		UD		5.81		
3,4,4' - TriCB	37		D B	81.0	6.66	1.19	1.001
3,4,5 - TriCB	38		UD		6.02		
3,4',5 - TriCB	39		UD		5.64		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	1930	6.08	0.78	1.335
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	2210	6.41	0.79	1.310
2,2',3,5 - TeCB	43		D	223	7.33	0.85	1.244
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	14400	5.47	0.78	1.283
2,2',3,6 - TeCB	45	45 + 51	C D	601	5.99	0.80	1.146
2,2',3,6' - TeCB	46		D	231	7.07	0.80	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	748	5.92	0.80	1.271
2,2',4,5' - TeCB	49	49 + 69	C D B	15300	5.16	0.78	1.257
2,2',4,6 - TeCB	50	50 + 53	C D B	1270	5.76	0.77	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	30400	5.62	0.78	1.232
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D J	12.0	4.17	0.81	1.000
2,3,3',4 - TeCB	55		UD		12.4		
2,3,3',4' - TeCB	56		D	435	11.9	0.74	0.905
2,3,3',5 - TeCB	57		D	152	11.6	0.72	0.845
2,3,3',5' - TeCB	58		D	43.2	11.3	0.74	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	1340	4.61	0.79	1.300
2,3,4,4' - TeCB	60		D	1600	12.1	0.77	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	13300	11.6	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	783	11.1	0.78	0.865

COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		D B	4670	4.50	0.77	1.346
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	11600	11.2	0.78	0.885
2,3',4,5 - TeCB	67		D	134	10.4	0.81	0.857
2,3',4,5' - TeCB	68		D	86.7	10.6	0.77	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	672	11.0	0.80	0.824
2,3',5',6 - TeCB	73		UD		4.31		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78		UD		12.5		
3,3',4,5' - TeCB	79		D	530	10.1	0.77	0.971
3,3',5,5' - TeCB	80		UD		11.2		
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	2230	12.8	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	54200	11.0	1.56	0.886
2,2',3,3',6 - PeCB	84		D	7540	12.9	1.58	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	9390	9.53	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	30700	9.72	1.56	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	7410	11.2	1.56	1.153
2,2',3,4,6' - PeCB	89		D	89.5	11.8	1.55	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	73700	9.95	1.56	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	18300	11.3	1.58	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	42600	10.7	1.56	1.119
2,2',3,5,6' - PeCB	94		D	112	11.6	1.70	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	170	2.75	1.52	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1170	9.90	1.54	1.092
2,2',4,6,6' - PeCB	104		KD J	3.80	2.48	1.23	1.001
2,3,3',4,4' - PeCB	105		D B	20000	10.0	1.53	1.000
2,3,3',4,5 - PeCB	106		UD		17.4		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C D	781	18.1	1.59	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		D	5810	16.2	1.56	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C D B	57500	8.49	1.57	0.926
2,3,3',5,5' - PeCB	111		D	129	8.54	1.53	0.946
2,3,3',5,6' - PeCB	112		UD		8.97		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		D	1250	18.9	1.57	1.000
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		D B	71500	17.8	1.54	1.000
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	589	8.17	1.54	0.958
2,3',4,5',6' - PeCB	121		D	63.0	8.32	1.71	1.197
2',3,3',4,5' - PeCB	122		D	71.7	19.2	1.65	1.010
2',3,4,4',5' - PeCB	123		D	585	19.2	1.53	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126						
3,3',4,5,5' - PeCB	127		D	198	18.2	1.42	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	19200	20.3	1.27	0.959
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	179000	20.3	1.26	0.929
2,2',3,3',4,5' - HxCB	130		D	9140	25.9	1.25	0.913
2,2',3,3',4,6' - HxCB	131		D	693	24.3	1.21	1.158
2,2',3,3',4,6' - HxCB	132		D	22700	24.6	1.27	1.174
2,2',3,3',5,5' - HxCB	133		D	4100	23.9	1.26	1.190
2,2',3,3',5,6' - HxCB	134	134 + 143	C D	4790	24.3	1.30	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	58200	2.04	1.26	1.103
2,2',3,3',6,6' - HxCB	136		D B	11400	1.57	1.27	1.024
2,2',3,4,4',5' - HxCB	137		D	5530	23.0	1.22	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C D	2280	22.1	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	23600	23.3	1.26	0.904
2,2',3,4,5,6' - HxCB	142		UD		24.5		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		D	5950	2.06	1.27	1.121
2,2',3,4,6,6' - HxCB	145		D J	12.2	1.60	1.38	1.034
2,2',3,4',5,5' - HxCB	146		D	36500	21.3	1.26	0.885
2,2',3,4',5,6' - HxCB	147	147 + 149	C D B	92400	21.8	1.25	1.132
2,2',3,4',5,6' - HxCB	148		D	591	2.13	1.25	1.083
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	243	1.51	1.34	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	38.1	1.52	1.32	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	208000	18.2	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	16.7	1.20	1.14	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	15600	22.6	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	15100	16.7	1.25	0.938
2,3,3',4,5,5' - HxCB	159		D	1260	17.2	1.28	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129		17.3		
2,3,3',4,5',6 - HxCB	161		UD				
2,3,3',4',5,5' - HxCB	162		D	357	17.1	1.28	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	7060	17.8	1.26	0.921
2,3,3',5,5',6 - HxCB	165		D	144	18.7	1.27	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	4620	16.4	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	56200	1.93	1.05	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	16100	1.99	1.05	1.161
2,2',3,3',4,5,5' - HpCB	172		D B	10200	1.97	1.03	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	27400	1.88	1.05	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	2620	1.83	1.03	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	4840	1.41	1.06	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	37600	1.95	1.05	1.144
2,2',3,3',5,5',6 - HpCB	178		D	16300	1.92	1.04	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	18700	1.37	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	173000	1.58	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181		D D	274	1.82	1.07	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	338	1.85	1.08	1.114
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	48600	1.76	1.04	1.126
2,2',3,4,4',6,6' - HpCB	184		UD		1.32		
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		1.42		
2,2',3,4',5,5',6 - HpCB	187		D B	102000	1.70	1.04	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	80.7	1.30	1.09	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	1760	15.3	1.02	1.001
2,3,3',4,4',5,6 - HpCB	190		D B	13700	1.45	1.04	0.948
2,3,3',4,4',5',6 - HpCB	191		D B	2490	1.45	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		1.54		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	27600	10.7	0.90	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	12400	11.9	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	17600	0.228	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	2990	0.174	0.91	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	28300	0.231	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	3790	0.179	0.91	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	6150	0.191	0.92	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	22500	0.211	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D J B	3.92	0.179	0.94	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	1380	8.97	0.89	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	5130	7.68	0.79	1.001
2,2',3,3',4,4',5,6,6' - NoCB	207		D	790	6.30	0.79	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	788	6.54	0.77	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	125	0.176	0.63	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-D-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-51R (A)
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.64 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 15-Apr-2005 Time: 16:13:40	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_107A S: 8
Dilution Factor: N/A	Blank Data Filename: DT53_107A S: 4
Concentration Units: ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_107A S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			248	0.710	0.77	1.001
3,4,4',5 - TeCB	81			11.8	0.681	0.73	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			66.8	11.3	1.52	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			4.07	1.99	1.42	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449cAD1\_1.xls S6

Approved by: [Signature] QA/QC Chemist

26-05-2005  
da-mm-yyyy

0154

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-51R (A)
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.64 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 09-Apr-2005
Analysis Date: 18-Apr-2005 Time: 0:58:27	Instrument ID: HR GC/MS
Extract Volume (µL): 400	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename: PB5C_195 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_195 S:6 PB5C_254 S:9 DT53_107A S: 8

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		7.42	3.25
Total Dichloro Biphenyls		295	7.64
Total Trichloro Biphenyls		11500	6.66
Total Tetrachloro Biphenyls		103000	0.710
Total Pentachloro Biphenyls		406000	11.3
Total Hexachloro Biphenyls		729000	1.99
Total Heptachloro Biphenyls		533000	15.3
Total Octachloro Biphenyls		123000	11.9
Total Nonachloro Biphenyls		6710	7.68
Decachloro Biphenyl		125	0.176
TOTAL PCBs		1910000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449PCBTOTAL\_1.xls, S10

Approved by: *[Signature]* QA/QC Chemist

26-05-2005  
dd-mm-yyyy

0156

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-51R (A)

Sample Size: 2.64 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s):  
 DB 1  
 PB5C\_254 S:9  
 PB5C\_195 S:6  
 DT53\_107A S: 8

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			248	0.710	0.0001	2.48E-02	2.48E-02
3,4,4',5'-TetraCB	81			11.8	0.681	0.0001	1.18E-03	1.18E-03
2,3,3',4,4'-PentaCB	105			20000	19.0	0.0001	2.00E+00	2.00E+00
2,3,4,4',5'-PentaCB	114			1250	18.9	0.0005	6.24E-01	6.24E-01
2,3',4,4',5'-PentaCB	118			71500	17.8	0.0001	7.15E+00	7.15E+00
2',3,4,4',5'-PentaCB	123			585	19.2	0.0001	5.85E-02	5.85E-02
3,3',4,4',5'-PentaCB	126			66.8	11.3	0.1	6.68E+00	6.68E+00
2,3,3',4,4',5'-HexaCB	156	156 + 157	C	15600	22.6	0.0005	7.82E+00	7.82E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			4620	16.4	0.00001	4.62E-02	4.62E-02
3,3',4,4',5,5'-HexaCB	169			4.07	1.99	0.01	4.07E-02	4.07E-02
2,3,3',4,4',5,5'-HeptaCB	189			1700	15.3	0.0001	1.76E 01	1.76E-01
<b>TOTAL TEQ</b>							<b>24.6</b>	<b>24.6</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-D-PS-WB-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: WG15449-103  
 (DUP L7311-51)

Sample Receipt Date: 26-Oct-2004

Sample Size: 2.57 g (wet)

Extraction Date: 06-Apr-2005

Initial Calibration Date: 09-Apr-2005

Analysis Date: 18-Apr-2005

Time: 2:02:44

Instrument ID: HR GC/MS

Extract Volume (µL): 400

GC Column ID: SPB-OCTYL

Injection Volume (µl): 1.0

Sample Data Filename: PB5C\_195 S:7

Dilution Factor: 20

Blank Data Filename: PB5C\_256 S:5

Concentration Units: ng/kg (wet weight basis)

Cal. Ver. Data Filename: PB5C\_195 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		UD		3.20		
3 - MoCB	2		UD		3.52		
4 - MoCB	3		UD		3.88		
2,2' - DiCB	4		D B	68.9	10.4	1.45	1.001
2,3 - DiCB	5		UD		6.88		
2,3' - DiCB	6		D	65.2	6.54	1.50	1.173
2,4 - DiCB	7		UD		6.40		
2,4' - DiCB	8		D B	114	6.07	1.49	1.204
2,5 - DiCB	9		D J	9.12	6.43	1.69	1.141
2,6 - DiCB	10		UD		6.66		
3,3' - DiCB	11		UD		0.97		
3,4 - DiCB	12	12 + 13	C UD		6.88		
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		6.59		
4,4' - DiCB	15		D JB	21.4	8.03	1.53	1.001
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	16 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls, S5

Approved by: *Man Mathan* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0159

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

COMPOUND	HPLC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5',6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C X				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5',6 - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C X				
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		X				
2,3,3',4',6 - PeCB	110	110 + 115	C X				
2,3,3',5,5' - PeCB	111		X				
2,3,3',5,6 - PeCB	112		X				
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		X				
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		X				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5',6 - PeCB	121		X				
2',3,3',4,5 - PeCB	122		X				
2',3,4,4',5 - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C X				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6 - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6 - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5 - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6 - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6 - HxCB	147	147 + 149	C X				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	C X				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C X				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C X				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2',3,4',5,6,6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				





COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-D-PS-WB-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Project No: 04-08-06-22

Contract No.: 4033

Lab Sample ID: WG15449-103 i  
 (DUP L7311-51)

Matrix: TISSUE

Sample Size: 2.57 g (wet)

Sample Receipt Date: 26-Oct-2004

Initial Calibration Date: 21-Apr-2005

Extraction Date: 06-Apr-2005

Instrument ID: HR GC/MS

Analysis Date: 18-May-2005

Time: 14:10:38

GC Column ID: SPB-OCTYL

Extract Volume (µL): 400

Sample Data Filename: PB5C\_255 S:7

Injection Volume (µL): 1.0

Blank Data Filename: PB5C\_256 S:5

Dilution Factor: 20

Cal. Ver. Data Filename: PB5C\_255 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	222	5.17	1.10	1.165
2,2',4 - TriCB	17		D B	490	4.28	1.04	1.138
2,2',5 - TriCB	18	18 + 30	C D B	1240	3.53	1.04	1.112
2,2',6 - TriCB	19		D	118	4.64	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C D B	3980	4.76	1.03	0.849

15449AD9\_1.xls, S3

Approved by: *[Signature]* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0167

WG15449-103

CLIENT ID:

LDW-T3-D-PS-WB-comp-1  
 (DUPLICATE)  
 04-08-06-22  
 PB5C\_255 S:7

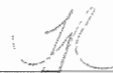
Project No.:

Sample Data Filename:

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	373	4.76	0.97	0.858
2,3,4' - TriCB	22		D	263	5.06	1.10	0.873
2,3,5 - TriCB	23		UD		5.04		
2,3,6 - TriCB	24		D J	13.1	3.09	0.90	1.157
2,3',4 - TriCB	25		D	274	4.28	1.05	0.826
2,3',5 - TriCB	26	26 + 29	C D B	1790	4.85	1.02	1.300
2,3',6 - TriCB	27		D B	210	2.96	1.06	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	1520	4.58	1.03	0.838
2,4',6 - TriCB	32		D B	479	4.60	1.08	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D J	22.3	4.91	0.95	1.271
3,3',4 - TriCB	35		UD		5.34		
3,3',5 - TriCB	36		UD		4.77		
3,4,4' - TriCB	37		D B	63.2	5.40	0.97	1.001
3,4,5 - TriCB	38		UD		4.99		
3,4',5 - TriCB	39		UD		4.70		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	1860	5.08	0.78	1.335
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	2110	5.35	0.78	1.310
2,2',3,5 - TeCB	43		D	209	5.89	0.87	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	13800	4.59	0.78	1.284
2,2',3,6 - TeCB	45	45 + 51	C D	541	4.91	0.79	1.146
2,2',3,6' - TeCB	46		D	217	5.82	0.81	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	667	4.93	0.78	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	14700	4.31	0.78	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	1220	4.79	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	20700	4.78	0.78	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D J	12.9	3.60	0.68	1.001
2,3,3',4 - TeCB	55		UD		16.9		
2,3,3',4' - TeCB	56		D	448	16.6	0.79	0.905
2,3,3',5 - TeCB	57		D	163	16.0	0.87	0.844
2,3,3',5' - TeCB	58		D	49.7	15.7	0.77	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	1290	3.87	0.80	1.301
2,3,4,4' - TeCB	60		D	1640	16.6	0.75	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	13100	15.6	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	802	15.2	0.80	0.865

15449AD9\_1.xls\_S3

Approved by



QA/QC Chemist

0168

25-05-2005  
 dd-mm-yyyy

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		D B	4550	3.80	0.79	1.347
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	11900	15.3	0.77	0.885
2,3',4,5 - TeCB	67		D	121	14.3	0.79	0.856
2,3',4,5' - TeCB	68		D	88.8	14.7	0.72	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	646	15.0	0.78	0.823
2,3',5',6 - TeCB	73		UD		3.65		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78		UD		17.1		
3,3',4,5' - TeCB	79		D	459	14.4	0.73	0.971
3,3',5,5' - TeCB	80		UD		15.2		
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	2200	22.4	1.56	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	53500	19.7	1.56	0.886
2,2',3,3',6 - PeCB	84		D	7050	22.2	1.57	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	8910	16.8	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	29800	17.1	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	6840	19.0	1.58	1.153
2,2',3,4,6' - PeCB	89		D	85.7	20.4	1.74	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	69300	17.2	1.56	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	17600	19.8	1.56	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	39100	18.3	1.56	1.118
2,2',3,5,6' - PeCB	94		D	111	19.7	1.38	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	155	2.77	1.61	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1070	17.0	1.56	1.092
2,2',4,6,6' - PeCB	104		KD J	4.97	2.82	2.57	1.001
2,3,3',4,4' - PeCB	105		D B	19200	20.7	1.53	1.000
2,3,3',4,5 - PeCB	106		UD		20.7		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAR FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C D	786	20.4	1.53	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		D	6070	19.1	1.54	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C D B	54800	14.7	1.56	0.926
2,3,3',5,5' - PeCB	111		D	129	14.7	1.58	0.946
2,3,3',5,6' - PeCB	112		UD		14.9		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		D	1200	20.9	1.49	1.001
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		D B	69200	20.0	1.53	1.001
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	598	14.4	1.55	0.959
2,3',4,5',6' - PeCB	121		D	56.3	14.4	1.71	1.197
2',3,3',4,5' - PeCB	122		D	79.3	21.8	1.53	1.010
2',3,4,4',5' - PeCB	123		D	520	21.4	1.46	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126						
3,3',4,5,5' - PeCB	127		D	182	20.4	1.52	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	19100	19.0	1.25	0.960
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	176000	18.8	1.25	0.929
2,2',3,3',4,5' - HxCB	130		D	8800	23.8	1.28	0.914
2,2',3,3',4,6' - HxCB	131		D	653	21.8	1.32	1.158
2,2',3,3',4,6' - HxCB	132		D	22100	22.4	1.26	1.174
2,2',3,3',5,5' - HxCB	133		D	3790	21.6	1.26	1.190
2,2',3,3',5,6' - HxCB	134	134 + 143	C D	4410	22.1	1.23	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	53100	2.28	1.27	1.103
2,2',3,3',6,6' - HxCB	136		D B	9990	1.74	1.27	1.024
2,2',3,4,4',5' - HxCB	137		D	5780	21.6	1.24	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C D	2140	19.9	1.25	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	23000	21.1	1.25	0.904
2,2',3,4,5,6' - HxCB	142		UD		22.9		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		D	5580	2.36	1.27	1.121
2,2',3,4,6,6' - HxCB	145		UD		1.79		
2,2',3,4',5,5' - HxCB	146		D	36500	20.2	1.25	0.885
2,2',3,4',5,6' - HxCB	147	147 + 149	C D B	87400	19.6	1.26	1.132
2,2',3,4',5,0' - HxCB	140		D	621	2.30	1.33	1.083
2,2',3,4',5,6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	27600	11.8	0.91	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	12300	13.2	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	17800	0.205	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	3100	0.152	0.92	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	29300	0.207	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	3720	0.152	0.91	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	6190	0.167	0.89	1.000
2,2',3,4,4',5,5',6 - OcCB	203		D B	23400	0.189	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D JB	3.28	0.156	0.84	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	1320	9.75	0.93	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	5000	6.69	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	779	5.72	0.75	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	805	5.98	0.78	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	110	0.150	0.62	1.001

(1) C = co-eluting congener, U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-D-PS-WB-comp-1  
(DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: WG15449-103 (DUP L7311-51)
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.57 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 15-Apr-2005 Time: 16:53:18	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_107A S: 9
Dilution Factor: N/A	Blank Data Filename: DT53_107A S: 4
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_107A S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			241	0.798	0.77	1.001
3,4,4',5 - TeCB	81			15.0	0.779	0.72	1.000
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			66.2	15.1	1.48	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			5.60	1.88	1.09	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	WG15449-103 (DUP L7311-51)
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.57 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 18-Apr-2005 Time: 2:02:44	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_195 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_195 S:7 PB5C_255 S:7 DT53_107A S: 9

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls	U		3.88
Total Dichloro Biphenyls		279	10.4
Total Trichloro Biphenyls		11100	5.40
Total Tetrachloro Biphenyls		101000	0.798
Total Pentachloro Biphenyls		388000	15.1
Total Hexachloro Biphenyls		706000	1.88
Total Heptachloro Biphenyls		560000	14.6
Total Octachloro Biphenyls		125000	13.2
Total Nonachloro Biphenyls		6590	6.69
Decachloro Biphenyl		110	0.150
TOTAL PCBs		1900000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449PCBTOTAL\_1.xls, S4

Approved by:



QA/QC Chemist

0177

26-05-2005  
dd-mm-yyyy



Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-D-PS-WB-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 2.57 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: WG15449-103  
 (DUP L7311-51)  
 GC Column ID(s): SPB-OCTYL  
 DR-1  
 Sample Datafile(s): PB5C\_255 S:7  
 PB5C\_195 S:7  
 DT53\_107A S: 9

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			241	0.798	0.0001	2.41E-02	2.41E-02
3,4,4',5-TetraCB	81			15.0	0.779	0.0001	1.50E-03	1.50E-03
2,3,3',4,4'-PentaCB	105			19200	20.7	0.0001	1.92E+00	1.92E+00
2,3,4,4',5-PentaCB	114			1200	20.9	0.0005	5.98E-01	5.98E-01
2,3',4,4',5-PentaCB	118			69200	20.0	0.0001	6.92E+00	6.92E+00
2',3,4,4',5-PentaCB	123			520	21.4	0.0001	5.20E-02	5.20E-02
3,3',4,4',5-PentaCB	126			66.2	15.1	0.1	6.62E+00	6.62E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	15400	19.9	0.0005	7.69E+00	7.69E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			4590	16.0	0.00001	4.59E-02	4.59E-02
3,3',4,4',5,5'-HexaCB	169			5.60	1.88	0.01	5.60E-02	5.60E-02
2,3,3',4,4',5,5'-HeptaCB	189			1730	14.6	0.0001	1.73E-01	1.73E-01
<b>TOTAL TEQ</b>							<b>24.1</b>	<b>24.1</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-ES-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 18-Apr-2005

Time: 3:06:59

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 05-Aug-2004

Project No.: 04 08 06 22

Lab Sample ID: L7311-92R

Sample Size: 2.42 g (wet)

Initial Calibration Date: 09-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_195 S:8

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_195 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	12.5	2.35	3.37	1.001
3 - MoCB	2		UD		2.59		
4 - MoCB	3		UD		2.87		
2,2' - DiCB	4		D B	396	7.65	1.50	1.001
2,3 - DiCB	5		D J	15.9	5.22	1.56	1.195
2,3' - DiCB	6		D	326	4.96	1.52	1.173
2,4 - DiCB	7		D	33.1	4.86	1.45	1.153
2,4' - DiCB	8		D B	960	4.61	1.56	1.204
2,5 - DiCB	9		D	67.7	4.88	1.62	1.141
2,6 - DiCB	10		D J	24.5	5.05	1.55	1.012
3,3' - DiCB	11		U JB	7.38	5.29	1.39	0.968
3,4 - DiCB	12	12 + 13	C D JB	14.9	5.22	1.58	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		5.00		
4,4' - DiCB	15		D B	88.5	6.18	1.35	1.000
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls, S6

Approved by:



QA/QC Chemist

25-05-2005  
dd-mm-yyyy

0180

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5',6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C X				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C X				
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		X				
2,3,3',4',6 - PeCB	110	110 + 115	C X				
2,3,3',5,5' - PeCB	111		X				
2,3,3',5,6 - PeCB	112		X				
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		X				
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		X				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5',6 - PeCB	121		X				
2',3,3',4,5 - PeCB	122		X				
2',3,4,4',5 - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C X				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6 - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6 - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5 - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6 - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6 - HxCB	147	147 + 149	C X				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	C X				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	C X				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C X				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C X				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C X				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2',3,4',5,6,6' - HpCB	100		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-ES-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 18-May-2005

Time: 5:29:48

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 05-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-92R i

Sample Size: 2.42 g (wet)

Initial Calibration Date: 19-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL


Sample Data Filename: PB5C\_254 S:10

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_254 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	1540	8.31	1.03	1.165
2,2',4 - TriCB	17		D B	3500	6.81	1.04	1.137
2,2',5 - TriCB	18	18 + 30	C D B	6630	5.57	1.03	1.113
2,2',6 - TriCB	19		D	686	7.00	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C D B	20000	6.22	1.02	0.849

15449AD7\_1.xls, S3

Approved by:  QA/QC Chemist

25-05-2005  
dd-mm-yyyy

0188



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	3650	6.27	1.05	0.858
2,3,4' - TriCB	22		D	3690	6.61	1.02	0.873
2,3,5 - TriCB	23		D J	15.4	6.59	1.08	1.281
2,3,6 - TriCB	24		D	95.8	4.94	0.99	1.158
2,3',4 - TriCB	25		D	949	5.52	1.04	0.826
2,3',5 - TriCB	26	26 + 29	C D B	2750	6.45	1.02	1.300
2,3',6 - TriCB	27		D B	864	4.76	1.06	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	10100	5.92	1.02	0.838
2,4',6 - TriCB	32		D B	3050	6.03	1.03	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	77.3	6.47	0.93	1.272
3,3',4 - TriCB	35		UD		6.87		
3,3',5 - TriCB	36		UD		6.25		
3,4,4' - TriCB	37		D B	526	7.25	0.99	1.002
3,4,5 - TriCB	38		D	42.9	6.47	0.99	0.969
3,4',5 - TriCB	39		UD		6.07		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	11400	6.63	0.78	1.335
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	8890	6.99	0.78	1.311
2,2',3,5 - TeCB	43		D	1150	8.00	0.72	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	28000	5.97	0.78	1.285
2,2',3,6 - TeCB	45	45 + 51	C D	4180	6.54	0.79	1.146
2,2',3,6' - TeCB	46		D	743	7.71	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	3860	6.45	0.78	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	26900	5.63	0.79	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	3790	6.28	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	43600	6.13	0.78	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D	52.8	4.53	0.68	1.001
2,3,3',4 - TeCB	55		D	271	21.7	0.72	0.890
2,3,3',4' - TeCB	56		D	5810	20.8	0.79	0.905
2,3,3',5 - TeCB	57		D	170	20.2	0.78	0.844
2,3,3',5' - TeCB	58		D	76.2	19.7	0.78	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	3650	6.08	0.78	1.301
2,3,4,4' - TeCB	60		D	9230	21.2	0.78	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	54600	20.3	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	1670	19.5	0.76	0.865



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	15200	4.91	0.79	1.347
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	37600	19.5	0.78	0.885
2,3',4,5 - TeCB	67		UD		18.2		
2,3',4,5' - TeCB	68		D	221	18.5	0.71	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	402	19.2	0.76	0.824
2,3',5',6 - TeCB	73		UD		4.70		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78		UD		21.9		
3,3',4,5' - TeCB	79		D	750	17.6	0.70	0.971
3,3',5,5' - TeCB	80		UD		19.6		
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	5460	15.3	1.54	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	53800	13.2	1.57	0.886
2,2',3,3',6 - PeCB	84		D	10500	15.4	1.57	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	15400	11.4	1.58	0.921
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	47100	11.6	1.56	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	10700	13.4	1.57	1.153
2,2',3,4,6' - PeCB	89		D	444	14.1	1.53	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	96500	11.9	1.55	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	17200	13.5	1.57	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	48900	12.8	1.56	1.119
2,2',3,5,6' - PeCB	94		D	221	13.9	1.54	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	304	3.87	1.59	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1260	11.8	1.60	1.092
2,2',4,6,6' - PeCB	104		D J	15.2	3.51	1.39	1.001
2,3,3',4,4' - PeCB	105		D B	30000	20.1	1.54	1.000
2,3,3',4,5 - PeCB	106		UD		19.1		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	2210	19.9	1.57	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	5730	17.8	1.52	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C D B	73300	10.2	1.56	0.926
2,3,3',5,5' - PeCB	111		D	57.6	10.2	1.73	0.946
2,3,3',5,6 - PeCB	112		UD		10.7		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		D	1960	21.0	1.59	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		D B	86700	19.6	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	363	9.78	1.52	0.958
2,3',4,5',6 - PeCB	121		D J	28.0	9.96	1.40	1.197
2',3,3',4,5 - PeCB	122		D	274	21.2	1.43	1.010
2',3,4,4',5 - PeCB	123		D	1660	21.7	1.58	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127		D	148	20.0	1.75	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	14800	13.8	1.26	0.959
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	128000	13.7	1.25	0.929
2,2',3,3',4,5' - HxCB	130		D	6620	17.5	1.28	0.913
2,2',3,3',4,6 - HxCB	131		D	862	16.5	1.20	1.158
2,2',3,3',4,6' - HxCB	132		D	23000	16.6	1.26	1.173
2,2',3,3',5,5' - HxCB	133		D	2210	16.2	1.24	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	4190	16.5	1.25	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	39800	4.18	1.26	1.103
2,2',3,3',6,6' - HxCB	136		D B	10200	3.21	1.27	1.024
2,2',3,4,4',5 - HxCB	137		U	4390	15.6	1.24	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	1830	14.9	1.22	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	18600	15.7	1.25	0.904
2,2',3,4,5,6 - HxCB	142		UD		16.6		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		D	5110	4.21	1.28	1.121
2,2',3,4,6,6' - HxCB	145		KD J	19.3	3.28	1.52	1.034
2,2',3,4',5,5' - HxCB	146		D	20600	14.4	1.25	0.885
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	81100	14.7	1.26	1.132
2,2',3,4',5,6' - HxCB	148		D	227	4.35	1.27	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	239	3.09	1.25	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	57.2	3.11	1.22	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	136000	12.3	1.25	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	14.7	2.51	1.24	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	12200	15.0	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	10100	11.3	1.24	0.938
2,3,3',4,5,5' - HxCB	159		D	769	11.7	1.31	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		11.7		
2,3,3',4',5,5' - HxCB	162		D	359	11.6	1.25	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	5930	12.0	1.29	0.921
2,3,3',5,5',6 - HxCB	165		KD	59.4	12.7	0.89	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	5040	11.2	1.25	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	22300	3.95	1.04	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	6920	4.08	1.06	1.161
2,2',3,3',4,5,5' - HpCB	172		D B	4350	4.04	1.04	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	16600	3.87	1.05	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	1040	3.75	1.02	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	2940	2.90	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	15000	4.00	1.06	1.144
2,2',3,3',5,5',6 - HpCB	178		D	6190	3.95	1.06	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	9650	2.82	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	54800	3.25	1.04	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	193	3.72	1.10	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	185	3.80	0.96	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	19900	3.60	1.05	1.126
2,2',3,4,4',6,6' - HpCB	184		D J B	18.2	2.71	1.15	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		2.91		
2,2',3,4',5,5',6 - HpCB	187		D B	38600	3.48	1.05	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	57.9	2.65	1.17	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	879	9.88	1.02	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	5480	2.97	1.06	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	970	2.97	1.04	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		3.16		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	8600	4.51	0.89	0.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	3230	5.03	0.88	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	4390	0.298	0.92	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	1250	0.227	0.93	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	10000	0.301	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	1260	0.233	0.92	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	2410	0.255	0.87	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	6970	0.275	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		KD JB	3.24	0.234	2.01	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	448	3.73	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	2150	10.9	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	238	9.24	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	582	9.81	0.77	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	290	0.260	0.66	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-ES-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 06-Apr-2005  
Analysis Date: 16-Apr-2005 Time: 9:18:36  
Extract Volume (µL): 20  
Injection Volume (µL): 2.0  
Dilution Factor: N/A  
Concentration Units : ng/kg (wet weight basis)

Sample Collection: 05-Aug-2004  
Project No.: 04-08-06-22  
Lab Sample ID: L7311-92R i  
Sample Size: 2.42 g (wet)  
Initial Calibration Date: 04-Apr-2005  
Instrument ID: HR GC/MS  
GC Column ID: DB-1  
Sample Datafile: DT53\_108B S: 4  
Blank Data Filename: DT53\_107A S: 4  
Cal. Ver. Data Filename: DT53\_108B S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			1130	0.288	0.77	1.001
3,4,4',5 - TeCB	81			92.5	0.279	0.80	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			139	30.4	1.59	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		3.57		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	05-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-92R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.42 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 18-Apr-2005 Time: 3:06:59	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_195 S:1
Concentration Units: ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_195 S:8 PB5C_254 S:10 DT53_108B S: 4

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		12.5	2.87
Total Dichloro Biphenyls		1930	7.65
Total Trichloro Biphenyls		58100	8.31
Total Tetrachloro Biphenyls		263000	0.288
Total Pentachloro Biphenyls		510000	30.1
Total Hexachloro Biphenyls		532000	3.57
Total Heptachloro Biphenyls		206000	9.88
Total Octachloro Biphenyls		38600	5.03
Total Nonachloro Biphenyls		2970	10.9
Decachloro Biphenyl		290	0.260
TOTAL PCBs		1610000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-M-ES-WB-comp-4

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 18-Apr-2005

Time: 4:11:17

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 02-Aug-2004

Project No.: 04-06-06-22

Lab Sample ID: L7311-94R

Sample Size: 2.46 g (wet)

Initial Calibration Date: 09-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_195 S:9

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_195 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	22.5	3.36	3.05	1.001
3 - MoCB	2		UD		3.58		
4 - MoCB	3		UD		3.82		
2,2' - DiCB	4		D B	1020	14.7	1.53	1.001
2,3 - DiCB	5		D	34.1	9.44	1.61	1.196
2,3' - DiCB	6		D	695	8.97	1.51	1.173
2,4 - DiCB	7		D	80.6	8.77	1.59	1.153
2,4' - DiCB	8		D B	2570	8.32	1.53	1.204
2,5 - DiCB	9		D	167	8.81	1.48	1.143
2,6 - DiCB	10		D	56.5	9.13	1.54	1.012
3,3' - DiCB	11		U B	263	9.56	1.38	0.973
3,4 - DiCB	12	12 + 13	C D JB	28.8	9.43	1.35	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		9.04		
4,4' - DiCB	15		D B	390	10.9	1.51	1.001
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	18 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls, S7

Approved by: *[Signature]* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0201



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-M-ES-WB-comp-4

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 18-May-2005

Time: 6:34:05

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 20

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 02-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-94R i

Sample Size: 2.46 g (wet)

Initial Calibration Date: 19-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL


Sample Data Filename: PB5C\_254 S:11

Blank Data Filename: PB5C\_256 S:5

Cal. Ver. Data Filename: PB5C\_254 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	3780	8.22	1.00	1.165
2,2',4 - TriCB	17		D B	8700	6.74	1.04	1.137
2,2',5 - TriCB	18	18 + 30	C D B	14700	5.51	1.03	1.113
2,2',6 - TriCB	19		D	1440	7.12	1.03	1.001
2,3,3' - TriCB	20	20 + 28	C D B	42700	7.67	1.03	0.849

15449AD7\_1.xls, S4

Approved by:  QA/QC Chemist

0209

25-05-2005  
 dd-mm-yyyy

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	9010	7.73	1.05	0.858
2,3,4' - TriCB	22		D	8300	8.16	1.04	0.873
2,3,5 - TriCB	23		D	32.8	8.14	0.98	1.281
2,3,6 - TriCB	24		D	232	4.89	1.01	1.158
2,3',4 - TriCB	25		D	1940	6.82	1.02	0.826
2,3',5 - TriCB	26	26 + 29	C D B	5770	7.96	1.04	1.300
2,3',6 - TriCB	27		D B	1660	4.71	1.04	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	24500	7.31	1.02	0.838
2,4',6 - TriCB	32		D B	7210	7.45	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	155	7.98	1.04	1.272
3,3',4 - TriCB	35		UD		8.48		
3,3',5 - TriCB	36		UD		7.71		
3,4,4' - TriCB	37		D B	2450	8.74	1.04	1.001
3,4,5 - TriCB	38		D	75.4	7.99	1.10	0.969
3,4',5 - TriCB	39		UD		7.49		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	22100	7.03	0.78	1.334
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	15300	7.42	0.79	1.310
2,2',3,5 - TeCB	43		D	2190	8.48	0.77	1.244
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	48500	6.33	0.79	1.284
2,2',3,6 - TeCB	45	45 + 51	C D	7710	6.93	0.79	1.145
2,2',3,6' - TeCB	46		D	1330	8.18	0.79	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	8050	6.84	0.79	1.271
2,2',4,5' - TeCB	49	49 + 69	C D B	46000	5.97	0.79	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	6750	6.66	0.77	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	75200	6.50	0.79	1.232
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D	115	4.91	0.79	1.001
2,3,3',4 - TeCB	55		D	402	27.8	0.76	0.891
2,3,3',4' - TeCB	56		D	10600	26.6	0.78	0.906
2,3,3',5 - TeCB	57		D	310	25.8	0.74	0.845
2,3,3',5' - TeCB	58		D	154	25.2	0.81	0.853
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	6040	5.33	0.79	1.300
2,3,4,4' - TeCB	60		D	16100	27.0	0.78	0.912
2,3,4,5 - TeCB	61	01 + 70 + 74 + 70	C D D	98300	25.9	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	2940	24.9	0.78	0.865

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	11700	5.22	0.89	0.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	4690	5.82	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	6940	0.327	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	1870	0.249	0.92	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	14200	0.330	0.89	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	1810	0.256	0.91	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	3210	0.283	0.91	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	9960	0.302	0.92	0.920
2,2',3,4,4',5,6,6' - OcCB	204		UD		0.257		
2,3,3',4,4',5,5',6 - OcCB	205		D B	649	4.26	0.89	1.001
2,2',3,3',4,4',5,5',6 - NoCB	206		D	3020	9.42	0.79	1.001
2,2',3,3',4,4',5,6,6' - NoCB	207		D	365	8.03	0.75	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	793	8.59	0.76	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	401	0.214	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-ES-WB-comp-4

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 16-Apr-2005

Extract Volume (µL): 20

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 02-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-94R i

Sample Size: 2.46 g (wet)

Initial Calibration Date: 04-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: DB-1

Sample Datafile: DT53\_108B S: 5

Blank Data Filename: DT53\_107A S: 4

Cal. Ver. Data Filename: DT53\_108B S: 1

Time: 9:58:18

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			2070	0.643	0.78	1.001
3,4,4',5 - TeCB	81			165	0.674	0.75	1.000
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			185	43.1	1.59	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			3.73	3.13	1.05	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by: *Manuel* QA/QC Chemist

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	02-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-94R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.46 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 18-Apr-2005 Time: 4:11:17	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_195 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_195 S:9 PB5C_254 S:11 DT53_108B S: 5

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		22.5	3.82
Total Dichloro Biphenyls		5310	14.7
Total Trichloro Biphenyls		133000	8.74
Total Tetrachloro Biphenyls		463000	0.674
Total Pentachloro Biphenyls		755000	43.1
Total Hexachloro Biphenyls		769000	3.13
Total Heptachloro Biphenyls		297000	12.3
Total Octachloro Biphenyls		55100	5.82
Total Nonachloro Biphenyls		4170	9.42
Decachloro Biphenyl		401	0.214
TOTAL PCBs		2480000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 02-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-94R i

Sample Size: 2.46 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s):  
 DB-1  
 PB5C\_254 S:11  
 PB5C\_195 S:9  
 DT53\_108B S: 5

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			2070	0.643	0.0001	2.07E-01	2.07E-01
3,4,4',5-TetraCB	81			165	0.674	0.0001	1.65E-02	1.65E-02
2,3,3',4,4'-PentaCB	105			43600	19.6	0.0001	4.36E+00	4.36E+00
2,3,4,4',5-PentaCB	114			2800	18.9	0.0005	1.40E+00	1.40E+00
2,3',4,4',5-PentaCB	118			120000	17.4	0.0001	1.20E+01	1.20E+01
2',3,4,4',5-PentaCB	123			2430	20.1	0.0001	2.43E-01	2.43E-01
3,3',4,4',5-PentaCB	126			185	43.1	0.1	1.85E+01	1.85E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	17100	21.0	0.0005	8.56E+00	8.56E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			6890	16.3	0.00001	6.89E-02	6.89E-02
3,3',4,4',5,5'-HexaCB	169			3.73	3.13	0.01	3.73E-02	3.73E-02
2,3,3',4,4',5,5'-HeptaCB	189			1110	12.3	0.0001	1.11E-01	1.11E-01
<b>TOTAL TEQ</b>							<b>45.5</b>	<b>45.5</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-ES-WB-comp-3

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 01 08 06 22

Matrix: TISSUE

Lab Sample ID: L7311-99R

Sample Receipt Date: 26-Oct-2004

Sample Size: 2.74 g (wet)

Extraction Date: 06-Apr-2005

Initial Calibration Date: 09-Apr-2005

Analysis Date: 18-Apr-2005

Time: 5:15:34

Instrument ID: HR GC/MS

Extract Volume (µL): 400

GC Column ID: SPB-OCTYL

Injection Volume (µL): 1.0

Sample Data Filename: PB5C\_195 S:10

Dilution Factor: 20

Blank Data Filename: PB5C\_256 S:5

Concentration Units : ng/kg (wet weight basis)

Cal. Ver. Data Filename: PB5C\_195 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	15.5	2.52	3.35	1.001
3 - MoCB	2		UD		2.66		
4 - MoCB	3		UD		2.83		
2,2' - DiCB	4		D B	443	10.5	1.47	1.001
2,3 - DiCB	5		D J	18.6	7.05	1.36	1.196
2,3' - DiCB	6		D	356	6.70	1.53	1.173
2,4 - DiCB	7		D	36.9	6.55	1.50	1.153
2,4' - DiCB	8		D B	1170	6.22	1.48	1.204
2,5 - DiCB	9		D	65.8	6.58	1.64	1.143
2,6 - DiCB	10		D J	24.3	6.82	1.73	1.012
3,3' - DiCB	11		UD		7.14		
3,4 - DiCB	12	12 + 13	C D JB	14.0	7.04	1.39	0.986
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		6.75		
4,4' - DiCB	15		D B	124	8.34	1.48	1.000
2,2',3 - TriCB	16		X				
2,2',4 - TriCB	17		X				
2,2',5 - TriCB	18	10 + 30	C X				
2,2',6 - TriCB	19		X				
2,3,3' - TriCB	20	20 + 28	C X				

15449AD5\_1.xls, S8

Approved by: *Klaus Horn* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0222



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C X				
2,3,4' - TriCB	22		X				
2,3,5 - TriCB	23		X				
2,3,6 - TriCB	24		X				
2,3',4 - TriCB	25		X				
2,3',5 - TriCB	26	26 + 29	C X				
2,3',6 - TriCB	27		X				
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		X				
2,4',6 - TriCB	32		X				
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		X				
3,3',4 - TriCB	35		X				
3,3',5 - TriCB	36		X				
3,4,4' - TriCB	37		X				
3,4,5 - TriCB	38		X				
3,4',5 - TriCB	39		X				
2,2',3,3' - TeCB	40	40 + 41 + 71	C X				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		X				
2,2',3,5 - TeCB	43		X				
2,2',3,5' - TeCB	44	44 + 47 + 65	C X				
2,2',3,6 - TeCB	45	45 + 51	C X				
2,2',3,6' - TeCB	46		X				
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		X				
2,2',4,5' - TeCB	49	49 + 69	C X				
2,2',4,6 - TeCB	50	50 + 53	C X				
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		X				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		X				
2,3,3',4 - TeCB	55		X				
2,3,3',4' - TeCB	56		X				
2,3,3',5 - TeCB	57		X				
2,3,3',5' - TeCB	58		X				
2,3,3',6 - TeCB	59	59 + 62 + 75	C X				
2,3,4,4' - TeCB	60		X				
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C X				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		X				

*AR*

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		X				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		X				
2,3',4,5 - TeCB	67		X				
2,3',4,5' - TeCB	68		X				
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		X				
2,3',5',6 - TeCB	73		X				
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4',4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		X				
3,3',4,5' - TeCB	79		X				
3,3',5,5' - TeCB	80		X				
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		X				
2,2',3,3',5 - PeCB	83	83 + 99	C X				
2,2',3,3',6 - PeCB	84		X				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C X				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C X				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C X				
2,2',3,4,6' - PeCB	89		X				
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C X				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		X				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C X				
2,2',3,5,6' - PeCB	94		X				
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		X				
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		X				
2,2',4,6,6' - PeCB	104		X				
2,3,3',4,4' - PeCB	105		X				
2,3,3',4,5 - PeCB	106		X				



COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C X				
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		X				
2,3,3',4',6 - PeCB	110	110 + 115	C X				
2,3,3',5,5' - PeCB	111		X				
2,3,3',5,6 - PeCB	112		X				
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		X				
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		X				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		X				
2,3',4,5',6 - PeCB	121		X				
2',3,3',4,5 - PeCB	122		X				
2',3,4,4',5 - PeCB	123		X				
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		X				
2,2',3,3',4,4' - HxCB	128	128 + 166	C X				
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C X				
2,2',3,3',4,5' - HxCB	130		X				
2,2',3,3',4,6 - HxCB	131		X				
2,2',3,3',4,6' - HxCB	132		X				
2,2',3,3',5,5' - HxCB	133		X				
2,2',3,3',5,6 - HxCB	134	134 + 143	C X				
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C X				
2,2',3,3',6,6' - HxCB	136		X				
2,2',3,4,4',5 - HxCB	137		X				
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C X				
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		X				
2,2',3,4,5,6 - HxCB	142		X				
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		X				
2,2',3,4,6,6' - HxCB	145		X				
2,2',3,4',5,5' - HxCB	146		X				
2,2',3,4',5,6 - HxCB	147	147 + 149	C X				
2,2',3,4',5,6' - HxCB	148		X				
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		X				
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		X				
2,2',4,4',5,5' - HxCB	153	153 + 168	CX				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		X				
2,3,3',4,4',5 - HxCB	156	156 + 157	CX				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		X				
2,3,3',4,5,5' - HxCB	159		X				
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		X				
2,3,3',4',5,5' - HxCB	162		X				
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		X				
2,3,3',5,5',6 - HxCB	165		X				
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		X				
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		X				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	CX				
2,2',3,3',4,5,5' - HpCB	172		X				
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		X				
2,2',3,3',4,5',6 - HpCB	175		X				
2,2',3,3',4,6,6' - HpCB	176		X				
2,2',3,3',4',5,6 - HpCB	177		X				
2,2',3,3',5,5',6 - HpCB	178		X				
2,2',3,3',5,6,6' - HpCB	179		X				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	CX				
2,2',3,4,4',5,6 - HpCB	181		X				
2,2',3,4,4',5,6' - HpCB	182		X				
2,2',3,4,4',5',6 - HpCB	183	183 + 185	CX				
2,2',3,4,4',6,6' - HpCB	184		X				
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		X				
2,2',3,4',5,5',6 - HpCB	187		X				
2,2',3,4',5,6,6' - HpCB	188		X				
2,3,3',4,4',5,5' - HpCB	189		X				
2,3,3',4,4',5,6 - HpCB	190		X				
2,3,3',4,4',5',6 - HpCB	191		X				
2,3,3',4,5,5',6 - HpCB	192		X				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		X				
2,2',3,3',4,4',5,6 - OcCB	195		X				
2,2',3,3',4,4',5,6' - OcCB	196		X				
2,2',3,3',4,4',6,6' - OcCB	107	197 + 200	C X				
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C X				
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		X				
2,2',3,3',5,5',6,6' - OcCB	202		X				
2,2',3,4,4',5,5',6 - OcCB	203		X				
2,2',3,4,4',5,6,6' - OcCB	204		X				
2,3,3',4,4',5,5',6 - OcCB	205		X				
2,2',3,3',4,4',5,5',6 - NoCB	206		X				
2,2',3,3',4,4',5,6,6' - NoCB	207		X				
2,2',3,3',4,5,5',6,6' - NoCB	208		X				
2,2',3,3',4,4',5,5',6,6' - DeCB	209		X				

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-ES-WB-comp-3

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-99R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.74 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 21-Apr-2005
Analysis Date: 18-May-2005 Time: 13:06:20	Instrument ID: HR GC/MS
Extract Volume (µL): 400	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_255 S:6
Dilution Factor: 20	Blank Data Filename: PB5C_256 S:5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_255 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16		D	2040	3.42	1.06	1.165
2,2',4 - TriCB	17		D B	4720	2.83	1.05	1.137
2,2',5 - TriCB	18	18 + 30	C D B	7730	2.33	1.04	1.112
2,2',6 - TriCB	19		D	729	3.10	1.08	1.001
2,3,3' - TriCB	20	20 + 28	C D B	23600	4.63	1.02	0.849

15449AD9\_1.xls. S2

Approved by *Handwritten Signature* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0230

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	6130	4.63	1.02	0.858
2,3,4' - TriCB	22		D	4270	4.93	1.03	0.873
2,3,5 - TriCB	23		D J	18.6	4.91	1.04	1.281
2,3,6 - TriCB	24		D	103	2.04	1.02	1.157
2,3',4 - TriCB	25		D	1370	4.17	1.03	0.826
2,3',5 - TriCB	26	26 + 29	C D B	3940	4.73	1.02	1.300
2,3',6 - TriCB	27		D B	917	1.95	1.02	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	13400	4.46	1.02	0.838
2,4',6 - TriCB	32		D B	4060	4.48	1.02	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	121	4.78	1.06	1.271
3,3',4 - TriCB	35		UD		5.20		
3,3',5 - TriCB	36		UD		4.64		
3,4,4' - TriCB	37		D B	654	5.20	0.99	1.002
3,4,5 - TriCB	38		D	60.3	4.86	0.99	0.969
3,4',5 - TriCB	39		UD		4.57		
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	17000	4.12	0.78	1.334
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	11200	4.34	0.78	1.310
2,2',3,5 - TeCB	43		D	1630	4.77	0.79	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	36700	3.72	0.78	1.284
2,2',3,6 - TeCB	45	45 + 51	C D	5490	3.98	0.78	1.146
2,2',3,6' - TeCB	46		D	876	4.71	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	6780	3.99	0.78	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	40800	3.49	0.78	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	4810	3.88	0.78	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	02000	3.00	0.70	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D	67.9	2.95	0.86	1.001
2,3,3',4 - TeCB	55		D	304	20.7	0.81	0.890
2,3,3',4' - TeCB	56		D	7310	20.3	0.78	0.905
2,3,3',5 - TeCB	57		D	317	19.7	0.78	0.844
2,3,3',5' - TeCB	58		D	130	19.2	0.70	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	4930	3.14	0.79	1.301
2,3,4,4' - TeCB	60		D	10900	20.4	0.78	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	79900	19.1	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	03		D	2500	18.7	0.76	0.865

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	21300	3.08	0.79	1.347
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	50800	18.7	0.77	0.885
2,3',4,5 - TeCB	67		D	888	17.6	0.77	0.857
2,3',4,5' - TeCB	68		D	517	18.0	0.86	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	936	18.4	0.78	0.823
2,3',5',6 - TeCB	73		UD		2.96		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78		UD		21.0		
3,3',4,5' - TeCB	79		D	1140	17.6	0.74	0.971
3,3',5,5' - TeCB	80		UD		18.6		
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82		D	8370	11.9	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	94000	10.5	1.57	0.886
2,2',3,3',6 - PeCB	84		D	15400	11.8	1.57	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	23800	8.90	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	76300	9.07	1.56	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	17200	10.1	1.57	1.154
2,2',3,4,6' - PeCB	89		D	759	10.8	1.62	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	165000	9.15	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	28100	10.5	1.56	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	71000	9.72	1.57	1.120
2,2',3,5,6' - PeCB	94		D	348	10.5	1.50	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	478	1.85	1.57	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,6,6' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1950	9.05	1.55	1.092
2,2',4,6,6' - PeCB	104		D J	18.8	1.82	1.48	1.001
2,3,3',4,4' - PeCB	105		D B	40000	12.2	1.54	1.000
2,3,3',4,5 - PeCB	106		UD		11.9		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C D	3750	11.8	1.54	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		D	9650	11.0	1.55	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C D B	131000	7.81	1.57	0.926
2,3,3',5,5' - PeCB	111		D	130	7.80	1.42	0.946
2,3,3',5,6' - PeCB	112		UD		7.94		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		D	2960	12.2	1.54	1.001
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		D B	131000	11.2	1.53	1.001
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	747	7.67	1.59	0.958
2,3',4,5',6' - PeCB	121		D	50.2	7.63	1.78	1.198
2',3,3',4,5' - PeCB	122		D	367	12.6	1.40	1.010
2',3,4,4',5' - PeCB	123		D	2160	12.7	1.56	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126						
3,3',4,5,5' - PeCB	127		D	296	11.8	1.42	1.041
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	26500	17.2	1.25	0.959
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	237000	17.0	1.25	0.929
2,2',3,3',4,5' - HxCB	130		D	11600	21.5	1.28	0.914
2,2',3,3',4,6' - HxCB	131		D	1510	19.8	1.30	1.158
2,2',3,3',4,6' - HxCB	132		D	39900	20.3	1.26	1.173
2,2',3,3',5,5' - HxCB	133		D	3950	19.6	1.28	1.190
2,2',3,3',5,6' - HxCB	134	134 + 143	C D	7650	20.0	1.26	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	63700	2.16	1.26	1.102
2,2',3,3',6,6' - HxCB	136		D B	15800	1.64	1.25	1.024
2,2',3,4,4',5' - HxCB	137		D	8800	10.6	1.11	0.018
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C D	3790	18.0	1.26	1.151
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	35000	19.1	1.26	0.904
2,2',3,4,5,6' - HxCB	142		UD		20.7		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		D	9230	2.23	1.27	1.121
2,2',3,4,6,6' - HxCB	145		D	36.7	1.69	1.26	1.033
2,2',3,4',5,5' - HxCB	146		D	38000	18.3	1.25	0.885
2,2',3,4',5,6' - HxCB	147	147 + 149	C D B	147000	17.7	1.25	1.132
2,2',3,4',5,0' - HxCB	148		D	484	2.26	1.34	1.083
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	332	1.62	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	104	1.57	1.17	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	251000	15.3	1.25	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	19.2	1.38	1.22	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	19200	18.5	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	20500	13.9	1.25	0.938
2,3,3',4,5,5' - HxCB	159		D	1490	14.6	1.27	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		14.2		
2,3,3',4',5,5' - HxCB	162		D	555	14.5	1.22	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	11600	14.8	1.36	0.921
2,3,3',5,5',6 - HxCB	165		D	136	15.7	1.30	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	7700	14.2	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	39700	2.20	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	13600	2.19	1.06	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	7640	2.20	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	33100	1.98	1.04	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	1940	1.94	1.08	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	4790	1.46	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	26300	2.14	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		D	10800	2.00	1.03	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	15300	1.42	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	116000	1.78	1.04	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	396	1.99	1.01	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	408	1.97	1.04	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	41800	1.93	1.04	1.126
2,2',3,4,4',6,6' - HpCB	184		D B	33.3	1.37	1.11	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		1.49		
2,2',3,4',5,5',6 - HpCB	187		D B	73300	1.82	1.04	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	93.1	1.30	1.13	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	1130	12.0	0.96	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	11600	1.65	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	2250	1.66	1.03	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		1.70		

COMPOUND	IUPAC NO.	CO-ELUTIONS	IAR FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	13800	6.82	0.90	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	6180	7.62	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	10400	0.178	0.89	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	2240	0.133	0.88	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	17800	0.180	0.90	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	2020	0.133	0.93	1.023
2,2',3,3',5,5',6,6' - OcCB	202		D	3830	0.147	0.91	1.001
2,2',3,4,4',5,5',6 - OcCB	203		D B	14600	0.164	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		KD JB	5.46	0.136	0.72	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	871	5.55	0.87	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	3290	6.66	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	418	5.73	0.81	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	871	6.02	0.79	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	456	0.125	0.69	1.001

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-ES-WB-comp-3

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-99R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.74 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 16-Apr-2005	Instrument ID: HR GC/MS
Time: 10:37:51	GC Column ID: DB-1
Extract Volume (µL): 20	Sample Datafile: DT53_108B S: 6
Injection Volume (µL): 2.0	Blank Data Filename: DT53_107A S: 4
Dilution Factor: N/A	Cal. Ver Data Filename: DT53_108R S: 1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			1330	1.60	0.77	1.001
3,4,4',5 - TeCB	81			101	1.61	0.78	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			170	73.4	1.59	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			5.04	1.64	1.38	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-99R
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.74 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	09-Apr-2005
Analysis Date: 18-Apr-2005 Time: 5:15:34	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_195 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_195 S:10 PB5C_255 S:6 DT53_100B S: 6

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		15.5	2.83
Total Dichloro Biphenyls		2250	10.5
Total Trichloro Biphenyls		73900	5.20
Total Tetrachloro Biphenyls		371000	1.61
Total Pentachloro Biphenyls		826000	73.4
Total Hexachloro Biphenyls		962000	1.64
Total Heptachloro Biphenyls		400000	12.0
Total Octachloro Biphenyls		71800	7.62
Total Nonachloro Biphenyls		4580	6.66
Decachloro Biphenyl		456	0.125
TOTAL PCBs		2710000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-99R i

Sample Size: 2.74 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units: ng/kg (wet weight basis)

Sample Datafile(s):  
 DB-1  
 PB5C\_255 S:6  
 PB5C\_195 S:10  
 DT53\_108B S: 6

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			1330	1.60	0.0001	1.33E-01	1.33E-01
3,4,4',5-TetraCB	81			101	1.61	0.0001	1.01E-02	1.01E-02
2,3,3',4,4'-PentaCB	105			40000	12.2	0.0001	4.00E+00	4.00E+00
2,3,4,4',5-PentaCB	114			2960	12.2	0.0005	1.48E+00	1.48E+00
2,3',4,4',5-PentaCB	118			131000	11.2	0.0001	1.31E+01	1.31E+01
2',3,4,4',5-PentaCB	123			2160	12.7	0.0001	2.16E-01	2.16E-01
3,3',4,4',5-PentaCB	126			170	73.4	0.1	1.70E+01	1.70E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	19200	18.5	0.0005	9.62E+00	9.62E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			7700	14.2	0.00001	7.70E-02	7.70E-02
3,3',4,4',5,5'-HexaCB	169			5.04	1.64	0.01	5.04E-02	5.04E-02
2,3,3',4,4',5,5'-HeptaCB	189			1130	12.0	0.0001	1.13E-01	1.13E-01
<b>TOTAL TEQ</b>							<b>45.8</b>	<b>45.8</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-M-ES-WB-comp-5

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-U8-U6-22
Matrix: TISSUE	Lab Sample ID: L7311-101R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.72 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 19-Apr-2005
Analysis Date: 02-May-2005	Instrument ID: HR GC/MS
Time: 0:59:45	GC Column ID: SPB-OCTYL
Extract Volume (µL): 400	Sample Data Filename: PB5C_222A S:4
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename: PB5C_222A S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	23.1	1.69	3.13	1.001
3 - MoCB	2		D J	2.35	1.95	3.21	0.988
4 - MoCB	3		D JB	3.64	2.18	3.60	1.001
2,2' - DiCB	4		D B	701	14.1	1.52	1.001
2,3 - DiCB	5		D J	20.4	9.81	1.37	1.198
2,3' - DiCB	6		D	719	9.39	1.59	1.177
2,4 - DiCB	7		D	55.2	9.27	1.41	1.158
2,4' - DiCB	8		D B	1520	8.84	1.60	1.208
2,5 - DiCB	9		D	98.5	9.26	1.63	1.146
2,6 - DiCB	10		D	38.0	9.35	1.46	1.014
3,3' - DiCB	11		UD		10.1		
3,4 - DiCB	12	12 + 13	C D JB	26.2	9.83	1.73	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		9.62		
4,4' - DiCB	15		D B	162	12.3	1.44	0.999
2,2',3 - TriCB	16		D	2150	1.75	1.06	1.166
2,2',4 - TriCB	17		D B	5750	1.56	1.05	1.138
2,2',5 - TriCB	18	18 + 30	C D B	10300	1.25	1.05	1.113
2,2',6 - TriCB	19		D	977	1.58	1.07	1.001
2,3,3' - TriCB	20	20 + 28	C D B	27400	15.5	1.02	0.848

15449AD3\_1.xls, S2

Approved by:



QA/QC Chemist

0243

25-05-2005  
dd-mm-yyyy

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	6400	15.3	1.02	0.858
2,3,4' - TriCB	22		D	5080	16.7	1.02	0.873
2,3,5 - TriCB	23		UD		16.1		
2,3,6 - TriCB	24		D	141	1.09	1.08	1.158
2,3',4 - TriCB	25		D	1860	13.9	1.00	0.825
2,3',6 - TriCB	26	26 + 29	C D B	5470	16.1	1.02	1.300
2,3',6 - TriCB	27		D B	1360	1.08	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	14400	15.1	1.02	0.838
2,4',6 - TriCB	32		D B	4490	15.4	1.01	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	138	16.1	1.01	1.272
3,3',4 - TriCB	35		UD		17.7		
3,3',5 - TriCB	36		UD		15.6		
3,4,4' - TriCB	37		D D	881	18.1	1.04	1.002
3,4,5 - TriCB	38		D	54.3	15.3	0.94	0.968
3,4',5 - TriCB	39		D	184	15.4	0.91	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	16800	2.12	0.79	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	12100	2.24	0.79	1.311
2,2',3,5 - TeCB	43		D	2320	2.46	0.79	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	41600	1.91	0.78	1.285
2,2',3,6 - TeCB	45	45 + 51	C D	6000	2.05	0.77	1.146
2,2',3,6' - TeCB	46		D	1030	2.44	0.78	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	6310	2.10	0.79	1.273
2,2',4,5' - TeCB	49	49 + 69	C D B	43000	1.83	0.78	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	5750	1.99	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	69800	1.99	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D	74.8	1.43	0.72	1.002
2,3,3',4 - TeCB	55		UD		118		
2,3,3',4' - TeCB	56		D	8780	117	0.75	0.905
2,3,3',5 - TeCB	57		D	292	117	0.78	0.845
2,3,3',5' - TeCB	58		D	180	113	0.78	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	5330	1.59	0.78	1.301
2,3,4,4' - TeCB	60		D	10300	117	0.76	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	75000	110	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	2300	114	0.78	0.865



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		D B	20700	1.57	0.78	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	53000	114	0.77	0.885
2,3',4,5' - TeCB	67		D	954	106	0.76	0.857
2,3',4,5' - TeCB	68		n	402	113	0.72	0.832
2,3',4,6' - TeCB	69	49 + 69	C49				
2,3',4',5' - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6' - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	847	110	0.75	0.823
2,3',5',6' - TeCB	73		UD		1.58		
2,4,4',5' - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6' - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5' - TeCB	78		UD		121		
3,3',4,5' - TeCB	79		D	773	96.5	0.72	0.970
3,3',5,5' - TeCB	80		UD		108		
3,4,4',5' - TeCB	81		X				
2,2',3,3',4 - PeCB	82		D	7340	16.8	1.56	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	74300	14.7	1.58	0.886
2,2',3,3',6 - PeCB	84		D	15000	16.7	1.58	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	18400	12.5	1.58	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	61300	12.6	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	14300	14.3	1.57	1.153
2,2',3,4,6' - PeCB	89		D	594	15.5	1.64	1.181
2,2',3,4',5' - PeCB	90	90 + 101 + 113	C D B	134000	12.8	1.58	0.870
2,2',3,4',6' - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	24000	15.2	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	72000	14.0	1.57	1.120
2,2',3,5,6' - PeCB	94		D	341	15.1	1.57	1.101
2,2',3,5',6' - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	471	0.201	1.49	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6' - PeCB	103		D	1640	13.2	1.60	1.092
2,2',4,6,6' - PeCB	104		D J	17.8	0.191	1.62	1.001
2,3,3',4,4' - PeCB	105		D B	31600	45.4	1.55	1.000
2,3,3',4,5 - PeCB	106		UD		41.3		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	2840	44.3	1.60	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	7140	42.5	1.57	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C D B	106000	10.9	1.58	0.926
2,3,3',5,5' - PeCB	111		D	52 2	11 1	1 47	0 945
2,3,3',5,6 - PeCB	112		UD		11.4		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		D	1890	49.0	1.51	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		D B	102000	42.7	1.54	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	405	10.6	1.53	0.958
2,3',4,5',6 - PeCB	121		D	36.3	11.1	1.36	1.198
2',3,3',4,5 - PeCB	122		D	404	47.3	1.63	1.010
2',3,4,4',5 - PeCB	123		D	1650	48.6	1.52	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		D	188	41.4	1.35	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	16200	22.7	1.27	0.959
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	159000	22.2	1.26	0.929
2,2',3,3',4,5' - HxCB	130		D	7890	29.2	1.26	0.913
2,2',3,3',4,6 - HxCB	131		D	1180	27.7	1.31	1.159
2,2',3,3',4,6' - HxCB	132		D	31400	27.8	1.26	1.173
2,2',3,3',5,5' - HxCB	133		D	2610	27.2	1.30	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	6490	28.3	1.23	1.138
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	51900	0.558	1.26	1.103
2,2',3,3',6,6' - HxCB	136		D B	13800	0.427	1.27	1.024
2,2',3,4,4',5 - HxCB	137		D	5300	24.9	1.26	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	2690	25.3	1.30	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	24900	26.6	1.28	0.904
2,2',3,4,5,6 - HxCB	142		UD		28.1		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		D	6930	0.577	1.27	1.121
2,2',3,4,6,6' - HxCB	145		D	49.4	0.436	1.37	1.034
2,2',3,4',5,5' - HxCB	146		D	25800	24.6	1.26	0.885
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	113000	24.5	1.26	1.133
2,2',3,4',5,6' - HxCB	148		D	358	0.597	1.27	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	264	0.425	1.30	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	80.7	0.402	1.38	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	177000	20.4	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	17.2	0.329	1.22	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	13000	24.9	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	13200	17.9	1.27	0.938
2,3,3',4,5,5' - HxCB	159		D	1040	17.8	1.24	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		19.1		
2,3,3',4',5,5' - HxCB	162		D	345	17.8	1.17	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	8060	20.4	1.27	0.922
2,3,3',5,5',6 - HxCB	165		D	57.1	21.1	1.37	0.879
2,3,4,4',5,6 - HxCB	166	120 + 160	C128				
2,3',4,4',5,5' - HxCB	167		D	5270	18.8	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		D B	25600	2.96	1.06	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	7900	2.86	1.04	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	4580	2.96	1.03	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	18700	2.53	1.05	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	1080	2.54	1.05	1.101
2,2',3,3',4,6,6' - HpCB	176		D B	3420	2.07	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	15300	2.65	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178		D	6630	2.66	1.05	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	11700	2.04	1.06	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	67700	2.34	1.06	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	190	2.60	0.91	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	297	2.65	0.96	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	23200	2.44	1.04	1.126
2,2',3,4,4',6,6' - HpCB	184		D J B	20.4	1.98	1.19	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		2.10		
2,2',3,4',5,5',6 - HpCB	187		D B	43400	2.43	1.06	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	64.7	1.93	0.90	1.001
2,3,3',4,4',5,5' - HpCB	189		D B	722	14.5	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	7070	2.16	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	1170	2.21	1.07	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		2.33		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	8480	6.89	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	3580	8.02	0.91	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	5420	0.473	0.93	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	1420	0.308	0.01	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	11300	0.518	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	1330	0.399	0.88	1.022
2,2',3,3',5,5',6,6' - OcCB	202		D	2510	0.443	0.88	1.000
2,2',3,4,4',5,5',6 - OcCB	203		D B	7930	0.441	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D JB	5.82	0.408	0.76	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	492	5.67	0.94	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	1990	12.7	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	252	11.4	0.71	1.020
2,2',3,3',4,5,5',6,6' - NoCB	200		D	540	12.6	0.78	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	280	0.349	0.70	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-ES-WB-comp-5

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-101R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.72 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 16-Apr-2005	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_108B S: 7
Dilution Factor: N/A	Blank Data Filename: DT53_107A S: 4
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_108B S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			1520	1.64	0.77	1.001
3,4,4',5 - TeCB	81			105	1.73	0.76	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			131	2.63	1.49	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		4.80		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected. K – peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL. B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

*Mawsthorpe*

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-101R i
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.72 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	19-Apr-2005
Analysis Date: 02-May-2005 Time: 0:59:45	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_222A S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_222A S:4 DT53_108B S: 7

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		29.1	2.18
Total Dichloro Biphenyls		3340	14.1
Total Trichloro Biphenyls		87100	18.1
Total Tetrachloro Biphenyls		385000	1.73
Total Pentachloro Biphenyls		678000	2.63
Total Hexachloro Biphenyls		687000	4.80
Total Heptachloro Biphenyls		239000	14.5
Total Octachloro Biphenyls		42500	8.02
Total Nonachloro Biphenyls		2790	12.7
Decachloro Biphenyl		280	0.349
TOTAL PCBs		2130000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 2.72 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-101R i  
 GC Column ID(s): SPB-OCTYL  
 DB-1  
 Sample Datafile(s): PB5C\_222A S:4  
 DT53\_108B S: 7

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			1520	1.64	0.0001	1.52E-01	1.52E-01
3,4,4',5-TetraCB	81			105	1.73	0.0001	1.05E-02	1.05E-02
2,3,3',4,4'-PentaCB	105			31600	45.4	0.0001	3.16E+00	3.16E+00
2,3,4,4',5-PentaCB	114			1890	49.0	0.0005	9.43E-01	9.43E-01
2,3',4,4',5-PentaCB	118			102000	42.7	0.0001	1.02E+01	1.02E+01
2',3,4,4',5-PentaCB	123			1650	48.6	0.0001	1.65E-01	1.65E-01
3,3',4,4',5-PentaCB	126			131	2.63	0.1	1.31E+01	1.31E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	13000	24.9	0.0005	6.50E+00	6.50E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			5270	18.8	0.00001	5.27E-02	5.27E-02
3,3',4,4',5,5'-HexaCB	169		U		4.80	0.01	2.40E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			722	14.5	0.0001	7.22E-02	7.22E-02
<b>TOTAL TEQ</b>							<b>34.4</b>	<b>34.3</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

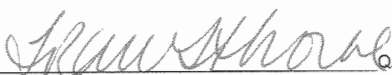
Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-ES-WB-comp-3

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-105R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.56 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 19-Apr-2005
Analysis Date: 02-May-2005	Instrument ID: HR GC/MS
Time: 2:04:02	GC Column ID: SPB-OCTYL
Extract Volume (µL): 400	Sample Data Filename: PB5C_222A S:5
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename: PB5C_222A S:1
Concentration Units : ng/kg (wct weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	9.65	2.19	2.80	1.000
3 - MoCB	2		UD		2.57		
4 - MoCB	3		D JB	3.73	2.90	2.88	1.001
2,2' - DiCB	4		D B	319	13.9	1.61	1.001
2,3 - DiCB	5		D J	10.4	10.1	1.61	1.198
2,3' - DiCB	6		D	326	9.71	1.53	1.177
2,4 - DiCB	7		D J	26.6	9.58	1.54	1.158
2,4' - DiCB	8		D B	678	9.14	1.59	1.208
2,5 - DiCB	9		D	48.7	9.58	1.39	1.146
2,6 - DiCB	10		D J	14.0	9.66	1.78	1.014
3,3' - DiCB	11		UD		10.5		
3,4 - DiCB	12	12 + 13	C D JB	14.4	10.2	1.54	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		9.94		
4,4' - DiCB	15		KD B	96.2	13.1	1.33	0.999
2,2',3 - TriCB	16		D	968	2.94	1.06	1.165
2,2',4 - TriCB	17		D B	2610	2.60	1.07	1.137
2,2',5 - TriCB	18	18 + 30	C D B	4580	2.09	1.07	1.113
2,2',6 - TriCB	19		D	490	2.76	0.99	1.001
2,3,3' - TriCB	20	20 + 28	C D B	12200	10.8	1.02	0.849

15449AD3\_1.xls, S3

Approved by:  QA/QC Chemist

25-05-2005  
 dd-mm-yyyy  
 0256



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	3060	10.7	1.03	0.858
2,3,4' - TriCB	22		D	2510	11.7	1.02	0.873
2,3,5 - TriCB	23		UD		11.3		
2,3,6 - TriCB	24		D	64.7	1.83	1.09	1.158
2,3',4 - TriCB	25		D	1700	9.75	1.00	0.826
2,3',5 - TriCB	26	26 + 29	C D B	4930	11.3	1.03	1.300
2,3',6 - TriCB	27		D B	735	1.81	1.07	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	7580	10.6	1.02	0.838
2,4',6 - TriCB	32		D B	2310	10.8	1.01	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	80.0	11.3	0.91	1.272
3,3',4 - TriCB	35		UD		12.4		
3,3',5 - TriCB	36		UD		10.9		
3,4,4' - TriCB	37		KD B	480	12.4	0.93	1.002
3,4,5 - TriCB	38		D	44.9	10.7	0.89	0.969
3,4',5 - TriCB	39		D	123	10.8	1.00	0.948
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	10300	3.24	0.79	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	6520	3.42	0.78	1.311
2,2',3,5 - TeCB	43		D	1370	3.75	0.76	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	26100	2.92	0.79	1.285
2,2',3,6 - TeCB	45	45 + 51	C D	2960	3.13	0.77	1.147
2,2',3,6' - TeCB	46		D	504	3.72	0.74	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	3620	3.20	0.79	1.273
2,2',4,5' - TeCB	49	49 + 69	C D B	35700	2.79	0.79	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	3290	3.04	0.78	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	66700	3.03	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D	49.6	2.45	0.88	1.001
2,3,3',4 - TeCB	55		UD		56.5		
2,3,3',4' - TeCB	56		D	4550	56.1	0.77	0.905
2,3,3',5 - TeCB	57		D	286	56.1	0.88	0.844
2,3,3',5' - TeCB	58		D	195	54.1	0.86	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	3360	2.43	0.79	1.300
2,3,4,4' - TeCB	60		D	5120	55.9	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	44700	52.8	0.76	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	1380	54.5	0.76	0.865

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	11600	2.40	0.78	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	29900	54.4	0.75	0.885
2,3',4,5 - TeCB	67		D	671	50.6	0.81	0.857
2,3',4,5' - TeCB	68		D	474	54.2	0.73	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	1080	52.8	0.74	0.823
2,3',5',6 - TeCB	73		UD		2.41		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		UD		57.7		
3,3',4,5' - TeCB	79		D	919	46.2	0.68	0.970
3,3',5,5' - TeCB	80		UD		51.5		
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		D	5450	22.8	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	83000	19.9	1.58	0.886
2,2',3,3',6 - PeCB	84		D	12500	22.6	1.58	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	15000	17.0	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	57500	17.0	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	18700	19.4	1.57	1.153
2,2',3,4,6' - PeCB	89		D	402	21.0	1.61	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	157000	17.4	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	25700	20.6	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	86600	19.0	1.58	1.120
2,2',3,5,6' - PeCB	94		D	240	20.5	1.50	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	329	0.307	1.57	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	3240	17.9	1.56	1.092
2,2',4,6,6' - PeCB	104		D J	18.9	0.336	1.33	1.000
2,3,3',4,4' - PeCB	105		D B	25500	43.4	1.56	1.000
2,3,3',4,5 - PeCB	106		UD		39.3		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	2250	42.3	1.56	0.990
2,3,3',4',5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	6740	40.6	1.54	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C D B	113000	14.8	1.56	0.925
2,3,3',5,5' - PeCB	111		D	63.9	15.0	1.74	0.945
2,3,3',5,6 - PeCB	112		UD		15.5		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		D	1470	43.6	1.55	1.001
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		D B	92500	39.7	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	762	14.4	1.61	0.958
2,3',4,5',6 - PeCB	121		D	70.1	15.0	1.54	1.198
2',3,3',4,5 - PeCB	122		UD		45.1		
2',3,4,4',5 - PeCB	123		D	1360	45.5	1.51	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		D	196	39.5	1.59	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	17400	78.3	1.29	0.959
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	204000	76.3	1.26	0.929
2,2',3,3',4,5' - HxCB	130		D	9490	101	1.27	0.913
2,2',3,3',4,6 - HxCB	131		D	1150	95.4	1.24	1.159
2,2',3,3',4,6' - HxCB	132		D	42000	95.9	1.27	1.173
2,2',3,3',5,5' - HxCB	133		D	3520	93.6	1.25	1.189
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	7590	97.6	1.28	1.138
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	73300	0.409	1.27	1.103
2,2',3,3',6,6' - HxCB	136		D B	22900	0.313	1.26	1.024
2,2',3,4,4',5 - HxCB	137		D	5200	85.8	1.27	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	3110	87.2	1.25	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	33400	91.5	1.27	0.904
2,2',3,4,5,6 - HxCB	142		UD		96.8		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		D	9850	0.423	1.27	1.121
2,2',3,4,6,6' - HxCB	145		D	61.3	0.320	1.40	1.034
2,2',3,4',5,5' - HxCB	146		D	35800	84.8	1.26	0.885
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	177000	84.4	1.26	1.132
2,2',3,4',5,6' - HxCB	148		D	500	0.438	1.26	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAC <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	510	0.312	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	74.3	0.295	1.35	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	262000	70.3	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	216	0.265	1.14	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	14600	84.2	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	17600	61.6	1.26	0.938
2,3,3',4,5,5' - HxCB	159		D	1730	61.4	1.25	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		66.0		
2,3,3',4',5,5' - HxCB	162		D	302	61.3	1.28	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	11400	70.2	1.26	0.922
2,3,3',5,5',6 - HxCB	165		D	89.5	72.7	1.41	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	6370	64.4	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		D B	43100	3.11	1.04	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	14400	3.02	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	7160	3.11	1.05	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	32900	2.67	1.06	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	1960	2.68	1.07	1.101
2,2',3,3',4,6,6' - HpCB	176		D B	6340	2.18	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	27800	2.79	1.06	1.144
2,2',3,3',5,5',6 - HpCB	178		D	10800	2.80	1.04	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	20500	2.15	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	115000	2.47	1.06	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	252	2.73	1.11	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	456	2.79	1.07	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	38900	2.57	1.05	1.126
2,2',3,4,4',6,6' - HpCB	184		D J B	24.0	2.09	1.10	1.024
2,2',3,4,4',5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,4',5,6' - HpCB	186		UD		2.21		
2,2',3,4',5,5',6 - HpCB	187		D B	73400	2.56	1.06	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	103	2.04	0.90	1.001
2,3,3',4,4',5,5' - HpCB	189		D B	1170	21.4	1.03	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	10700	2.28	1.06	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	2220	2.33	1.04	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		2.46		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	13900	8.05	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		D B	6260	9.37	0.91	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	8850	0.641	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	2480	0.539	0.92	1.016
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	17700	0.702	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	2420	0.542	0.86	1.022
2,2',3,3',5,5',6,6' - OcCB	202		D	3640	0.560	0.91	1.000
2,2',3,4,4',5,5',6 - OcCB	203		D B	11700	0.598	0.91	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D JB	2.64	0.554	1.00	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	779	6.93	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	2530	13.0	0.83	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	360	11.3	0.80	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	588	12.0	0.82	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	246	0.385	0.67	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-M-ES-WB-comp-3

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 06-Apr-2005

Analysis Date: 16-Apr-2005 Time: 11:57:03

Extract Volume (µL): 20

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-105R i

Sample Size: 2.56 g (wet)

Initial Calibration Date: 04-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: DB-1

Sample Datafile: DT53\_108B S: 8

Blank Data Filename: DT53\_107A S: 4

Cal Ver Data Filename: DT53\_108R S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			765	2.36	0.76	1.001
3,4,4',5 - TeCB	81			52.8	2.48	0.71	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			92.1	3.97	1.75	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		K	4.29	2.63	1.30	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL. B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 06-Apr-2005  
Analysis Date: 02-May-2005 Time: 2:04:02  
Extract Volume (µL): 400  
Injection Volume (µL): 1.0  
Dilution Factor: 20  
Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
Project No.: 04-08-06-22  
Lab Sample ID: L7311-105R i  
Sample Size: 2.56 g (wet)  
Initial Calibration Date: 19-Apr-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Blank Data Filename: PB5C\_256 S:5  
Cal. Ver. Data Filename: PB5C\_222A S:1  
Sample Datafile(s): PB5C\_222A S:5  
DT53\_108B S: 8

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		13.4	2.90
Total Dichloro Biphenyls		1440	13.9
Total Trichloro Biphenyls		44000	12.4
Total Tetrachloro Biphenyls		262000	2.48
Total Pentachloro Biphenyls		709000	3.97
Total Hexachloro Biphenyls		962000	2.63
Total Heptachloro Biphenyls		407000	21.4
Total Octachloro Biphenyls		67800	9.37
Total Nonachloro Biphenyls		3480	13.0
Decachloro Biphenyl		246	0.385
TOTAL PCBs		2460000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 2.56 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-105R i  
 GC Column ID(s): SPB-OCTYL  
 DR-1  
 Sample Datafile(s): PB5C\_222A S:5  
 DT53\_108B S: 8

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			765	2.36	0.0001	7.65E-02	7.65E-02
3,4,4',5-TetraCB	81			52.8	2.48	0.0001	5.28E-03	5.28E-03
2,3,3',4,4'-PentaCB	105			25500	43.4	0.0001	2.55E+00	2.55E+00
2,3,4,4',5-PentaCB	114			1470	43.6	0.0005	7.37E-01	7.37E-01
2,3',4,4',5-PentaCB	118			92500	39.7	0.0001	9.25E+00	9.25E+00
2',3,4,4',5-PentaCB	123			1360	45.5	0.0001	1.36E-01	1.36E-01
3,3',4,4',5-PentaCB	126			92.1	3.97	0.1	9.21E+00	9.21E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	14600	84.2	0.0005	7.28E+00	7.28E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			6370	64.4	0.00001	6.37E-02	6.37E-02
3,3',4,4',5,5'-HexaCB	169		U		2.63	0.01	1.31E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	180			1170	21.4	0.0001	1.17E-01	1.17E-01
<b>TOTAL TEQ</b>							<b>29.4</b>	<b>29.4</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-DC-HP-comp-1

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	30-Aug-2004
Contract No.: 4033	Project No.:	04-06-00-22
Matrix: TISSUE	Lab Sample ID:	L7311-155R i
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.29 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	19-Apr-2005
Analysis Date: 02-May-2005	Instrument ID:	HR GC/MS
Time: 3:08:20	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 400	Sample Data Filename:	PB5C_222A S:6
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_222A S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	8.44	2.16	3.42	1.001
3 - MoCB	2		UD		2.77		
4 - MoCB	3		D JB	6.51	3.52	2.98	1.001
2,2' - DiCB	4		D B	183	19.3	1.54	1.000
2,3 - DiCB	5		UD		15.8		
2,3' - DiCB	6		D	206	15.1	1.60	1.176
2,4 - DiCB	7		D J	19.7	14.9	1.41	1.157
2,4' - DiCB	8		D B	432	14.2	1.51	1.206
2,5 - DiCB	9		UD		14.9		
2,6 - DiCB	10		UD		15.0		
3,3' - DiCB	11		D JB	34.0	16.3	1.41	0.969
3,4 - DiCB	12	12 + 13	C D B	70.1	15.8	1.46	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		15.5		
4,4' - DiCB	15		D B	1220	22.3	1.52	1.001
2,2',3 - TriCB	16		D	676	4.08	1.08	1.165
2,2',4 - TriCB	17		D B	1660	3.62	1.05	1.138
2,2',5 - TriCB	18	18 + 30	C D B	4150	2.91	1.05	1.112
2,2',6 - TriCB	19		D	82.2	3.52	1.10	1.000
2,3,3' - TriCB	20	20 + 28	C D B	22600	7.77	1.03	0.848

15449AD3\_1.xls, S4

Approved by: *Krawshorn* QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0269

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	2070	7.66	1.03	0.857
2,3,4' - TriCB	22		D	3140	8.41	1.04	0.873
2,3,5 - TriCB	23		UD		8.10		
2,3,6 - TriCB	24		D J	27.9	2.54	1.17	1.158
2,3',4 - TriCB	25		D	2340	6.99	1.04	0.826
2,3',5 - TriCB	26	26 + 29	C D B	6880	8.08	1.02	1.299
2,3',6 - TriCB	27		D B	960	2.51	1.03	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	17900	7.57	1.02	0.837
2,4',6 - TriCB	32		D B	1890	7.71	1.00	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	55.8	8.07	0.99	1.272
3,3',4 - TriCB	35		D J	23.2	8.87	1.19	0.985
3,3',5 - TriCB	36		UD		7.81		
3,4,4' - TriCB	37		D B	3650	9.36	1.03	1.001
3,4,5 - TriCB	38		D J	24.2	7.68	1.19	0.968
3,4',5 - TriCB	39		D	120	7.73	1.07	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	8070	3.10	0.78	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	6650	3.27	0.78	1.310
2,2',3,5 - TeCB	43		D	1800	3.58	0.75	1.245
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	41400	2.79	0.79	1.284
2,2',3,6 - TeCB	45	45 + 51	C D	1090	2.99	0.78	1.146
2,2',3,6' - TeCB	46		D	262	3.56	0.79	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	3100	3.06	0.78	1.272
2,2',4,5' - TeCB	49	49 + 69	C D B	37700	2.67	0.79	1.257
2,2',4,6 - TeCB	50	50 + 53	C D B	1620	2.90	0.78	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	101000	2.90	0.79	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		UD		2.16		
2,3,3',4 - TeCB	55		UD		6460		
2,3,3',4' - TeCB	56		D	8280	6420	0.78	0.905
2,3,3',5 - TeCB	57		UD		6420		
2,3,3',5' - TeCB	58		UD		6180		
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	3610	2.32	0.79	1.300
2,3,4,4' - TeCB	60		D	9120	6390	0.78	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	83300	6030	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		UD		6230		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAD FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ADUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	14900	2.30	0.79	1.347
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	54500	6220	0.77	0.885
2,3',4,5 - TeCB	67		UD		5790		
2,3',4,5' - TeCB	68		UD		6190		
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		UD		6030		
2,3',5',6 - TeCB	73		UD		2.30		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		UD		6600		
3,3',4,5' - TeCB	79		UD		5280		
3,3',5,5' - TeCB	80		UD		5890		
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		D	5020	23.1	1.60	0.935
2,2',3,3',5 - PeCB	83	83 + 99	C D B	128000	20.2	1.57	0.886
2,2',3,3',6 - PeCB	84		D	14600	22.9	1.56	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	24100	17.2	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	70800	17.3	1.58	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	14500	19.6	1.59	1.154
2,2',3,4,6' - PeCB	89		D	104	21.2	1.67	1.181
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	215000	17.6	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	42200	20.8	1.57	0.854
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	80700	19.2	1.58	1.120
2,2',3,5,6' - PeCB	94		D	241	20.8	1.38	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	83.0	1.44	1.39	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1930	18.1	1.63	1.093
2,2',4,6,6' - PeCB	104		D J	6.15	1.53	1.77	1.001
2,3,3',4,4' - PeCB	105		D B	56300	91.9	1.54	1.000
2,3,3',4,5 - PeCB	106		UD		79.4		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C D	4690	85.3	1.50	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		D	14800	81.9	1.56	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C D B	148000	15.0	1.57	0.926
2,3,3',5,5' - PeCB	111		D	118	15.2	1.33	0.945
2,3,3',5,6 - PeCB	112		UD		15.6		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		D	2990	90.8	1.56	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		D B	188000	78.0	1.54	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	349	14.6	1.56	0.959
2,3',4,5',6 - PeCB	121		D J	30.0	15.2	1.70	1.198
2',3,3',4,5 - PeCB	122		D	787	91.1	1.41	1.010
2',3,4,4',5 - PeCB	123		D	2400	89.3	1.60	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127		D	478	79.7	1.55	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	33800	59.3	1.27	0.959
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	372000	57.8	1.26	0.929
2,2',3,3',4,5' - HxCB	130		D	17000	76.2	1.24	0.913
2,2',3,3',4,6 - HxCB	131		D	1500	72.2	1.24	1.159
2,2',3,3',4,6' - HxCB	132		D	38500	72.5	1.26	1.174
2,2',3,3',5,5' - HxCB	133		D	6930	70.8	1.27	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C D	9750	73.9	1.28	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	98900	0.443	1.27	1.103
2,2',3,3',6,6' - HxCB	136		D B	13100	0.339	1.25	1.024
2,2',3,4,4',5 - HxCB	137		D	11700	64.9	1.25	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C D	3430	66.0	1.29	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	47200	69.3	1.25	0.903
2,2',3,4,5,6 - HxCB	142		UD		73.2		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144		U	938U	0.458	1.28	1.121
2,2',3,4,6,6' - HxCB	145		UD		0.346		
2,2',3,4',5,5' - HxCB	146		D	68900	64.2	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	183000	63.9	1.25	1.133
2,2',3,4',5,6' - HxCB	148		D	547	0.473	1.33	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	367	0.338	1.31	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	61.9	0.319	1.11	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	401000	53.2	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	31.3	0.289	1.41	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	30700	61.7	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	28800	46.6	1.25	0.938
2,3,3',4,5,5' - HxCB	159		D	1500	46.4	1.24	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		49.9		
2,3,3',4',5,5' - HxCB	162		D	845	46.4	1.30	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	15100	53.1	1.26	0.921
2,3,3',5,5',6 - HxCB	165		D	171	55.0	1.35	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	12200	47.2	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		D B	71000	2.49	1.06	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	22200	2.41	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	12900	2.49	1.08	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	30200	2.13	1.06	1.133
2,2',3,3',4,5',6 - HpCB	175		D B	2570	2.14	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176		D B	5100	1.74	1.07	1.035
2,2',3,3',4',5,6 - HpCB	177		D B	39700	2.23	1.06	1.145
2,2',3,3',5,5',6 - HpCB	178		D	20900	2.24	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		D B	24800	1.71	1.06	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	205000	1.97	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	462	2.18	1.10	1.156
2,2',3,4,4',5,6' - HpCB	182		D B	653	2.23	1.18	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	56800	2.05	1.06	1.127
2,2',3,4,4',6,6' - HpCB	184		D J B	34.1	1.67	1.09	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		1.77		
2,2',3,4',5,5',6 - HpCB	187		D B	130000	2.04	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188		D B	148	1.60	1.01	1.001
2,3,3',4,4',5,5' - HpCB	189		D B	2240	25.6	0.98	1.000
2,3,3',4,4',5,6 - HpCB	190		D B	17300	1.82	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	3680	1.86	1.09	0.918
2,3,3',4,5,5',6 - HpCB	192		UD		1.96		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	22200	13.3	0.89	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	8900	15.5	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	12800	0.594	0.88	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	2030	0.500	0.89	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	21800	0.651	0.90	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		D B	3800	0.502	0.87	1.022
2,2',3,3',5,5',6,6' - OcCB	202		D	6900	0.512	0.88	1.000
2,2',3,4,4',5,5',6 - OcCB	203		D B	17600	0.554	0.88	0.920
2,2',3,4,4',5,6,6' - OcCB	204		D JB	9.07	0.514	1.00	1.038
2,3,3',4,4',5,5',6 - OcCB	205		D B	1000	11.6	0.98	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	3550	14.7	0.78	1.001
2,2',3,3',4,4',5,6,6' - NoCB	207		D	458	12.4	0.84	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	805	12.9	0.77	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	318	0.318	0.75	1.001

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-DC-HP-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-155R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.29 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 16-Apr-2005	Instrument ID: HR GC/MS
Time: 12:36:44	GC Column ID: DB-1
Extract Volume (µL): 20	Sample Datafile: DT53_108B S: 9
Injection Volume (µL): 2.0	Blank Data Filename: DT53_107A S: 4
Dilution Factor: N/A	Cal. Ver. Data Filename: DT53_108B S: 1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			3060	2.50	0.77	1.001
3,4,4',5 - TeCB	81			148	2.36	0.80	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			241	7.01	1.58	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			8.56	7.13	1.41	0.999
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449cAD2\_1.xls.S4

Approved by: *Flawsthorpe* QA/QC Chemist

26-05-2005  
 dd-mm-yyyy

0277

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	30-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-155R i
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.29 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	19-Apr-2005
Analysis Date: 02-May-2005 Time: 3:08:20	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_222A S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_222A S:6 DT53_108B S: 9

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		14.9	3.52
Total Dichloro Biphenyls		2160	22.3
Total Trichloro Biphenyls		68200	9.36
Total Tetrachloro Biphenyls		380000	2.50
Total Pentachloro Biphenyls		1020000	7.01
Total Hexachloro Biphenyls		1410000	7.13
Total Heptachloro Biphenyls		646000	25.6
Total Octachloro Biphenyls		97900	15.5
Total Nonachloro Biphenyls		4810	14.7
Decachloro Biphenyl		318	0.318
TOTAL PCBs		3620000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by: Maukhorne QA/QC Chemist

26-05-2005  
dd-mm-yyyy  
0279



Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 2.29 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-155R i  
 GC Column ID(s): SPB-OCTYL  
 DR-1  
 Sample Datafile(s): PB5C\_222A S:6  
 DT53\_108B S: 9

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			3060	2.50	0.0001	3.06E-01	3.06E-01
3,4,4',5-TetraCB	81			148	2.36	0.0001	1.48E-02	1.48E-02
2,3,3',4,4'-PentaCB	105			56300	91.9	0.0001	5.63E+00	5.63E+00
2,3,4,4',5-PentaCB	114			2990	90.8	0.0005	1.50E+00	1.50E+00
2,3',4,4',5-PentaCB	118			188000	78.0	0.0001	1.88E+01	1.88E+01
2',3,4,4',5-PentaCB	123			2400	89.3	0.0001	2.40E-01	2.40E-01
3,3',4,4',5-PentaCB	126			241	7.01	0.1	2.41E+01	2.41E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	30700	61.7	0.0005	1.53E+01	1.53E+01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			12200	47.2	0.00001	1.22E-01	1.22E-01
3,3',4,4',5,5'-HexaCB	169			8.56	7.13	0.01	8.56E-02	8.56E-02
2,3,3',4,4',5,5'-HeptaCB	180			2240	25.6	0.0001	2.24E-01	2.24E-01
<b>TOTAL TEQ</b>							<b>66.3</b>	<b>66.3</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-DC-HP-comp-1

Sample Collection: 31-Aug-2004  
Project No.: 04 08 06 22  
Lab Sample ID: L7311-157R i  
Sample Size: 2.24 g (wet)  
Initial Calibration Date: 19-Apr-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Sample Data Filename: PB5C\_226 S:9  
Blank Data Filename: PB5C\_256 S:5  
Cal. Ver. Data Filename: PB5C\_226 S:1

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 06-Apr-2005  
Analysis Date: 04-May-2005 Time: 5:42:16  
Extract Volume (µL): 400  
Injection Volume (µL): 1.0  
Dilution Factor: 20  
Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		D JB	8.21	2.71	2.91	1.001
3 - MoCB	2		D J	4.37	3.48	3.58	0.988
4 - MoCB	3		D JB	10.5	4.13	3.48	1.000
2,2' - DiCB	4		D B	124	18.6	1.45	1.001
2,3 - DiCB	5		UD		15.7		
2,3' - DiCB	6		D	149	14.8	1.64	1.177
2,4 - DiCB	7		D J	15.3	14.5	1.33	1.158
2,4' - DiCB	8		D B	339	13.8	1.60	1.207
2,5 - DiCB	9		D J	18.2	14.4	1.34	1.146
2,6 - DiCB	10		UD		14.4		
3,3' - DiCB	11		D B	40.1	16.0	1.37	0.969
3,4 - DiCB	12	12 + 13	C D JB	70.6	16.3	1.55	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		UD		15.3		
4,4' - DiCB	15		D B	679	22.8	1.59	1.001
2,2',3 - TriCB	16		D	357	2.35	0.97	1.166
2,2',4 - TriCB	17		D B	850	2.18	0.99	1.137
2,2',5 - TriCB	18	18 + 30	C D B	2360	1.74	1.02	1.113
2,2',6 - TriCB	19		D	93.6	2.12	1.02	1.001
2,3,3' - TriCB	20	20 + 28	C D B	12600	8.00	1.02	0.849

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C D	1250	7.89	1.02	0.857
2,3,4' - TriCB	22		D	2190	8.73	0.99	0.872
2,3,5 - TriCB	23		UD		8.24		
2,3,6 - TriCB	24		D J	16.9	1.55	1.19	1.158
2,3',4 - TriCB	25		D	1540	7.15	1.03	0.826
2,3',5 - TriCB	26	26 + 29	C D B	4070	8.16	1.03	1.300
2,3',6 - TriCB	27		D B	590	1.52	1.06	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		D B	10400	7.78	1.03	0.837
2,4',6 - TriCB	32		D B	1300	7.70	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		D	40.2	8.21	1.04	1.273
3,3',4 - TriCB	35		D J	13.3	9.59	0.90	0.984
3,3',5 - TriCB	36		UD		8.01		
3,4,4' - TriCB	37		D B	2160	10.3	1.01	1.001
3,4,5 - TriCB	38		D J	13.9	8.22	0.92	0.968
3,4',5 - TriCB	39		D	60.7	8.08	1.07	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	4660	3.31	0.78	1.335
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		D	4290	3.45	0.78	1.310
2,2',3,5 - TeCB	43		D	967	3.73	0.79	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	29600	2.95	0.79	1.285
2,2',3,6 - TeCB	45	45 + 51	C D	680	3.12	0.80	1.146
2,2',3,6' - TeCB	46		D	184	3.71	0.83	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		D	1310	3.19	0.80	1.273
2,2',4,5' - TeCB	49	49 + 69	C D B	20700	2.80	0.79	1.258
2,2',4,6 - TeCB	50	50 + 53	C D B	1220	3.02	0.80	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		D B	77600	3.00	0.78	1.233
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		D J	4.97	2.28	0.88	1.002
2,3,3',4 - TeCB	55		UD		96.8		
2,3,3',4' - TeCB	56		D	5990	96.2	0.74	0.905
2,3,3',5 - TeCB	57		D	247	92.6	0.86	0.844
2,3,3',5' - TeCB	58		D	329	89.4	0.74	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C D	2160	2.46	0.79	1.300
2,3,4,4' - TeCB	60		D	5640	95.5	0.76	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	59400	89.5	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63		D	1600	87.0	0.79	0.865

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		D B	9700	2.44	0.79	1.347
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	31200	87.4	0.78	0.884
2,3',4,5 - TeCB	67		D	545	81.1	0.79	0.857
2,3',4,5' - TeCB	68		D	695	86.0	0.72	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72		D	1530	87.9	0.76	0.823
2,3',5',6 - TeCB	73		D	391	2.43	0.72	1.240
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		X				
3,3',4,5 - TeCB	78		UD		98.9		
3,3',4,5' - TeCB	79		D	1770	79.1	0.74	0.970
3,3',5,5' - TeCB	80		UD		88.9		
3,4,4',5 - TeCB	81		X				
2,2',3,3',4 - PeCB	82		D	5050	12.8	1.61	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C D B	111000	11.2	1.57	0.886
2,2',3,3',6 - PeCB	84		D	15300	12.5	1.60	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C D	21500	9.54	1.58	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	67300	9.72	1.58	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C D	14500	10.9	1.57	1.154
2,2',3,4,6' - PeCB	89		D	82.9	11.8	1.72	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	203000	9.84	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		D B	41800	11.4	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	86100	10.6	1.57	1.120
2,2',3,5,0' - PeCB	94		D	230	11.5	1.64	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		D	76.5	1.30	1.78	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103		D	1930	9.93	1.63	1.093
2,2',4,6,6' - PeCB	104		D J	3.72	1.38	1.77	1.001
2,3,3',4,4' - PeCB	105		D D	40000	84.0	1.54	1.000
2,3,3',4,5 - PeCB	106		UD		82.3		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C D	4840	82.5	1.57	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		D	12200	75.6	1.57	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C D B	158000	8.42	1.57	0.925
2,3,3',5,5' - PeCB	111		D	167	8.52	1.76	0.945
2,3,3',5,6' - PeCB	112		UD		8.86		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		D	2840	85.4	1.48	1.001
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		D B	167000	79.5	1.55	1.000
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120		D	382	8.31	1.60	0.958
2,3',4,5',6' - PeCB	121		D J	25.8	8.36	1.71	1.198
2',3,3',4,5' - PeCB	122		D	1280	88.5	1.58	1.010
2',3,4,4',5' - PeCB	123		D	2280	84.5	1.69	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		X				
3,3',4,5,5' - PeCB	127		D	449	82.7	1.52	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C D	33100	56.7	1.27	0.959
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	349000	56.5	1.26	0.929
2,2',3,3',4,5' - HxCB	130		D	14500	71.9	1.26	0.913
2,2',3,3',4,6' - HxCB	131		D	1460	66.5	1.30	1.159
2,2',3,3',4,6' - HxCB	132		D	46100	68.7	1.27	1.173
2,2',3,3',5,5' - HxCB	133		D	6430	66.5	1.26	1.189
2,2',3,3',5,6' - HxCB	134	134 + 143	C D	9590	67.9	1.25	1.138
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D	104000	0.314	1.27	1.103
2,2',3,3',6,6' - HxCB	136		D B	12400	0.243	1.28	1.024
2,2',3,4,4',5' - HxCB	137		D	10100	61.8	1.25	0.919
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C D	2510	61.3	1.24	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		D	52200	65.9	1.26	0.904
2,2',3,4,5,6' - HxCB	142		UD		68.9		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144		D	9450	0.330	1.27	1.121
2,2',3,4,6,6' - HxCB	145		UD		0.251		
2,2',3,4',5,5' - HxCB	146		D	57500	57.6	1.26	0.885
2,2',3,4',5,6' - HxCB	147	147 + 149	C D B	228000	60.3	1.26	1.132
2,2',3,4',5,6' - HxCB	140		D	638	0.331	1.18	1.083
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

L7311-157R i

CLIENT ID:

LDW-T4-M-DC-HP-comp-1

Project No.:

04-08-06-22

Sample Data Filename:

PB5C\_226 S:9

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150		D	349	0.237	1.33	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		D	66.4	0.228	1.13	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	364000	50.2	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		D J	17.7	0.235	1.16	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	27900	63.9	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		D	27600	46.4	1.25	0.938
2,3,3',4,5,5' - HxCB	159		D	3130	49.2	1.30	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		UD		49.9		
2,3,3',4',5,5' - HxCB	162		D	691	48.1	1.39	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		D	18200	51.3	1.25	0.922
2,3,3',5,5',6 - HxCB	165		D	190	53.0	1.25	0.879
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		D	10300	45.9	1.25	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		D B	77400	4.07	1.05	0.937
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C D B	24700	3.88	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172		D B	15800	4.15	1.06	0.898
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		D B	65000	3.66	1.04	1.132
2,2',3,3',4,5',6 - HpCB	175		D B	3340	3.52	1.06	1.101
2,2',3,3',4,6,6' - HpCB	176		D B	6530	2.72	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		D B	56100	3.77	1.06	1.145
2,2',3,3',5,5',6 - HpCB	178		D	25900	3.64	1.06	1.084
2,2',3,3',5,6,6' - HpCB	179		D B	29200	2.67	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D	249000	3.33	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181		D B	518	3.68	1.13	1.155
2,2',3,4,4',5,6' - HpCB	182		D B	739	3.62	1.01	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	72700	3.53	1.05	1.126
2,2',3,4,4',6,6' - HpCB	184		D J B	28.7	2.57	1.19	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		UD		2.78		
2,2',3,4',5,5',6 - HpCB	187		D B	159000	3.29	1.05	1.109
2,2',3,4',5,6,6' - HpCB	188		D B	170	2.93	1.06	1.000
2,3,3',4,4',5,5' - HpCB	189		D B	2520	35.0	1.03	1.001
2,3,3',4,4',5,6 - HpCB	190		D B	20300	3.05	1.06	0.947
2,3,3',4,4',5',6 - HpCB	191		D B	4000	3.10	1.10	0.918
2,3,3',4,5,5',6 - HpCB	192		I I I		3.32		

15449AD2\_1.xls, S2

Approved by: \_\_\_\_\_

QA/QC Chemist

25-05-2005  
 dd-mm-yyyy

0286

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		D B	28200	13.7	0.89	0.991
2,2',3,3',4,4',5,6' - OcCB	195		D B	10900	15.7	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		D	18800	0.535	0.92	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C D	4370	0.420	0.92	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C D B	33500	0.544	0.91	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5,6,6' - OcCB	201		D B	5170	0.422	0.92	1.022
2,2',3,3',5,5',6,6' - OcCB	202		D	9150	0.447	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		D B	25100	0.501	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		KD JB	9.64	0.422	0.58	1.039
2,3,3',4,4',5,5',6 - OcCB	205		D B	1280	12.4	0.80	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		D	4650	24.7	0.77	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207		D	596	18.2	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		D	1020	21.1	0.80	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		D B	368	0.374	0.65	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-DC-HP-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-157R i
Sample Receipt Date: 26-Oct-2004	Sample Size: 2.24 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 16-Apr-2005	Instrument ID: HK GC/MS
Time: 13:16:25	GC Column ID: DB-1
Extract Volume (µL): 20	Sample Datafile: DT53_108B S: 10
Injection Volume (µL): 2.0	Blank Data Filename: DT53_107A S: 4
Dilution Factor: N/A	Cal. Ver. Data Filename: DT53 108B S: 1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77			2070	1.38	0.76	1.001
3,4,4',5 - TeCB	81			91.2	1.48	0.78	1.001
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			189	5.80	1.52	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		6.53		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15449cAD2\_1.xls, S5

Approved by: *Hawthorne* QA/QC Chemist

0290

26-05-2005  
dd-mm-yyyy



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	31-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-157R i
Sample Receipt Date: 26-Oct-2004	Sample Size:	2.24 g (wet)
Extraction Date: 06-Apr-2005	Initial Calibration Date:	19-Apr-2005
Analysis Date: 04-May-2005 Time: 5:42:16	Instrument ID:	HR GC/MS
Extract Volume (µL): 400	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_256 S:5
Dilution Factor: 20	Cal. Ver. Data Filename:	PB5C_226 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_226 S:9 DT53_108B S: 10

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		23.1	4.13
Total Dichloro Biphenyls		1430	22.8
Total Trichloro Biphenyls		39900	10.3
Total Tetrachloro Biphenyls		265000	1.48
Total Pentachloro Biphenyls		966000	5.80
Total Hexachloro Biphenyls		1390000	6.53
Total Heptachloro Biphenyls		812000	35.0
Total Octachloro Biphenyls		137000	15.7
Total Nonachloro Biphenyls		6260	24.7
Decachloro Biphenyl		368	0.374
TOTAL PCBs		3620000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 2.24 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 31-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-157R i  
 GC Column ID(s): SPB-OCTYL  
 DB-1  
 Sample Datafile(s): PB5C\_226 S:9  
 DT53\_108B S: 10

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			2070	1.38	0.0001	2.07E-01	2.07E-01
3,4,4',5-TetraCB	81			91.2	1.48	0.0001	9.12E-03	9.12E-03
2,3,3',4,4'-PentaCB	105			49000	04.0	0.0001	4.90E+00	4.90E+00
2,3,4,4',5-PentaCB	114			2840	85.4	0.0005	1.42E+00	1.42E+00
2,3',4,4',5-PentaCB	118			167000	79.5	0.0001	1.67E+01	1.67E+01
2',3,4,4',5-PentaCB	123			2280	84.5	0.0001	2.28E-01	2.28E-01
3,3',4,4',5-PentaCB	126			189	5.80	0.1	1.89E+01	1.89E+01
2,3,3',4,4',5-HexaCB	156	156 + 157	C	27900	63.9	0.0005	1.39E+01	1.39E+01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			10300	45.9	0.00001	1.03E-01	1.03E-01
3,3',4,4',5,5'-HexaCB	169		U		6.53	0.01	3.27E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			2520	35.0	0.0001	2.52E-01	2.52E-01
<b>TOTAL TEQ</b>							<b>56.7</b>	<b>56.7</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-A-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 14-Mar-2005

Extract Volume (µL): 20

Injection Volume (µL): 1.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Time: 0:49:43

Sample Collection: 02-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-1

Sample Size: 10.1 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_134 S:6

Blank Data Filename: PB5C\_134 S:5

Cal. Ver. Data Filename: PB5C\_134 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	3.29	0.0594	3.37	1.001
3 - MoCB	2		JB	0.530	0.0634	3.15	0.988
4 - MoCB	3		JB	1.14	0.0713	3.31	1.001
2,2' - DiCB	4		B	46.6	0.209	1.55	1.000
2,3 - DiCB	5		KJ	0.988	0.148	2.00	1.195
2,3' - DiCB	6			24.8	0.138	1.54	1.175
2,4 - DiCB	7		B	2.71	0.132	1.55	1.157
2,4' - DiCB	8		B	44.0	0.121	1.56	1.206
2,5 - DiCB	9			15.6	0.137	1.58	1.145
2,6 - DiCB	10			5.33	0.142	1.62	1.013
3,3' - DiCB	11		B	6.43	0.144	1.66	0.968
3,4 - DiCB	12	12 + 13	C B	5.32	0.142	1.73	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.136		
4,4' - DiCB	15		B	123	0.174	1.56	1.000
2,2',3 - TriCB	16		B	35.3	0.0497	1.04	1.166
2,2',4 - TriCB	17		B	180	0.0497	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	947	0.0497	1.05	1.113
2,2',6 - TriCB	19		B	115	0.0639	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C E				

15208AD1\_1.xls. S3

Approved by:  QA/QC Chemist

22-04-2005  
dd-mm-yyyy

0183

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	168	0.676	1.04	0.857
2,3,4' - TriCB	22		B	333	0.774	1.01	0.872
2,3,5 - TriCB	23			2.00	0.693	1.06	1.283
2,3,6 - TriCB	24			15.1	0.0314	1.04	1.159
2,3',4 - TriCB	25			429	0.629	1.04	0.825
2,3',5 - TriCB	26	26 + 29	C B	1860	0.729	1.04	1.302
2,3',6 - TriCB	27			175	0.0497	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2980	0.719	1.05	0.837
2,4',6 - TriCB	32		B	746	0.731	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			20.4	0.736	1.06	1.274
3,3',4 - TriCB	35		U		0.765		
3,3',5 - TriCB	36		U		0.682		
3,4,4' - TriCB	37		B	1050	0.741	1.04	1.001
3,4,5 - TriCB	38			12.1	0.744	1.04	0.968
3,4',5 - TriCB	39			9.53	0.688	1.05	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1590	0.0497	0.79	1.339
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	493	0.0497	0.79	1.313
2,2',3,5 - TeCB	43			143	0.0504	0.79	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C E				
2,2',3,6 - TeCB	45	45 + 51	C B	521	0.0497	0.78	1.148
2,2',3,6' - TeCB	46			175	0.0543	0.78	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	436	0.0497	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	1450	0.0497	0.79	1.112
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			10.9	0.0499	0.81	1.002
2,3,3',4 - TeCB	55		U		5.22		
2,3,3',4' - TeCB	56		B	731	5.48	0.77	0.904
2,3,3',5 - TeCB	57			90.7	5.32	0.76	0.844
2,3,3',5' - TeCB	58		U		5.40		
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	1310	0.0497	0.79	1.303
2,3,4,4' - TeCB	60		B	2310	5.29	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			726	5.13	0.77	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	4290	0.0497	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		E				
2,3',4,5 - TeCB	67			350	4.68	0.76	0.857
2,3',4,5' - TeCB	68			175	5.04	0.77	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			302	5.22	0.77	0.822
2,3',5',6 - TeCB	73		U		0.0497		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		B	1120	5.72	0.78	1.000
3,3',4,5 - TeCB	78		U		5.53		
3,3',4,5' - TeCB	79			534	4.62	0.73	0.972
3,3',5,5' - TeCB	80		U		5.08		
3,4,4',5 - TeCB	81		K	70.8	5.36	0.78	1.000
2,2',3,3',4 - PeCB	82		B	431	3.59	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	2710	3.74	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	2490	2.85	1.59	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2980	3.22	1.58	1.154
2,2',3,4,6' - PeCB	89			61.6	3.58	1.59	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	6790	3.45	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			29.9	3.44	1.56	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			109	0.0497	1.58	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			547	3.04	1.58	1.094
2,2',4,6,6' - PeCB	104			4.69	0.0497	1.57	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5 - PeCB	106		U		17.7		



0185

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C B	925	19.1	1.54	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		B	3090	18.4	1.54	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			38.6	2.49	1.60	0.945
2,3,3',5,6 - PeCB	112		U		2.41		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		B	833	18.0	1.56	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			218	2.43	1.58	0.958
2,3',4,5',6 - PeCB	121			16.2	2.48	1.62	1.201
2',3,3',4,5 - PeCB	122			101	20.1	1.65	1.010
2',3,4,4',5 - PeCB	123		B	715	18.8	1.66	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		B	70.5	20.1	1.40	1.000
3,3',4,5,5' - PeCB	127			64.0	19.2	1.53	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	5930	9.32	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		B	3330	11.9	1.26	0.913
2,2',3,3',4,6 - HxCB	131			252	11.4	1.26	1.159
2,2',3,3',4,6' - HxCB	132		B	6310	11.1	1.27	1.174
2,2',3,3',5,5' - HxCB	133			1100	10.5	1.28	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C	1760	10.9	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C E				
2,2',3,3',6,6' - HxCB	136		B	3910	0.0497	1.26	1.024
2,2',3,4,4',5 - HxCB	137		B	2110	10.1	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	691	10.2	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	6920	10.6	1.27	0.903
2,2',3,4,5,6 - HxCB	142		U		10.7		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1730	0.0497	1.26	1.121
2,2',3,4,6,6' - HxCB	145			4.45	0.0497	1.24	1.033
2,2',3,4',5,5' - HxCB	146		E				
2,2',3,4',5,6 - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148			91.4	0.0497	1.26	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			89.2	0.0497	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			16.7	0.0497	1.26	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			9.35	0.0497	1.25	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C E				
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	4830	7.71	1.27	0.938
2,3,3',4,5,5' - HxCB	159			112	7.99	1.28	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		7.74		
2,3,3',4',5,5' - HxCB	162			184	8.18	1.26	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	1950	8.37	1.26	0.921
2,3,3',5,5',6 - HxCB	165			35.9	8.70	1.25	0.878
2,3,4,4',5,6 HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	2420	7.59	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		23.3		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3350	0.606	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172		B	1980	0.606	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	2960	0.571	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			452	0.539	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			750	0.426	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	6910	0.594	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178			3160	0.569	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	3740	0.418	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			98.6	0.574	1.04	1.156
2,2',3,4,4',5,6' - HpCB	182			108	0.544	1.04	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			8.66	0.401	1.05	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.437		
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			35.7	0.441	1.05	1.000
2,3,3',4,4',5,5' - HpCB	189		B	458	0.737	1.01	1.001
2,3,3',4,4',5,6 - HpCB	190		B	2690	0.486	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			513	0.464	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.489		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	3780	0.990	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195			1500	1.03	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196			2050	0.0497	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C	303	0.0497	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	3890	0.0497	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201			570	0.0497	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1470	0.0497	0.89	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	3260	0.0497	0.89	0.920
2,2',3,4,4',5,6,6' - OcCB	204		J	1.30	0.0497	0.83	1.039
2,3,3',4,4',5,5',6 - OcCB	205			205	0.862	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	739	0.109	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			101	0.0839	0.80	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		B	242	0.0937	0.78	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	126	0.0497	0.70	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.





Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-A-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 02-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-1 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 20-Mar-2005 Time: 2:24:50	Instrument ID: HR GC/MS
Extract Volume (µL): 300	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_146 S:7
Dilution Factor: 15	Blank Data Filename: PB5C_134 S:5
Concentration Units: ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_146 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28	C D B	7940	2.65	1.03	0.848

15208AD3\_1.xls. S5

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0191

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	8860	0.378	0.80	1.286
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	11800	0.361	0.80	1.260
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	21800	0.389	0.80	1.235
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	20100	99.1	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAD FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	12100	103	0.78	0.884
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	26000	18.2	1.58	0.885
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	16500	16.2	1.58	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	43900	16.4	1.58	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	19600	17.4	1.58	1.119
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105		D B	13700	71.1	1.57	1.000
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	26500	14.1	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	38500	65.7	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	68000	21.9	1.26	0.929
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D B	17400	0.410	1.27	1.104
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146		D B	12300	23.4	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	26800	23.2	1.27	1.133
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	83800	20.0	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157	C D B	5850	24.4	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	12400	0.850	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	34700	0.668	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	10000	0.711	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	23800	0.678	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 02-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L73111-1
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 0:49:43	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_134 S:6 PB5C_146 S:7

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		4.96	0.0713
Total Dichloro Biphenyls		274	0.209
Total Trichloro Biphenyls		17000	0.774
Total Tetrachloro Biphenyls		91400	5.72
Total Pentachloro Biphenyls		207000	20.1
Total Hexachloro Biphenyls		258000	23.3
Total Heptachloro Biphenyls		108000	0.737
Total Octachloro Biphenyls		17000	1.03
Total Nonachloro Biphenyls		1080	0.109
Decachloro Biphenyl		126	0.0497
TOTAL PCBs		700000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.1 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 02-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-1  
 GC Column ID(s): SPB-OCTYL  
 Sample Datafile(s): PB5C\_134 S:6  
 PB5C\_146 S:7

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			1120	5.72	0.0001	1.12E-01	1.12E-01
3,4,4',5-TetraCB	81		U		5.36	0.0001	2.68E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			13700	71.1	0.0001	1.37E+00	1.37E+00
2,3,4,4',5-PentaCB	114			833	18.0	0.0005	4.16E-01	4.16E-01
2,3',4,4',5-PentaCB	118			38500	65.7	0.0001	3.85E+00	3.85E+00
2',3,4,4',5-PentaCB	123			715	18.8	0.0001	7.15E-02	7.15E-02
3,3',4,4',5-PentaCB	126			70.5	20.1	0.1	7.05E+00	7.05E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	5850	24.4	0.0005	2.92E+00	2.92E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			2420	7.59	0.00001	2.42E-02	2.42E-02
3,3',4,4',5,5'-HexaCB	169		U		23.3	0.01	1.17E-01	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			458	0.737	0.0001	4.58E-02	4.58E-02
TOTAL TEQ							16	15.9

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-B-SS-WB-comp-1

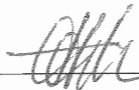
Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-20
Sample Receipt Date: 26-Oct-2004	Sample Size: 8.95 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID: HR GC/MS
Time: 1:53:57	GC Column ID: SPB-OCTYL
Extract Volume (µL): 20	Sample Data Filename: PB5C_134 S:7
Injection Volume (µL): 1.0	Blank Data Filename: PB5C 134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	3.65	0.104	2.94	1.001
3 - MoCB	2		JB	0.545	0.113	2.89	0.988
4 - MoCB	3		JB	1.21	0.128	3.22	1.001
2,2' - DiCB	4		B	73.6	0.281	1.56	1.001
2,3 - DiCB	5		KJ	0.953	0.186	1.80	1.197
2,3' - DiCB	6			42.6	0.174	1.57	1.176
2,4 - DiCB	7		B	2.63	0.166	1.49	1.158
2,4' - DiCB	8		B	53.8	0.152	1.56	1.207
2,5 - DiCB	9			13.0	0.172	1.59	1.145
2,6 - DiCB	10			4.92	0.179	1.58	1.014
3,3' - DiCB	11		B	5.71	0.182	1.49	0.969
3,4 - DiCB	12	12 + 13	C B	6.74	0.178	1.47	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.171		
4,4' - DiCB	15		B	137	0.211	1.54	1.001
2,2',3 - TriCB	16		B	35.5	0.186	1.04	1.166
2,2',4 - TriCB	17		B	218	0.175	1.04	1.139
2,2',5 - TriCB	18	18 + 30	C B	989	0.148	1.05	1.113
2,2',6 - TriCB	19		B	133	0.244	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C B	5370	0.777	1.04	0.848

Approved by:  QA/QC Chemist

0202

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	144	0.733	1.03	0.857
2,3,4' - TriCB	22		B	232	0.839	1.04	0.872
2,3,5 - TriCB	23		J	1.27	0.751	0.97	1.283
2,3,6 - TriCB	24			14.7	0.123	1.04	1.159
2,3',4 - TriCB	25			608	0.682	1.03	0.825
2,3',6 - TriCB	26	26 + 29	C B	2010	0.790	1.04	1.302
2,3',6 - TriCB	27			160	0.127	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2750	0.779	1.04	0.836
2,4',6 - TriCB	32		B	564	0.792	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			24.3	0.798	1.05	1.274
3,3',4 - TriCB	35		U		0.829		
3,3',5 - TriCB	36		U		0.739		
3,4,4' - TriCB	37		D	721	0.818	1.04	1.001
3,4,5 - TriCB	38			9.34	0.806	1.10	0.969
3,4',5 - TriCB	39			7.67	0.746	1.08	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1030	0.131	0.79	1.339
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	291	0.122	0.78	1.313
2,2',3,5 - TeCB	43		U		0.138		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	6880	0.120	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C B	407	0.131	0.78	1.148
2,2',3,6' - TeCB	46			118	0.148	0.77	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	303	0.124	0.78	1.275
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	1130	0.127	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			9.74	0.125	0.76	1.001
2,3,3',4 - TeCB	55		U		2.90		
2,3,3',4' - TeCB	56		B	421	3.05	0.79	0.905
2,3,3',5 - TeCB	57			125	2.96	0.78	0.844
2,3,3',5' - TeCB	58			65.6	3.00	0.76	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	1040	0.102	0.78	1.304
2,3,4,4' - TeCB	60		B	1690	2.94	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			760	2.85	0.78	0.865



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		B	3150	0.0946	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		E				
2,3',4,5 - TeCB	67			361	2.60	0.78	0.856
2,3',4,5' - TeCB	68			267	2.80	0.76	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			442	2.90	0.77	0.823
2,3',5',6 - TeCB	73		U		0.0956		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		B	899	3.29	0.78	1.000
3,3',4,5 - TeCB	78		U		3.07		
3,3',4,5' - TeCB	79			163	2.57	0.78	0.970
3,3',5,5' - TeCB	80		U		2.83		
3,4,4',5 - TeCB	81		K	75.8	3.06	0.79	1.000
2,2',3,3',4 - PeCB	82		B	223	2.46	1.61	0.933
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	1800	2.56	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	2350	1.95	1.57	0.918
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2890	2.20	1.57	1.154
2,2',3,4,6' - PeCB	89		U		2.45		
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	7640	2.36	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			19.1	2.35	1.63	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			98.1	0.138	1.58	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			601	2.08	1.58	1.093
2,2',4,6,6' - PeCB	104			4.03	0.143	1.52	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5 - PeCB	106		U		19.9		



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-B-SS-WB-comp-1

Lab Name: **AXYS ANALYTICAL SERVICES**

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 20-Mar-2005 Time: 3:29:11

Extract Volume (µL): 300

Injection Volume (µL): 1.0

Dilution Factor: 15

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 04-Aug-2004

Project No.: 04-00-00-22

Lab Sample ID: L7311-20 W

Sample Size: 8.95 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_146 S:8

Blank Data Filename: PB5C\_134 S:5

Cal. Ver. Data Filename: PB5C\_146 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15208AD3\_1.xls, S6

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0210

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	11200	0.479	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	20900	0.516	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	18300	99.2	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ADUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66		D B	10800 /	103	0.77	0.884
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	33100 /	14.8	1.58	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	16700 /	13.1	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	52900 /	13.3	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	14700 /	14.1	1.57	1.121
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105		D B	15500 /	97.9	1.57	1.001
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	22900 ✓	11.5	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	48900 ✓	85.7	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166	C D B	7680 ✓	20.0	1.26	0.959
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	86400 ✓	19.7	1.26	0.929
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D B	18200 ✓	0.629	1.27	1.104
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146		D B	16300 ✓	21.0	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	17200 ✓	20.9	1.25	1.133
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	105000	18.1	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158		D B	7760 /	16.7	1.27	0.938
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	15000 /	1.23	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	43000 /	0.963	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	13100 /	1.02	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	26500 /	0.977	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						





Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 02-Mar-2005  
Analysis Date: 14-Mar-2005 Time: 1:53:57  
Extract Volume (µL): 20  
Injection Volume (µL): 1.0  
Dilution Factor: N/A  
Concentration Units : ng/kg (wet weight basis)

Sample Collection: 04-Aug-2004  
Project No.: 04-08-06-22  
Lab Sample ID: L7311-20  
Sample Size: 8.95 g (wet)  
Initial Calibration Date: 01-Mar-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Blank Data Filename: PB5C\_134 S:5  
Cal. Ver. Data Filename: PB5C\_134 S:1  
Sample Datafile(s): PB5C\_134 S:7  
PB5C\_146 S:8

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		5.40	0.128
Total Dichloro Biphenyls		340	0.281
Total Trichloro Biphenyls		14000	0.839
Total Tetrachloro Biphenyls		80600	3.29
Total Pentachloro Biphenyls		228000	24.1
Total Hexachloro Biphenyls		299000	27.1
Total Heptachloro Biphenyls		125000	1.16
Total Octachloro Biphenyls		20100	1.20
Total Nonachloro Biphenyls		1750	0.171
Decachloro Biphenyl		299	0.0559
TOTAL PCBs		769000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-D-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 05-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-ZZ
Matrix: TISSUE	Lab Sample ID: L7311-39
Sample Receipt Date: 26-Oct-2004	Sample Size: 11.6 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 2:58:10	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_134 S:8
Dilution Factor: N/A	Blank Data Filename: PB5C 134 S:5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_134 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	4.54	0.157	3.14	1.000
3 - MoCB	2		JB	0.457	0.175	2.67	0.988
4 - MoCB	3		JB	0.754	0.205	3.38	1.000
2,2' - DiCB	4		B	97.1	0.412	1.56	1.001
2,3 - DiCB	5			6.07	0.252	1.60	1.198
2,3' - DiCB	6			86.4	0.235	1.57	1.176
2,4 - DiCB	7		B	6.18	0.225	1.58	1.158
2,4' - DiCB	8		B	274	0.206	1.54	1.209
2,5 - DiCB	9			22.6	0.234	1.56	1.146
2,6 - DiCB	10			5.41	0.242	1.53	1.014
3,3' - DiCB	11		B	3.10	0.246	1.59	0.967
3,4 - DiCB	12	12 + 13	C B	7.11	0.241	1.53	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.232		
4,4' - DiCB	15		KB	33.3	0.275	1.53	1.000
2,2',3 - TriCB	16		B	395	0.166	1.05	1.166
2,2',4 - TriCB	17		B	805	0.156	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	1840	0.132	1.05	1.113
2,2',6 - TriCB	19		B	140	0.213	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C B	7150	0.757	1.04	0.848

15208AD1\_1.xls, S5

Approved by:  QA/QC Chemist

22-04-2005  
 dd-mm-yyyy

0221

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	998	0.715	1.04	0.857
2,3,4' - TriCB	22		B	624	0.818	1.03	0.872
2,3,5 - TriCB	23			3.94	0.732	0.97	1.283
2,3,6 - TriCB	24			30.5	0.110	1.07	1.159
2,3',4 - TriCB	25			148	0.664	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	986	0.770	1.04	1.302
2,3',6 - TriCB	27			204	0.113	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	3090	0.759	1.04	0.837
2,4',6 - TriCB	32		B	749	0.772	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			22.3	0.778	1.03	1.273
3,3',4 - TriCB	35		U		0.808		
3,3',5 - TriCB	36		U		0.721		
3,4,4' - TriCB	37		B	127	0.811	1.04	1.002
3,4,5 - TriCB	38			7.65	0.786	1.05	0.968
3,4',5 - TriCB	39			29.7	0.727	0.97	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	2060	0.166	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1510	0.154	0.79	1.313
2,2',3,5 - TeCB	43			281	0.175	0.79	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C E				
2,2',3,6 - TeCB	45	45 + 51	C B	565	0.166	0.79	1.148
2,2',3,6' - TeCB	46			204	0.188	0.78	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	930	0.157	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C B	6330	0.139	0.79	1.261
2,2',4,6 - TeCB	50	50 + 53	C B	852	0.162	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			8.61	0.159	0.78	1.001
2,3,3',4 - TeCB	55		U		8.51		
2,3,3',4' - TeCB	56		B	682	8.93	0.78	0.904
2,3,3',5 - TeCB	57			45.3	8.68	0.75	0.844
2,3,3',5' - TeCB	58		U		8.81		
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	799	0.129	0.79	1.303
2,3,4,4' - TeCB	60		B	2460	8.63	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			708	8.36	0.77	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			75.1	0.122	1.27	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			9.66	0.126	1.24	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			0.20	0.123	1.30	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	4870	13.5	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3450	11.0	1.27	0.938
2,3,3',4,5,5' - HxCB	159			157	11.4	1.29	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		11.0		
2,3,3',4',5,5' - HxCB	162			117	11.6	1.29	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	1590	11.9	1.28	0.921
2,3,3',5,5',6 - HxCB	165			33.2	12.4	1.28	0.878
2,3,4,4',5,6 - HxCB	166	128 + 100	C120				
2,3',4,4',5,5' - HxCB	167		B	1520	11.4	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		12.6		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3140	0.530	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172		B	1880	0.530	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	4190	0.500	1.05	1.134
2,2',3,3',4,5',6 - HpCB	175			467	0.472	1.04	1.103
2,2',3,3',4,6,6' - HpCB	176			761	0.373	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	7000	0.519	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178			3550	0.498	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2600	0.366	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			67.9	0.502	1.05	1.156
2,2',3,4,4',5,6' - HpCB	182			120	0.476	1.05	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			8.40	0.351	1.06	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.382		
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			29.8	0.358	1.06	1.001
2,3,3',4,4',5,5' - HpCB	189		B	353	1.20	1.02	1.001
2,3,3',4,4',5,6 - HpCB	190		B	2490	0.425	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			508	0.406	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.428		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	3880	0.320	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195			1730	0.334	0.89	0.945
2,2',3,3',4,4',5,6' - OcCB	196			2490	0.0516	0.90	0.916
2,2',3,3',4,1',6,6' - OcCB	197	197 + 200	C	391	0.0430	0.90	1.015
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	4380	0.0514	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201			537	0.0430	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1300	0.0450	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	3630	0.0484	0.90	0.919
2,2',3,4,4',5,6,6' - OcCB	204		J	0.731	0.0430	0.92	1.039
2,3,3',4,4',5,5',6 - OcCB	205			194	0.289	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	786	0.125	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			110	0.0951	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		B	195	0.106	0.79	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	75.9	0.0430	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-D-PS-WB-comp-1

Sample Collection: 05-Aug-2004  
Project No.: 04 08 06 22  
Lab Sample ID: L7311-39 W  
Sample Size: 11.6 g (wet)  
Initial Calibration Date: 01-Mar-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Sample Data Filename: PB5C\_146 S:9  
Blank Data Filename: PB5C\_134 S:5  
Cal. Ver. Data Filename: PB5C\_146 S:1

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 02-Mar-2005  
Analysis Date: 20-Mar-2005 Time: 4:33:30  
Extract Volume (µL): 300  
Injection Volume (µL): 1.0  
Dilution Factor: 15  
Concentration Units: ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15208AD3\_1.xls. S7

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0229

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	8470 ✓	0.332	0.79	1.287
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	13600 ✓	0.341	0.80	1.236
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	11800 ✓	65.4	0.79	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	10900 /	67.8	0.78	0.884
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	16200 /	16.3	1.57	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	10500 /	14.5	1.56	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	23100 /	14.7	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	12900 /	15.6	1.58	1.120
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C00				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105		D B	9050 /	50.9	1.55	1.000
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	18700 /	12.7	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	26100 /	48.5	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	47700 /	75.9	1.26	0.928
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D B	13600 /	0.413	1.27	1.104
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146		D B	9880 /	81.0	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	22400 /	80.3	1.27	1.133
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	54500 /	69.5	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	11200 /	0.643	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	34200 /	0.505	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	10400 /	0.538	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	22400 /	0.513	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	05-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-39
Sample Receipt Date: 26-Oct-2004	Sample Size:	11.6 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 2:58:10	Instrument ID:	HR GC/MS
Extract Volume (µL): 20	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_134 S:8 PB5C_146 S:9

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		5.75	0.205
Total Dichloro Biphenyls		508	0.412
Total Trichloro Biphenyls		17400	0.818
Total Tetrachloro Biphenyls		66600	10.1
Total Pentachloro Biphenyls		137000	12.4
Total Hexachloro Biphenyls		186000	16.9
Total Heptachloro Biphenyls		105000	1.20
Total Octachloro Biphenyls		18500	0.334
Total Nonachloro Biphenyls		1090	0.125
Decachloro Biphenyl		75.9	0.0430
TOTAL PCBs		533000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 11.6 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 05-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-39  
 GC Column ID(s): SPB-OCTYL  
 Sample Datafile(s): PB5C\_134 S:8  
 PB5C\_146 S:9

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			233	10.1	0.0001	2.33E-02	2.33E-02
3,4,4',5-TetraCB	81		U		8.56	0.0001	4.28E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			9050	50.9	0.0001	9.05E-01	9.05E-01
2,3,4,4',5-PentaCB	114			618	10.4	0.0005	3.09E-01	3.09E-01
2,3',4,4',5-PentaCB	118			26100	48.5	0.0001	2.61E+00	2.61E+00
2',3,4,4',5-PentaCB	123			337	11.1	0.0001	3.37E-02	3.37E-02
3,3',4,4',5-PentaCB	126			45.5	12.4	0.1	4.55E+00	4.55E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	4870	13.5	0.0005	2.43E+00	2.43E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1520	11.4	0.00001	1.52E-02	1.52E-02
3,3',4,4',5,5'-HexaCB	169		U		12.6	0.01	6.30E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			353	1.20	0.0001	3.53E-02	3.53E-02
TOTAL TEQ							11	10.9

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-F-PS-WB-comp-1

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-00-00-22
Matrix: TISSUE	Lab Sample ID:	L7311-41
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.4 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID:	HR GC/MS
Time: 4:02:23	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 20	Sample Data Filename:	PB5C_134 S:9
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	4.40	0.0745	3.11	1.000
3 - MoCB	2		JB	0.334	0.0794	2.93	0.988
4 - MoCB	3		JB	0.722	0.0891	3.32	1.001
2,2' - DiCB	4		B	85.1	0.235	1.51	1.001
2,3 - DiCB	5			3.11	0.152	1.54	1.198
2,3' - DiCB	6			69.2	0.142	1.55	1.176
2,4 - DiCB	7		B	4.83	0.135	1.48	1.158
2,4' - DiCB	8		B	193	0.124	1.53	1.207
2,5 - DiCB	9			16.7	0.141	1.54	1.146
2,6 - DiCB	10			5.96	0.146	1.58	1.014
3,3' - DiCB	11		B	1.95	0.148	1.37	0.968
3,4 - DiCB	12	12 + 13	C B	4.72	0.145	1.47	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.140		
4,4' - DiCB	15		B	31.7	0.169	1.50	1.000
2,2',3 - TriCB	16		B	309	0.117	1.05	1.165
2,2',4 - TriCB	17		B	654	0.111	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	1640	0.0933	1.05	1.113
2,2',6 - TriCB	19		B	151	0.147	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C E				

15208AD1\_1.xls, S6

Approved by:  QA/QC Chemist

22-04-2005  
dd-mm-yyyy

0240

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	660	0.436	1.05	0.857
2,3,4' - TriCB	22		B	640	0.499	1.04	0.872
2,3,5 - TriCB	23			2.53	0.447	0.99	1.283
2,3,6 - TriCB	24			20.0	0.0778	1.04	1.158
2,3',4 - TriCB	25			145	0.405	1.02	0.825
2,3',5 - TriCB	26	26 + 20	C B	1020	0.170	1.04	1.302
2,3',6 - TriCB	27			203	0.0802	1.04	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2900	0.463	1.04	0.836
2,4',6 - TriCB	32		B	703	0.471	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			19.0	0.474	1.07	1.274
3,3',4 - TriCB	35		U		0.493		
3,3',5 - TriCB	36		U		0.440		
3,4,4' - TriCB	37		B	170	0.496	1.03	1.001
3,4,5 - TriCB	38			8.62	0.480	1.00	0.969
3,4',5 - TriCB	39			24.0	0.444	0.99	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	2180	0.107	0.78	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1600	0.0994	0.79	1.312
2,2',3,5 - TeCB	43			220	0.112	0.79	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C F				
2,2',3,6 - TeCB	45	45 + 51	C B	558	0.107	0.79	1.147
2,2',3,6' - TeCB	46			208	0.121	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	860	0.101	0.79	1.273
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	943	0.104	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			9.20	0.102	0.76	1.001
2,3,3',4 - TeCB	55		U		4.04		
2,3,3',4' - TeCB	56		B	1040	4.25	0.74	0.905
2,3,3',5 - TeCB	57			70.8	4.13	0.77	0.844
2,3,3',5' - TeCB	58		U		4.19		
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	935	0.0832	0.78	1.302
2,3,4,4' - TeCB	60		B	3230	4.10	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			783	3.98	0.77	0.865



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-F-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-41 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.4 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 20-Mar-2005	Instrument ID: HR GC/MS
Time: 5:37:48	GC Column ID: SPB-OCTYL
Extract Volume (µL): 300	Sample Data Filename: PB5C_146 S:10
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: 15	Cal. Ver. Data Filename: PB5C_146 S:1
Concentration Units: ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28	C D B	7350	2.71	1 03	0.848

15208AD3\_1.xls, S8

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0246



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	9940	0.333	0.80	1.287
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	8600	0.318	0.79	1.261
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	1/200	0.342	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	60 + 62 + 76					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	16400	47.1	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-41
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.4 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 4:02:23	Instrument ID:	HR GC/MS
Extract Volume (µL): 20	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_134 S:9

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		5.46	0.0891
Total Dichloro Biphenyls		416	0.235
Total Trichloro Biphenyls		16600	0.499
Total Tetrachloro Biphenyls		84600	4.56
Total Pentachloro Biphenyls		189000	24.0
Total Hexachloro Biphenyls		247000	63.3
Total Heptachloro Biphenyls		111000	0.788
Total Octachloro Biphenyls		18400	1.63
Total Nonachloro Biphenyls		1100	0.104
Decachloro Biphenyl		105	0.0481
TOTAL PCBs		669000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15208PCBTOTALS\_1.xls, S6

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0250

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-F-PS-WB-comp-1

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-06-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-47
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.9 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID:	HR GC/MS
Time: 5:06:37	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 20	Sample Data Filename:	PB5C_134 S:10
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C 134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	2.83	0.0608	3.06	1.000
3 - MoCB	2		JB	0.243	0.0645	3.25	0.988
4 - MoCB	3		JB	0.460	0.0722	3.33	1.000
2,2' - DiCB	4		B	65.9	0.151	1.53	1.001
2,3 - DiCB	5			1.94	0.108	1.57	1.198
2,3' - DiCB	6			57.2	0.101	1.55	1.176
2,4 - DiCB	7		B	2.89	0.0962	1.59	1.158
2,4' - DiCB	8		B	112	0.0881	1.55	1.207
2,5 - DiCB	9			8.88	0.100	1.58	1.146
2,6 - DiCB	10			4.05	0.104	1.51	1.014
3,3' - DiCB	11		JB	1.79	0.105	1.54	0.968
3,4 - DiCB	12	12 + 13	C B	4.51	0.103	1.53	0.986
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.0994		
4,4' - DiCB	15		KB	14.0	0.128	1.57	1.000
2,2',3 - TriCB	16		B	204	0.0990	1.05	1.165
2,2',4 - TriCB	17		B	446	0.0934	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	1060	0.0788	1.05	1.113
2,2',6 - TriCB	19		B	133	0.132	1.06	1.001
2,3,3' - TriCB	20	20 + 28	C B	3450	0.239	1.04	0.849

15208AD1\_1.xls, S7

Approved by:  QA/QC Chemist

22-04-2005  
dd-mm-yyyy

0259

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	396	0.226	1.04	0.857
2,3,4' - TriCB	22		B	298	0.258	1.04	0.873
2,3,5 - TriCB	23		J	1.09	0.231	1.06	1.283
2,3,6 - TriCB	24			12.3	0.0657	1.06	1.158
2,3',4 - TriCB	25			114	0.210	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	985	0.213	1.01	1.301
2,3',6 - TriCB	27			208	0.0678	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1070	0.240	1.04	0.837
2,4',6 - TriCB	32		B	435	0.244	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			14.1	0.246	1.03	1.273
3,3',4 - TriCB	35		U		0.255		
3,3',5 - TriCB	36		U		0.228		
3,4,4' - TriCB	37		B	69.8	0.249	1.05	1.002
3,4,5 - TriCB	38			7.94	0.248	1.09	0.969
3,4',5 - TriCB	39			17.4	0.230	1.01	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1560	0.0838	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1080	0.0778	0.79	1.312
2,2',3,5 - TeCB	43			174	0.0880	0.73	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C F				
2,2',3,6 - TeCB	45	45 + 51	C B	417	0.0837	0.79	1.148
2,2',3,6' - TeCB	46			162	0.0949	0.79	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	571	0.0793	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	750	0.0815	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			11.4	0.0912	0.75	1.001
2,3,3',4 - TeCB	55		U		3.22		
2,3,3',4' - TeCB	56		B	521	3.38	0.78	0.905
2,3,3',5 - TeCB	57			54.6	3.29	0.77	0.844
2,3,3',5' - TeCB	58			32.5	3.34	0.81	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	707	0.0651	0.79	1.303
2,3,4,4' - TeCB	60		B	1800	3.27	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			605	3.17	0.78	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		B	2550	0.0605	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3,4,4' - TeCB	66		E				
2,3,4,5 - TeCB	67			75.0	2.89	0.78	0.856
2,3,4,5' - TeCB	68			19.9	3.11	0.81	0.831
2,3,4,6 - TeCB	69	49 + 69	C49				
2,3,4,5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3,4,6 - TeCB	71	40 + 41 + 71	C40				
2,3,5,5' - TeCB	72			297	3.22	0.77	0.822
2,3,5,6 - TeCB	73		U		0.0611		
2,4,4,5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4,6 - TeCB	75	59 + 62 + 75	C59				
2,3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3,4,4' - TeCB	77		B	189	3.47	0.78	1.000
3,3,4,5 - TeCB	78		U		3.41		
3,3,4,5' - TeCB	79			151	2.85	0.72	0.970
3,3,5,5' - TeCB	80		U		3.14		
3,4,4,5 - TeCB	81			14.1	3.29	0.85	1.000
2,2',3,3',4 - PeCB	82		B	987	0.747	1.57	0.933
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	2520	0.779	1.57	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	3780	0.593	1.57	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2280	0.670	1.57	1.154
2,2',3,4,6' - PeCB	89		U		0.746		
2,2',3,4,5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4,6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		E				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			40.1	0.715	1.61	1.102
2,2',3,5,6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			59.8	0.0927	1.58	1.015
2,2',3,4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4,5 - PeCB	99	83 + 99	C83				
2,2',4,4,6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,6 - PeCB	103			297	0.633	1.58	1.093
2,2',4,6,6' - PeCB	104			2.45	0.108	1.61	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5 - PeCB	106		U		9.70		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C B	451	10.5	1.54	0.990
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		B	2940	10.1	1.53	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			44.9	0.518	1.56	0.945
2,3,3',5,6' - PeCB	112		U		0.501		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		B	646	10.0	1.54	1.001
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		E				
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			185	0.506	1.56	0.958
2,3',4,5',6' - PeCB	121			15.0	0.517	1.60	1.200
2',3,3',4,5' - PeCB	122		U		11.0		
2',3,4,4',5' - PeCB	123		B	416	10.1	1.55	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		B	47.4	10.2	1.54	1.000
3,3',4,5,5' - PeCB	127			66.4	10.5	1.50	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4310	40.2	1.27	0.958
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		B	3170	51.1	1.27	0.913
2,2',3,3',4,6' - HxCB	131			192	49.2	1.26	1.159
2,2',3,3',4,6' - HxCB	132		B	4920	47.8	1.27	1.174
2,2',3,3',5,5' - HxCB	133			1090	45.3	1.28	1.192
2,2',3,3',5,6' - HxCB	134	134 + 143	C	1160	47.0	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C E				
2,2',3,3',6,6' - HxCB	136		B	2090	0.105	1.26	1.024
2,2',3,4,4',5' - HxCB	137		B	1830	43.5	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C	496	43.8	1.28	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	5260	45.8	1.27	0.903
2,2',3,4,5,6' - HxCB	142		U		46.1		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144			1220	0.133	1.26	1.121
2,2',3,4,6,6' - HxCB	145			3.08	0.107	1.38	1.034
2,2',3,4',5,5' - HxCB	146		E				
2,2',3,4',5,6' - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148			77.6	0.138	1.25	1.084
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			41.7	0.101	1.27	1.013
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			9.87	0.104	1.24	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		K	3.62	0.113	0.08	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	5580	41.3	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3300	33.2	1.27	0.938
2,3,3',4,5,5' - HxCB	159			110	34.4	1.28	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		33.4		
2,3,3',4',5,5' - HxCB	162			166	35.2	1.26	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	1540	36.1	1.27	0.921
2,3,3',5,5',6 - HxCB	165		U		37.5		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1870	32.6	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		25.3		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	2670	0.337	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172		B	1850	0.337	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	2980	0.317	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			386	0.300	1.05	1.103
2,2',3,3',4,6,6' - HpCB	176			559	0.237	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		E				
2,2',3,3',5,5',6 - HpCB	178			3250	0.316	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2320	0.232	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			69.6	0.319	1.05	1.156
2,2',3,4,4',5,6' - HpCB	182			62.4	0.302	1.13	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			5.07	0.223	1.04	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.243		
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			18.0	0.239	1.05	1.001
2,3,3',4,4',5,5' - HpCB	189		B	350	0.798	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2180	0.270	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			456	0.258	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.272		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	2850	0.693	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195			1130	0.724	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196			1460	0.0511	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C	230	0.0461	0.89	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	3190	0.0509	0.90	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201			348	0.0461	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1060	0.0461	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	2210	0.0480	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		J	0.448	0.0461	0.88	1.039
2,3,3',4,4',5,5',6 - OcCB	205			132	0.616	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	496	0.0810	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			59.3	0.0618	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		B	152	0.0690	0.78	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	55.0	0.0461	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.





Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-F-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-47 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.9 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 20-Mar-2005	Instrument ID: HR GC/MS
Time: 6:42:06	GC Column ID: SPB-OCTYL
Extract Volume (µL): 300	Sample Data Filename: PB5C_146 S:11
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: 15	Cal. Ver. Data Filename: PB5C_146 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15208AD3\_1.xls, S9

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

026

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	8010 /	0.424	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	7270 /	0.405	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	17000 /	0.436	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	8860 /	67.4	0.79	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ADUND. RATIO	RRT
2,3,4,6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3,4,4' - TeCB	66		D B	9250 /	69.9	0.78	0.884
2,3,4,5 - TeCB	67						
2,3,4,5' - TeCB	68						
2,3,4,6 - TeCB	69	49 + 69	C49				
2,3,4,5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3,4,6 - TeCB	71	40 + 41 + 71					
2,3,5,5' - TeCB	72						
2,3,5,6 - TeCB	73						
2,4,4,5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4,6 - TeCB	75	59 + 62 + 75					
2,3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3,4,4' - TeCB	77						
3,3,4,5 - TeCB	78						
3,3,4,5' - TeCB	79						
3,3,5,5' - TeCB	80						
3,4,4,5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	17900 /	6.35	1.57	0.885
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	11500 /	5.64	1.58	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4,5 - PeCB	90	90 + 101 + 113	C D B	25800 /	5.70	1.58	0.870
2,2',3,4,6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92		D B	7110 /	6.56	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	14600 /	6.06	1.57	1.120
2,2',3,5,6' - PeCB	94						
2,2',3,5,6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3,4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105		D B	8750 /	53.1	1.56	1.000
2,3,3',4,5 - PeCB	106						



0269

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	18600 /	4.93	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	29600 /	48.9	1.57	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	48100 /	56.8	1.26	0.928
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D B	14000 /	0.509	1.27	1.104
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146		D B	10600 /	60.6	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	19800 /	60.0	1.26	1.133
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	47800 /	52.0	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	9910 /	0.979	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177		D B	6570 /	0.922	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	26700 /	0.770	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	7270 /	0.819	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	16600 /	0.781	1.05	1.110
2,2',3,4',5,6,6' - HpCB	100						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-47
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.9 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 5:06:37	Instrument ID:	HR GC/MS
Extract Volume (µL): 20	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_134 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_134 S:10 PB5C_146 S:11

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		3.53	0.0722
Total Dichloro Biphenyls		260	0.151
Total Trichloro Biphenyls		8930	0.258
Total Tetrachloro Biphenyls		62100	3.47
Total Pentachloro Biphenyls		149000	11.0
Total Hexachloro Biphenyls		179000	51.1
Total Heptachloro Biphenyls		84300	0.798
Total Octachloro Biphenyls		12600	0.724
Total Nonachloro Biphenyls		707	0.0810
Decachloro Biphenyl		55.0	0.0461
TOTAL PCBs		496000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-47

Sample Size: 10.9 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s): PB5C\_134 S:10  
 PB5C\_146 S:11

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			189	3.47	0.0001	1.89E-02	1.89E-02
3,4,4',5-TetraCB	81			14.1	3.29	0.0001	1.41E-03	1.41E-03
2,3,3',4,4'-PentaCB	105			8750	53.1	0.0001	8.75E-01	8.75E-01
2,3,4,4',5-PentaCB	114			646	10.0	0.0005	3.23E-01	3.23E-01
2,3',4,4',5-PentaCB	118			29600	48.9	0.0001	2.96E+00	2.96E+00
2',3,4,4',5-PentaCB	123			416	10.1	0.0001	4.16E-02	4.16E-02
3,3',4,4',5-PentaCB	126			47.4	10.2	0.1	4.74E+00	4.74E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	5580	41.3	0.0005	2.79E+00	2.79E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1870	32.6	0.00001	1.87E-02	1.87E-02
3,3',4,4',5,5'-HexaCB	169		U		25.3	0.01	1.26E-01	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			350	0.790	0.0001	3.50E-02	3.50E-02
TOTAL TEQ							11.9	11.8

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

0270



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-ES-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-76 (A)
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.6 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 14:55:24	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_135 S:8
Dilution Factor: N/A	Blank Data Filename: PB5C_134 S:5
Concentration Units: ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_135 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	3.08 ✓	0.0647	3.29	1.001
3 - MoCB	2		JB	0.338	0.0673	2.68	0.987
4 - MoCB	3		JB	0.580	0.0724	3.58	1.000
2,2' - DiCB	4		B	87.1 ✓	0.231	1.57	1.001
2,3 - DiCB	5			2.75 ✓	0.144	1.54	1.197
2,3' - DiCB	6			67.8 ✓	0.125	1.57	1.176
2,4 - DiCB	7		B	6.48 ✓	0.123	1.57	1.158
2,4' - DiCB	8		B	167 ✓	0.110	1.56	1.207
2,5 - DiCB	9			10.7 ✓	0.131	1.55	1.146
2,6 - DiCB	10			4.09 ✓	0.131	1.68	1.014
3,3' - DiCB	11		B	2.00 ✓	0.137	1.03	0.900
3,4 - DiCB	12	12 + 13	C B	4.76 ✓	0.132	1.45	0.985
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.133		
4,4' - DiCB	15		KB	14.9 ✓	0.154	1.47	1.000
2,2',3 - TriCB	16		B	227	0.0480	1.05	1.166
2,2',4 - TriCB	17		B	590	0.0487	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	1070	0.0472	1.05	1.113
2,2',6 - TriCB	19		B	161	0.0769	1.06	1.001
2,3,3' - TriCB	20	20 + 28	C B	3680	0.554	1.02	0.848

15208AD2\_1.xls, S2

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0278

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	788	0.502	1.02	0.857
2,3,4' - TriCB	22		B	738	0.577	1.03	0.872
2,3,5 - TriCB	23			2.14 x	0.526	1.11	1.283
2,3,6 - TriCB	24			13.7	0.0472	1.02	1.159
2,3',4 - TriCB	25			397	0.450	1.02	0.825
2,3',5 - TriCB	26	26 + 29	C B	1100	0.544	1.02	1.302
2,3',6 - TriCB	27			182	0.0472	1.04	1.152
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2140	0.513	1.03	0.837
2,4',6 - TriCB	32		B	530	0.523	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			20.8	0.554	1.02	1.275
3,3',4 - TriCB	35		U		0.616		
3,3',5 - TriCB	36		U		0.516		
3,4,4' - TriCB	37		B	145	0.538	1.02	1.001
3,4,5 - TriCB	38			8.11	0.522	0.96	0.969
3,4',5 - TriCB	39			23.4	0.525	0.96	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	2430	0.0472	0.79	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1440	0.0472	0.78	1.312
2,2',3,5 - TeCB	43			222	0.0472	0.79	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C E				
2,2',3,6 - TeCB	45	45 + 51	C B	714	0.0472	0.79	1.147
2,2',3,6' - TeCB	46			133	0.0472	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	773	0.0472	0.78	1.275
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	800	0.0472	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			14.2	0.0472	0.79	1.001
2,3,3',4 - TeCB	55			75.4	3.31	0.79	0.890
2,3,3',4' - TeCB	56		B	1460	3.43	0.78	0.904
2,3,3',5 - TeCB	57			80.7	3.25	0.78	0.844
2,3,3',5' - TeCB	58			640	3.34	0.73	0.848
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	782	0.0472	0.80	1.303
2,3,4,4' - TeCB	60		B	1570	3.28	0.78	0.910
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			433	3.17	0.78	0.804



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		B	2950	0.0472	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		E				
2,3',4,5 - TeCB	67			180	2.79	0.77	0.856
2,3',4,5' - TeCB	68			149	2.94	0.78	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			264	3.12	0.77	0.822
2,3',5,6 - TeCB	73		U		0.0472		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		B	287	3.56	0.78	1.000
3,3',4,5 - TeCB	78		U		3.49		
3,3',4,5' - TeCB	79			176	2.86	0.72	0.970
3,3',5,5' - TeCB	80		U		3.17		
3,4,4',5 - TeCB	81		K	16.3	3.35	0.78	1.001
2,2',3,3',4 - PeCB	82		B	1510	3.40	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	3350	3.44	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	4640	2.61	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	3640	2.98	1.57	1.155
2,2',3,4,6' - PeCB	89			130	3.29	1.58	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		E				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			76.5	3.08	1.57	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			84.5	0.0472	1.59	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			467	2.75	1.57	1.094
2,2',4,6,6' - PeCB	104			4.41	0.0472	1.64	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5 - PeCB	106		U		4.75		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C B	886	4.77	1.55	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		B	2460	4.76	1.55	0.998
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			38.3	2.33	1.60	0.945
2,3,3',5,6 - PeCB	112			112	2.25	1.59	0.889
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		B	624	4.65	1.56	1.001
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			207	2.28	1.59	0.958
2,3',4,5',6 - PeCB	121			15.0 X	2.28	1.57	1.201
2',3,3',4,5 - PeCB	122			135	5.44	1.54	1.010
2',3,4,4',5 - PeCB	123		B	462	4.84	1.54	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		B	36.6 X	4.95	1.56	1.000
3,3',4,5,5' - PeCB	127			71.6	5.01	1.52	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4940	3.90	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		B	2790	5.14	1.26	0.913
2,2',3,3',4,6 - HxCB	131			325	4.53	1.27	1.159
2,2',3,3',4,6' - HxCB	132		B	9690	4.67	1.26	1.174
2,2',3,3',5,5' - HxCB	133			1060	4.47	1.27	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C	1690	4.57	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C E				
2,2',3,3',6,6' - HxCB	136		B	3550	0.0472	1.27	1.023
2,2',3,4,4',5 - HxCB	137		B	1870	4.82	1.25	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	878	4.17	1.27	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	8220	4.73	1.27	0.903
2,2',3,4,5,6 - HxCB	142		U		4.55		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1940	0.0472	1.26	1.121
2,2',3,4,6,6' - HxCB	145			9.64	0.0472	1.27	1.033
2,2',3,4',5,5' - HxCB	146		B	8990	4.02	1.27	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148			152	0.0472	1.25	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			79.9	0.0472	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			19.8	0.0472	1.25	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			6.51	0.0472	1.34	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	4320	3.97	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	4850	3.37	1.26	0.938
2,3,3',4,5,5' - HxCB	159			333	3.40	1.23	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.40		
2,3,3',4',5,5' - HxCB	162			106	3.39	1.31	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	2970	3.46	1.26	0.921
2,3,3',5,5',6 - HxCB	165			43.7	3.66	1.27	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1810	3.20	1.28	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		20.6		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3530	0.504	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172		B	1950	0.514	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		E				
2,2',3,3',4,5',6 - HpCB	175			495	0.450	1.04	1.103
2,2',3,3',4,6,6' - HpCB	176			1320	0.348	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		E				
2,2',3,3',5,5',6 - HpCB	178			3080	0.471	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	4360	0.339	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			95.9	0.462	1.05	1.157
2,2',3,4,4',5,6' - HpCB	182			132	0.444	1.03	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			8.36	0.325	1.08	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		J	1.68	0.350	1.03	1.047
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			31.5	0.349	1.05	1.001
2,3,3',4,4',5,5' - HpCB	189		B	310	1.03	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	3250	0.410	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191			581	0.393	1.03	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.414		



COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	4130	1.27	0.91	0.991
2,2',3,3',4,4',5,6 - OcCB	195			1790	1.38	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196			2780	0.0472	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C	640	0.0472	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	5130	0.0472	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201			614	0.0472	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1210	0.0472	0.90	1.001
2,2',3,4,4',5,5',6 - OcCB	203		B	3870	0.0472	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		J	1.06	0.0472	0.90	1.039
2,3,3',4,4',5,5',6 - OcCB	205			268	1.06	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	928	0.146	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			123	0.113	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		B	237	0.122	0.78	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	108	0.0472	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-M-ES-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 02-Mar-2005  
Analysis Date: 19-Mar-2005 Time: 23:11:50  
Extract Volume (µL): 200  
Injection Volume (µL): 1.0  
Dilution Factor: 10  
Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
Project No.: 01 08 06 22  
Lab Sample ID: L7311-76 W (A)  
Sample Size: 10.6 g (wet)  
Initial Calibration Date: 01-Mar-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Sample Data Filename: PB5C\_146 S:4  
Blank Data Filename: PB5C\_134 S:5  
Cal. Ver. Data Filename: PB5C\_146 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15208AD3\_1.xls. S2

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0286

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	7030	0.142	0.80	1.286
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	8370	0.136	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	13800	0.147	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	14600	20.4	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						





Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-76 (A)
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.6 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 14:55:24	Instrument ID:	HR GC/MS
Extract Volume (µL): 20	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_135 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_135 S:8 PB5C_146 S:4

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		3.99	0.0724
Total Dichloro Biphenyls		353	0.231
Total Trichloro Biphenyls		11800	0.616
Total Tetrachloro Biphenyls		69100	3.56
Total Pentachloro Biphenyls		193000	5.44
Total Hexachloro Biphenyls		239000	20.6
Total Heptachloro Biphenyls		113000	1.03
Total Octachloro Biphenyls		20400	1.38
Total Nonachloro Biphenyls		1290	0.146
Decachloro Biphenyl		108	0.0472
TOTAL PCBs		648000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15208PCBTOTALS\_1.xls, S9

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0294

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.6 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-76 (A)  
 GC Column ID(s): SPB-OCTYL  
 Sample Datafile(s): PB5C\_135 S:8  
 PB5C\_146 S:4

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			287	3.56	0.0001	2.87E-02	2.87E-02
3,4,4',5-TetraCB	81		U		3.35	0.0001	1.67E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			8320	55.5	0.0001	8.32E-01	8.32E-01
2,3,4,4',5-PentaCB	114			624	4.65	0.0005	3.12E-01	3.12E-01
2,3',4,4',5-PentaCB	118			30400	50.6	0.0001	3.04E+00	3.04E+00
2',3,4,4',5-PentaCB	123			462	4.84	0.0001	4.62E-02	4.62E-02
3,3',4,4',5-PentaCB	126			36.6	4.95	0.1	3.66E+00	3.66E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	4320	3.97	0.0005	2.16E+00	2.16E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1810	3.20	0.00001	1.81E-02	1.81E-02
3,3',4,4',5,5'-HexaCB	169		U		20.6	0.01	1.03E-01	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			310	1.03	0.0001	3.10E-02	3.10E-02
TOTAL TEQ							10.2	10.1

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-ES-FL-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: WG15208-103 (DUP L7311-76)
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID: HR GC/MS
Time: 15:59:40	GC Column ID: SPB-OCTYL
Extract Volume (µL): 20	Sample Data Filename: PB5C_135 S:9
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_135 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	2.84	0.0571	3.06	1.001
3 - MoCB	2		JB	0.263 Y	0.0618	2.69	0.988
4 - MoCB	3		JB	0.503	0.0688	3.60	1.001
2,2' - DiCB	4		B	82.3	0.208	1.55	1.001
2,3 - DiCB	5			2.49	0.142	1.58	1.198
2,3' - DiCB	6			67.3	0.123	1.57	1.176
2,4 - DiCB	7		B	6.44	0.121	1.57	1.158
2,4' - DiCB	8		B	165	0.108	1.55	1.207
2,5 - DiCB	9			10.9	0.129	1.59	1.146
2,6 - DiCB	10			4.26	0.130	1.65	1.014
3,3' - DiCB	11		KJB	1.51	0.135	1.66	0.968
3,4 - DiCB	12	12 + 13	C JB	3.34	0.130	1.59	0.986
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.131		
4,4' - DiCB	15		KB	15.7	0.157	1.49	1.000
2,2',3 - TriCB	16		B	228	0.0800	1.04	1.165
2,2',4 - TriCB	17		B	597	0.0812	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	1100	0.0685	1.05	1.113
2,2',6 - TriCB	19		B	154	0.112	1.06	1.001
2,3,3' - TriCB	20	20 + 28	C B	3500	0.674	1.02	0.848

15208AD2\_1.xls, S3

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0297

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	749	0.611	1.02	0.857
2,3,4' - TriCB	22		B	702	0.702	1.03	0.872
2,3,5 - TriCB	23			1.98	0.640	1.00	1.283
2,3,6 - TriCB	24			13.2	0.0579	1.06	1.158
2,3',4 - TriCB	25			384	0.548	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	1080	0.662	1.03	1.302
2,3',6 - TriCB	27			182	0.0590	1.05	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2030	0.624	1.03	0.836
2,4',6 - TriCB	32		B	523	0.637	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			20.6	0.674	1.02	1.274
3,3',4 - TriCB	35		U		0.750		
3,3',5 - TriCB	36		U		0.628		
3,4,4' - TriCB	37		B	137	0.697	1.02	1.001
3,4,5 - TriCB	38			7.72	0.635	0.99	0.969
3,4',5 - TriCB	39			20.6	0.639	0.98	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	2360	0.104	0.80	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1410	0.0945	0.79	1.312
2,2',3,5 - TeCB	43			225	0.102	0.78	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C E				
2,2',3,6 - TeCB	45	45 + 51	C B	718	0.103	0.79	1.147
2,2',3,6' - TeCB	46			135	0.114	0.79	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	755	0.0990	0.79	1.273
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	806	0.102	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			13.4	0.113	0.79	1.000
2,3,3',4 - TeCB	55		U		3.44		
2,3,3',4' - TeCB	56		B	1410	3.56	0.79	0.905
2,3,3',5 - TeCB	57			85.4	3.37	0.76	0.844
2,3,3',5' - TeCB	58			586	3.47	0.72	0.848
2,3,3',6 - TeCB	59	59 + 62 + 75	C B	774	0.0798	0.78	1.302
2,3,4,4' - TeCB	60		B	1500	3.41	0.79	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	03			422	3.30	0.70	0.905



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		B	2900	0.0744	0.79	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		E				
2,3',4,5' - TeCB	67			171	2.90	0.77	0.856
2,3',4,5' - TeCB	68			143	3.06	0.76	0.831
2,3',4,6' - TeCB	69	49 + 69	C49				
2,3',4',5' - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6' - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			259	3.24	0.78	0.822
2,3',5',6' - TeCB	73		U		0.0827		
2,4,4',5' - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6' - TeCB	75	59 + 62 + 75	C59				
2',3,4,5' - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		B	278	3.83	0.78	1.000
3,3',4,5' - TeCB	78		U		3.63		
3,3',4,5' - TeCB	79			187	2.97	0.73	0.970
3,3',5,5' - TeCB	80		U		3.30		
3,4,4',5' - TeCB	81		K	19.2	3.52	0.79	1.001
2,2',3,3',4' - PeCB	82		B	1490	4.25	1.57	0.933
2,2',3,3',5' - PeCB	83	83 + 99	C E				
2,2',3,3',6' - PeCB	84		B	3340	4.30	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	4580	3.27	1.57	0.920
2,2',3,4,5' - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6' - PeCB	88	88 + 91	C B	3660	3.73	1.58	1.154
2,2',3,4,6' - PeCB	89			129	4.12	1.58	1.182
2,2',3,4',5' - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6' - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		E				
2,2',3,5,6' - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			77.3	3.85	1.59	1.102
2,2',3,5',6' - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			85.4	0.0847	1.57	1.015
2,2',3',4,5' - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6' - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5' - PeCB	99	83 + 99	C83				
2,2',4,4',6' - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C00				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6' - PeCB	103			471	3.44	1.57	1.093
2,2',4,6,6' - PeCB	104			4.55	0.105	1.60	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5' - PeCB	106		U		5.01		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C B	860	5.03	1.54	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109		B	2400	5.02	1.55	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			39.2	2.92	1.43	0.945
2,3,3',5,6 - PeCB	112			75.2	2.82	1.58	0.889
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114		B	598	4.99	1.54	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			206	2.85	1.54	0.958
2,3',4,5',6 - PeCB	121			15.1	2.85	1.57	1.200
2',3,3',4,5 - PeCB	122			115	5.73	1.52	1.010
2',3,4,4',5 - PeCB	123		B	442	5.03	1.53	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		B	29.1	5.12	1.59	1.000
3,3',4,5,5' - PeCB	127			62.2	5.28	1.58	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4830	6.61	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		B	2640	8.72	1.26	0.913
2,2',3,3',4,6 - HxCB	131			324	7.69	1.26	1.158
2,2',3,3',4,6' - HxCB	132		B	9290	7.92	1.26	1.174
2,2',3,3',5,5' - HxCB	133			1000	7.58	1.26	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	1710	7.75	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C E				
2,2',3,3',6,6' - HxCB	136		B	3570	0.0877	1.26	1.024
2,2',3,4,4',5 - HxCB	137		B	1950	8.17	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	852	7.07	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	8010	8.02	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		7.72		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1900	0.115	1.27	1.121
2,2',3,4,6,6' - HxCB	145		K	9.07	0.0885	1.79	1.033
2,2',3,4',5,5' - HxCB	146		B	8680	6.82	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148			151	0.117	1.26	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



0300

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			81.1	0.0829	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			19.9	0.0826	1.30	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			6.25	0.0976	1.27	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	4220	6.83	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	4510	5.72	1.26	0.938
2,3,3',4,5,5' - HxCB	159			330	5.77	1.25	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		5.76		
2,3,3',4',5,5' - HxCB	162			113	5.75	1.26	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	2680	5.87	1.27	0.921
2,3,3',5,5',6 - HxCB	165			41.5	6.21	1.10	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1740	5.46	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		26.7		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3460	0.918	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172		B	1890	0.937	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		E				
2,2',3,3',4,5',6 - HpCB	175			492	0.820	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176			1310	0.634	1.05	1.033
2,2',3,3',4',5,6 - HpCB	177		E				
2,2',3,3',5,5',6 - HpCB	178			3050	0.859	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	4320	0.618	1.05	1.009
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			92.3	0.841	1.03	1.156
2,2',3,4,4',5,6' - HpCB	182			116	0.810	1.05	1.115
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			8.68	0.592	1.03	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		J	1.68	0.638	0.96	1.047
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	190			31.1	0.630	1.06	1.000
2,3,3',4,4',5,5' - HpCB	189		B	307	0.778	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	3220	0.748	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			572	0.716	1.04	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.755		

15208AD2\_1.xls, S3

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0301

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	3980	1.42	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195			1780	1.54	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196			2760	0.0614	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	107	197 + 200	C	608	0.0486	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	5040	0.0611	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201			597	0.0486	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1190	0.0536	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	3850	0.0552	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		J	0.985	0.0486	0.80	1.039
2,3,3',4,4',5,5',6 - OcCB	205			259	1.19	0.90	1.001
2,2',3,3',4,4',5,5',6 - NoCB	206		B	924	0.175	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			118	0.137	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208		B	231	0.150	0.79	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	106	0.0486	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-ES-FL-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-00-22
Matrix: TISSUE	Lab Sample ID: WG15208-103 W (DUP L7311-76)
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 20-Mar-2005	Instrument ID: HR GC/MS
Extract Volume (µL): 200	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_146 S:5
Dilution Factor: 10	Blank Data Filename: PB5C_134 S:5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_146 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15208AD3\_1.xls, S3

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0305

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	6840	0.278	0.80	1.287
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	8350	0.265	0.80	1.259
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	13800	0.286	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	50 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	14100	30.9	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		D B	9460	32.0	0.78	0.884
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	20800	11.5	1.57	0.885
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	16900	10.2	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	37900	10.3	1.58	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92		D B	6830	11.9	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	17000	11.0	1.57	1.121
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C00				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105		D B	8070	27.5	1.56	1.000
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	31400	8.93	1.58	0.924
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	29300	24.1	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	56800	28.4	1.26	0.929
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C D B	16200	0.278	1.26	1.104
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6 - HxCB	147	147 + 149	C D B	38400	30.0	1.26	1.133
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	63800	26.0	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170		D B	10500	0.616	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174		D B	9190	0.557	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177		D B	7650	0.580	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	32800	0.484	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C D B	10900	0.515	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	21400	0.491	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',5,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	WG15208-103 (DUP L7311-76)
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID:	HR GC/MS
Time: 15:59:40	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 20	Blank Data Filename:	PB5C_134 S:5
Injection Volume (µL): 1.0	Cal. Ver. Data Filename:	PB5C_135 S:1
Dilution Factor: N/A	Sample Datafile(s):	PB5C_135 S:9 PB5C_146 S:5
Concentration Units : ng/kg (wet weight basis)		

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		3.60	0.0688
Total Dichloro Biphenyls		342	0.208
Total Trichloro Biphenyls		11400	0.750
Total Tetrachloro Biphenyls		67600	3.83
Total Pentachloro Biphenyls		167000	5.73
Total Hexachloro Biphenyls		234000	26.7
Total Heptachloro Biphenyls		111000	0.937
Total Octachloro Biphenyls		20100	1.54
Total Nonachloro Biphenyls		1270	0.175
Decachloro Biphenyl		106	0.0486
TOTAL PCBs		633000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15208PCBTOTALS\_1.xls, S8

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0313

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-ES-FL-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: WG15208-103  
 (DUP L7311-76)  
 SPB-OCTYL

Sample Size: 10.3 g (wet)

GC Column ID(s):

Concentration Units: ng/kg (wet weight basis)

Sample Datafile(s): PB5C\_135 S:9  
 PB5C\_146 S:5

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			278	3.83	0.0001	2.78E-02	2.78E-02
3,4,4',5-TetraCB	81		U		3.52	0.0001	1.76E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			8070	27.5	0.0001	8.07E-01	8.07E-01
2,3,4,4',5-PentaCB	114			598	4.99	0.0005	2.99E-01	2.99E-01
2,3',4,4',5-PentaCB	118			29300	24.1	0.0001	2.93E+00	2.93E+00
2',3,4,4',5-PentaCB	123			442	5.03	0.0001	4.42E-02	4.42E-02
3,3',4,4',5-PentaCB	126			29.1	5.12	0.1	2.91E+00	2.91E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	4220	6.83	0.0005	2.11E+00	2.11E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1740	5.46	0.00001	1.74E-02	1.74E-02
3,3',4,4',5,5'-HexaCB	169		U		26.7	0.01	1.33E-01	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			307	0.778	0.0001	3.07E-02	3.07E-02
<b>TOTAL TEQ</b>							<b>9.32</b>	<b>9.19</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.




Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-M-ES-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 02-Sep-2004
Contract No.: 4033	Project No.: 04-00-00-22
Matrix: TISSUE	Lab Sample ID: L7311-78
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.8 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 17:03:55	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_135 S:10
Dilution Factor: N/A	Blank Data Filename: PB5C_134 S:5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_135 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	2.84	0.0462	3.28	1.001
3 - MoCB	2		JB	0.269	0.0462	3.01	0.988
4 - MoCB	3		JB	0.466	0.0462	3.04	1.000
2,2' - DiCB	4		B	104	0.0986	1.55	1.001
2,3 - DiCB	5			2.58	0.0669	1.52	1.196
2,3' - DiCB	6			95.1	0.0581	1.58	1.175
2,4 - DiCB	7		B	7.04	0.0572	1.56	1.158
2,4' - DiCB	8		B	183	0.0511	1.57	1.206
2,5 - DiCB	9			13.2	0.0608	1.56	1.145
2,6 - DiCB	10			5.16	0.0611	1.59	1.013
3,3' - DiCB	11		B	2.05	0.0636	1.47	0.968
3,4 - DiCB	12	12 + 13	C B	4.66	0.0612	1.47	0.986
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.0617		
4,4' - DiCB	15		KB	18.3	0.0735	1.52	1.000
2,2',3 - TriCB	16		B	277	0.0462	1.05	1.165
2,2',4 - TriCB	17		B	817	0.0462	1.04	1.139
2,2',5 - TriCB	18	18 + 30	C B	1420	0.0462	1.05	1.113
2,2',6 - TriCB	19		B	183	0.0519	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C E				

15208AD2\_1.xls, S4

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0310

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	866	0.291	1.03	0.857
2,3,4' - TriCB	22		B	758	0.335	1.03	0.872
2,3,5 - TriCB	23			2.31	0.305	1.02	1.283
2,3,6 - TriCB	24			13.8	0.0462	1.05	1.158
2,3',4 - TriCB	25			450	0.261	1.02	0.825
2,3',5 - TriCB	26	26 + 29	C B	1290	0.315	1.02	1.301
2,3',6 - TriCB	27			225	0.0462	1.04	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		E				
2,4',6 - TriCB	32		B	680	0.304	1.01	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			24.6	0.321	1.02	1.273
3,3',4 - TriCB	35		U		0.357		
3,3',5 - TriCB	36		U		0.300		
3,4,4' - TriCB	37		R	103	0.336	1.03	1.002
3,4,5 - TriCB	38			7.88	0.303	0.98	0.969
3,4',5 - TriCB	39			29.5	0.305	0.96	0.948
2,2',3,3' - TeCB	40	40 + 41 + 71	C E				
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1610	0.0462	0.79	1.313
2,2',3,5 - TeCB	43			224	0.0462	0.79	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C E				
2,2',3,6 - TeCB	45	45 + 51	C B	881	0.0462	0.79	1.148
2,2',3,6' - TeCB	46			171	0.0462	0.79	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	986	0.0462	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C E				
2,2',4,6 - TeCB	50	50 + 53	C B	960	0.0462	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		E				
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			16.2	0.0462	0.77	1.001
2,3,3',4 - TeCB	55		U		2.16		
2,3,3',4' - TeCB	56		U		2.23		
2,3,3',5 - TeCB	57			85.6	2.11	0.76	0.843
2,3,3',5' - TeCB	58			553	2.17	0.73	0.848
2,3,3',6 - TeCB	59	60 + 62 + 76	C B	780	0.0462	0.70	1.303
2,3,4,4' - TeCB	60		B	1380	2.13	0.79	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C E				
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			382	2.07	0.77	0.864

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4,6 - TeCB	64		E				
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		E				
2,3',4,5 - TeCB	67			166	1.82	0.76	0.857
2,3',4,5' - TeCB	68			140	1.92	0.76	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			248	2.03	0.77	0.822
2,3',5',6 - TeCB	73		U		0.0462		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77		B	240	2.43	0.78	1.000
3,3',4,5 - TeCB	78		U		2.27		
3,3',4,5' - TeCB	79			151	1.86	0.73	0.970
3,3',5,5' - TeCB	80		U		2.06		
3,4,4',5 - TeCB	81		K	15.6	2.20	0.80	1.001
2,2',3,3',4 - PeCB	82		B	1590	3.50	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		E				
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C E				
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C E				
2,2',3,4,6' - PeCB	89			155	3.39	1.57	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		E				
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			86.7	3.17	1.56	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			94.4	0.0462	1.57	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C00				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			453	2.83	1.57	1.093
2,2',4,6,6' - PeCB	104			4.44	0.0517	1.58	1.001
2,3,3',4,4' - PeCB	105		E				
2,3,3',4,5 - PeCB	106		U		2.30		



0318

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C B	723	2.31	1.55	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109		B	2040	2.30	1.54	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			31.6	2.40	1.70	0.945
2,3,3',5,6' - PeCB	112			46.5	2.32	1.58	0.890
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114		B	450	2.15	1.55	1.000
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		E				
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			171	2.35	1.60	0.958
2,3',4,5',6' - PeCB	121			12.8	2.35	1.58	1.200
2',3,3',4,5' - PeCB	122			93.9	2.63	1.54	1.010
2',3,4,4',5' - PeCB	123		B	270	2.33	1.55	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		B	29.2	2.34	1.53	1.000
3,3',4,5,5' - PeCB	127			34.8	2.42	1.53	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4010	2.07	1.27	0.958
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130		B	2090	2.73	1.26	0.913
2,2',3,3',4,6' - HxCB	131			270	2.40	1.26	1.159
2,2',3,3',4,6' - HxCB	132		E				
2,2',3,3',5,5' - HxCB	133			750	2.37	1.26	1.191
2,2',3,3',5,6' - HxCB	134	134 + 143	C	1440	2.42	1.27	1.140
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C E				
2,2',3,3',6,6' - HxCB	136		B	3010	0.0462	1.26	1.024
2,2',3,4,4',5' - HxCB	137		B	1450	2.55	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C	651	2.21	1.25	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		E				
2,2',3,4,5,6' - HxCB	142		U		2.41		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144			1510	0.0537	1.26	1.121
2,2',3,4,6,6' - HxCB	145		K	7.65	0.0462	1.56	1.033
2,2',3,4',5,5' - HxCB	146		E				
2,2',3,4',5,6' - HxCB	147	147 + 149	C E				
2,2',3,4',5,6' - HxCB	148			104	0.0546	1.26	1.084
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			64.4	0.0462	1.26	1.013
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			15.6	0.0462	1.27	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			4.49	0.0469	1.30	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	3130	2.11	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3400	1.79	1.26	0.938
2,3,3',4,5,5' - HxCB	159			203	1.80	1.26	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		1.80		
2,3,3',4',5,5' - HxCB	162			80.8	1.80	1.23	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164		B	2200	1.84	1.27	0.921
2,3,3',5,5',6 - HxCB	165			30.6	1.94	1.26	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1250	1.74	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		14.9		
2,2',3,3',4,4',5 - HpCB	170		E				
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	2460	0.504	1.04	1.163
2,2',3,3',4,5,5' - HpCB	172		B	1240	0.514	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		E				
2,2',3,3',4,5',6 - HpCB	175			343	0.450	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			938	0.348	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		E				
2,2',3,3',5,5',6 - HpCB	178			2070	0.471	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		E				
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			63.9	0.461	0.99	1.156
2,2',3,4,4',5,6' - HpCB	182			75.3	0.444	1.04	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C E				
2,2',3,4,4',6,6' - HpCB	184			5.62	0.325	1.03	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		J	1.14	0.350	1.07	1.047
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			18.9	0.350	1.05	1.000
2,3,3',4,4',5,5' - HpCB	189		B	226	0.324	0.99	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2050	0.410	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			376	0.393	1.04	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.414		



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-M-ES-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 02-Sep-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-78 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.8 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 20-Mar-2005	Instrument ID: HR GC/MS
Time: 1:20:31	GC Column ID: SPB-OCTYL
Extract Volume (µL): 300	Sample Data Filename: PB5C_146 S:6
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: 15	Cal. Ver. Data Filename: PB5C_146 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28	C D B	3800	3.43	1.04	0.847

15208AD3\_1.xls, S4

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0324

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31		D B	2310	3.32	1.04	0.835
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71	C D B	3150	0.640	0.80	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65	C D B	7310	0.593	0.80	1.287
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69	C D B	8140	0.566	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52		D B	13300	0.610	0.80	1.235
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C D B	13100	59.8	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



0525

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 02-Sep-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-78
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.8 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 17:03:55	Instrument ID: HR GC/MS
Extract Volume (µL): 20	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_134 S:5
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_135 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_135 S:10 PB5C_146 S:6

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		3.58	0.0462
Total Dichloro Biphenyls		416	0.0986
Total Trichloro Biphenyls		13300	0.357
Total Tetrachloro Biphenyls		66000	2.43
Total Pentachloro Biphenyls		161000	3.50
Total Hexachloro Biphenyls		180000	14.9
Total Heptachloro Biphenyls		75600	0.514
Total Octachloro Biphenyls		12400	0.223
Total Nonachloro Biphenyls		769	0.0462
Decachloro Biphenyl		96.1	0.0462
TOTAL PCBs		510000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.8 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 02-Sep-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-78  
 GC Column ID(s): SPB-OCTYL  
 Sample Datafile(s): PB5C\_135 S:10  
 PB5C\_146 S:6

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			240	2.43	0.0001	2.40E-02	2.40E-02
3,4,4',5-TetraCB	81		U		2.20	0.0001	1.10E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			6890	49.1	0.0001	6.89E-01	6.89E-01
2,3,4,4',5-PentaCB	114			450	2.15	0.0005	2.25E-01	2.25E-01
2,3',4,4',5-PentaCB	118			23200	44.8	0.0001	2.32E+00	2.32E+00
2',3,4,4',5-PentaCB	123			270	2.33	0.0001	2.70E-02	2.70E-02
3,3',4,4',5-PentaCB	126			29.2	2.34	0.1	2.92E+00	2.92E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	3130	2.11	0.0005	1.57E+00	1.57E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1250	1.74	0.00001	1.25E-02	1.25E-02
3,3',4,4',5,5'-HexaCB	169		U		14.9	0.01	7.44E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			226	0.324	0.0001	2.26E-02	2.26E-02
TOTAL TEQ							7.88	7.81

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

0330

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:

LDW-T4-D-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-24
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID: HR GC/MS
Time: 18:08:10	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_135 S:11
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_135 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	5.21	0.268	3.13	1.001
3 - MoCB	2		J	1.15	0.295	3.53	0.987
4 - MoCB	3		J	1.71	0.334	3.59	1.000
2,2' - DiCB	4			99.0	0.660	1.58	1.001
2,3 - DiCB	5		J	1.30	0.500	1.65	1.197
2,3' - DiCB	6			64.3	0.434	1.59	1.175
2,4 - DiCB	7		J	3.32	0.427	1.46	1.157
2,4' - DiCB	8		B	66.9	0.382	1.58	1.206
2,5 - DiCB	9			14.6	0.454	1.52	1.145
2,6 - DiCB	10			7.09	0.456	1.67	1.013
3,3' - DiCB	11		B	8.88	0.515	1.03	0.908
3,4 - DiCB	12	12 + 13	C	11.8	0.466	1.59	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.469		
4,4' - DiCB	15		B	142	0.592	1.55	1.001
2,2',3 - TriCB	16		B	39.3	0.398	1.06	1.166
2,2',4 - TriCB	17		B	249	0.400	1.05	1.139
2,2',5 - TriCB	18	18 + 30	C B	999	0.329	1.04	1.113
2,2',6 - TriCB	19			150	0.514	1.02	1.001
2,3,3' - TriCB	20	20 + 28	C B	3950	1.62	1.03	0.848

15204AD1\_1.xls, S3

Approved by: \_\_\_\_\_



QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0119

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	180	1.51	1.02	0.857
2,3,4' - TriCB	22		B	256	1.71	1.02	0.872
2,3,5 - TriCB	23		U		1.64		
2,3,6 - TriCB	24			14.8	0.278	1.07	1.159
2,3',4 - TriCB	25			499	1.34	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	1600	1.61	1.03	1.302
2,3',6 - TriCB	27			190	0.283	1.05	1.152
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	2120	1.52	1.04	0.836
2,4',6 - TriCB	32		B	550	1.63	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			22.1	1.72	1.07	1.275
3,3',4 - TriCB	35		U		1.88		
3,3',5 - TriCB	36		U		1.70		
3,4,4' - TriCB	37		B	515	1.71	1.02	1.001
3,4,5 - TriCB	38		J	4.06	1.67	0.95	0.969
3,4',5 - TriCB	39			6.32	1.68	1.08	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	781	0.475	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	252	0.437	0.80	1.312
2,2',3,5 - TeCB	43		U		0.469		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	4460	0.431	0.78	1.286
2,2',3,6 - TeCB	45	45 + 51	C	346	0.476	0.78	1.148
2,2',3,6' - TeCB	46			95.5	0.534	0.79	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	307	0.453	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	6490	0.404	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	897	0.469	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	13900	0.472	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			9.68	0.467	0.82	1.001
2,3,3',4 - TeCB	55		U		6.53		
2,3,3',4' - TeCB	56		B	427	6.66	0.79	0.905
2,3,3',5 - TeCB	57			77.2	6.39	0.80	0.844
2,3,3',5' - TeCB	58			49.6	6.39	0.72	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C	670	0.365	0.79	1.303
2,3,4,4' - TeCB	60		B	1100	6.42	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	11100	6.08	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	03			540	0.32	0.70	0.005



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	2050	0.344	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	6190	6.37	0.79	0.885
2,3',4,5 - TeCB	67			210	5.59	0.79	0.857
2,3',4,5' - TeCB	68			169	5.95	0.79	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			286	5.98	0.78	0.823
2,3',5',6 - TeCB	73		U		0.379		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			568	7.25	0.79	1.000
3,3',4,5 - TeCB	78		U		6.76		
3,3',4,6' - TeCB	79			143	5.40	0.74	0.971
3,3',5,5' - TeCB	80		U		6.19		
3,4,4',5 - TeCB	81		K	53.4	6.51	0.83	1.000
2,2',3,3',4 - PeCB	82			179	4.44	1.55	0.933
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	1260	4.45	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1800	3.51	1.58	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	9240	3.53	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	1860	3.92	1.57	1.154
2,2',3,4,6' - PeCB	89			20.6	4.47	1.58	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	4410	4.25	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	9670	3.87	1.58	1.121
2,2',3,5,6' - PeCB	94			18.4	4.12	1.64	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			59.0	0.394	1.55	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			320	3.67	1.58	1.094
2,2',4,6,6' - PeCB	104		J	3.30	0.459	1.55	1.001
2,3,3',4,4' - PeCB	105		B	10800	9.36	1.55	1.000
2,3,3',4,5 - PeCB	106		U		14.2		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	574	14.8	1.58	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			2830	14.2	1.55	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			40.2	3.17	1.62	0.945
2,3,3',5,6 - PeCB	112		U		3.06		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			815	9.47	1.55	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			221	3.07	1.58	0.958
2,3',4,5',6 - PeCB	121			11.9	3.10	1.66	1.200
2',3,3',4,5 - PeCB	122		U		15.5		
2',3,4,4',5 - PeCB	123			648	9.99	1.58	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126			55.3	11.0	1.70	1.000
3,3',4,5,5' - PeCB	127			85.5	15.6	1.51	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	6000	4.45	1.26	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130			3290	5.88	1.26	0.913
2,2',3,3',4,6 - HxCB	131			116	5.18	1.22	1.159
2,2',3,3',4,6' - HxCB	132		B	2980	5.33	1.27	1.174
2,2',3,3',5,5' - HxCB	133			1040	5.11	1.26	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C	994	5.22	1.28	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	12000	0.549	1.26	1.103
2,2',3,3',6,6' - HxCB	136		B	2270	0.437	1.26	1.023
2,2',3,4,4',5 - HxCB	137			2990	5.50	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	787	4.76	1.25	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	3960	5.15	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		5.19		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1410	0.571	1.26	1.121
2,2',3,4,6,6' - HxCB	145		U		0.441		
2,2',3,4',5,5' - HxCB	146		B	10900	4.59	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	11400	4.69	1.26	1.132
2,2',3,4',5,6' - HxCB	148			78.9	0.580	1.26	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			50.7	0.413	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			11.4	0.411	1.30	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			8.10	0.422	1.31	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	5710	4.76	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	6020	3.82	1.27	0.938
2,3,3',4,5,5' - HxCB	159			50.7	3.89	1.11	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.88		
2,3,3',4',5,5' - HxCB	162			173	3.88	1.24	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			775	3.96	1.28	0.921
2,3,3',5,5',6 - HxCB	165			35.7	4.19	1.15	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	2320	3.68	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		20.8		
2,2',3,3',4,4',5 - HpCB	170		B	12000	0.820	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3660	0.793	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			1660	0.809	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1150	0.718	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			439	0.708	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176			367	0.547	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	5080	0.781	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178		B	2700	0.742	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2160	0.533	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			108	0.726	1.03	1.157
2,2',3,4,4',5,6' - HpCB	182			110	0.699	1.04	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	10200	0.705	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184			11.5	0.511	1.10	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.551		
2,2',3,4',5,5',6 - HpCB	187		B	18300	0.643	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			34.5	0.501	1.03	1.000
2,3,3',4,4',5,5' - HpCB	189			409	1.60	1.00	1.001
2,3,3',4,4',5,6 - HpCB	190		B	2730	0.646	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			577	0.618	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.052		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	3410	1.79	0.91	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	1600	1.94	0.91	0.946
2,2',3,3',4,4',5,6' - OcCB	196		B	2000	0.213	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	259	0.151	0.90	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	2360	0.213	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	574	0.153	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	1120	0.176	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	3000	0.192	0.90	0.919
2,2',3,4,4',5,6,6' - OcCB	204		JB	1.44	0.155	0.93	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	180	1.59	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	693	0.242	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			100	0.185	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			125	0.200	0.79	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	77.1	0.0498	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL, B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-D-SS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-24 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 23-Mar-2005 Time: 1:35:43	Instrument ID: HR GC/MS
Extract Volume (µL): 400	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_152 S:7
Dilution Factor: 8	Blank Data Filename: PB5C_135 S:7
Concentration Units : ng/kq (wet weight basis)	Cal. Ver. Data Filename: PB5C_152 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD4\_1.xls, S2

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0127



COMPOUND	IUPAC NO.	CO-ELUTIONS	IAR FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	23500 /	24.0	1.57	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	30300 /	20.5	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C00				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 02-Mar-2005  
Analysis Date: 14-Mar-2005 Time: 18:08:10  
Extract Volume (µL): 50  
Injection Volume (µL): 1.0  
Dilution Factor: N/A  
Concentration Units : ng/kg (wet weight basis)

Sample Collection: 04-Aug-04  
Project No.: 04-08-06-22  
Lab Sample ID: L7311-24  
Sample Size: 10.1 g (wet)  
Initial Calibration Date: 01-Mar-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Blank Data Filename: PB5C\_135 S:7  
Cal. Ver. Data Filename: PB5C\_135 S:1  
Sample Datafile(s): PB5C\_135 S:11  
PB5C\_152 S:7

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		8.06	0.334
Total Dichloro Biphenyls		419	0.660
Total Trichloro Biphenyls		11400	1.88
Total Tetrachloro Biphenyls		51100	25.9
Total Pentachloro Biphenyls		148000	69.2
Total Hexachloro Biphenyls		211000	42.0
Total Heptachloro Biphenyls		94900	1.60
Total Octachloro Biphenyls		14500	1.94
Total Nonachloro Biphenyls		918	0.242
Decachloro Biphenyl		77.1	0.0498
TOTAL PCBs		532000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S16

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0133

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-M-M-PP-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-34 (A)
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 22:30:30	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_136 S:4
Dilution Factor: N/A	Blank Data Filename: PB5C_135 S:7
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_136 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	2.00	0.164	2.73	1.001
3 - MoCB	2		J	0.483	0.181	3.15	0.987
4 - MoCB	3		J	0.787	0.191	3.55	1.000
2,2' - DiCB	4			13.1	0.433	1.63	1.001
2,3 - DiCB	5		J	0.353	0.341	1.51	1.196
2,3' - DiCB	6			15.0	0.305	1.53	1.175
2,4 - DiCB	7		J	2.43	0.305	1.60	1.157
2,4' - DiCB	8		B	21.9	0.271	1.56	1.207
2,5 - DiCB	9			13.9	0.315	1.52	1.145
2,6 - DiCB	10		J	1.71	0.333	1.55	1.013
3,3' - DiCB	11		JB	3.15	0.350	1.52	0.968
3,4 - DiCB	12	12 + 13	C J	2.87	0.323	1.45	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.329		
4,4' - DiCB	15		B	13.6	0.397	1.54	1.000
2,2',3 - TriCB	16		B	15.3	0.198	1.07	1.166
2,2',4 - TriCB	17		B	64.2	0.201	1.06	1.138
2,2',5 - TriCB	18	18 + 30	C B	444	0.167	1.04	1.113
2,2',6 - TriCB	19			20.5	0.237	1.10	1.001
2,3,3' - TriCB	20	20 + 28	C B	2190	1.11	1.03	0.848

15204AD2\_1.xls, S2

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0138

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	126	1.06	1.03	0.856
2,3,4' - TriCB	22		B	122	1.17	1.02	0.871
2,3,5 - TriCB	23		J	1.36	1.10	0.93	1.283
2,3,6 - TriCB	24			10.4	0.152	0.97	1.158
2,3',4 - TriCB	25			297	0.949	1.02	0.824
2,3',5 - TriCB	26	26 + 29	C B	1070	1.13	1.03	1.301
2,3',6 - TriCB	27			41.6	0.142	1.05	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1600	1.08	1.04	0.837
2,4',6 - TriCB	32		B	239	1.14	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			10.0	1.18	1.02	1.273
3,3',4 - TriCB	35		U		1.21		
3,3',5 - TriCB	36		U		1.13		
3,4,4' - TriCB	37		B	61.0	1.21	1.03	1.001
3,4,5 - TriCB	38		U		1.13		
3,4',5 - TriCB	39		J	2.09	1.10	0.89	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	336	0.191	0.78	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	209	0.181	0.79	1.312
2,2',3,5 - TeCB	43		U		0.212		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	2770	0.176	0.79	1.285
2,2',3,6 - TeCB	45	45 + 51	C	124	0.195	0.78	1.147
2,2',3,6' - TeCB	46			39.2	0.222	0.80	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	191	0.185	0.78	1.273
2,2',4,5' - TeCB	49	49 + 69	C B	3670	0.167	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53	C B	297	0.191	0.78	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	9310	0.191	0.79	1.235
2,2',5,6 - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		J	3.34	0.170	0.81	1.001
2,3,3',4 - TeCB	55		U		6.84		
2,3,3',4' - TeCB	56		B	151	7.16	0.78	0.905
2,3,3',5 - TeCB	57			56.6	7.35	0.75	0.844
2,3,3',5' - TeCB	58			25.9	7.46	0.78	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	383	0.140	0.78	1.302
2,3,4,4' - TeCB	60		B	552	6.89	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	6190	6.78	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			263	6.90	0.77	0.864

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4,6 - TeCB	64		B	1070	0.138	0.79	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	2900	6.77	0.78	0.884
2,3',4,5' - TeCB	67			110	6.50	0.77	0.856
2,3',4,5' - TeCB	68			68.0	6.66	0.76	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4,5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4,6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			172	7.03	0.77	0.823
2,3',5,6 - TeCB	73		U		0.144		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			150	7.68	0.79	1.000
3,3',4,5 - TeCB	78		U		7.05		
3,3',4,5' - TeCB	79			68.4	5.82	0.81	0.970
3,3',5,5' - TeCB	80		U		6.58		
3,4,4',5 - TeCB	81		K	12.1	6.98	0.79	1.001
2,2',3,3',4 - PeCB	82			141	3.14	1.52	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	8930	2.98	1.57	0.886
2,2',3,3',6 - PeCB	84		B	872	3.22	1.57	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	806	2.46	1.58	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	4850	2.51	1.57	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	725	2.84	1.58	1.154
2,2',3,4,6' - PeCB	89			14.4	3.13	1.53	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	13500	2.59	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	2600	3.04	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	5220	2.79	1.58	1.121
2,2',3,5,6' - PeCB	94			10.5	3.04	1.59	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			24.0	0.231	1.60	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			121	2.70	1.60	1.093
2,2',4,6,6' - PeCB	104		J	0.844	0.252	1.45	1.001
2,3,3',4,4' - PeCB	105		B	3940	3.88	1.55	1.000
2,3,3',4,5 - PeCB	106		U		3.48		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C	371	3.79	1.54	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 106 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109			1070	3.45	1.53	0.998
2,3,3',4',6' - PeCB	110	110 + 115	C B	6680	2.08	1.57	0.925
2,3,3',5,5' - PeCB	111			11.5	2.17	1.62	0.945
2,3,3',5,6' - PeCB	112		U		2.11		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114			235	3.89	1.58	1.000
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		B	12700	3.68	1.55	1.000
2,3',4,4',6' - PeCB	119	00 + 07 + 97 + 100 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			77.8	2.13	1.60	0.959
2,3',4,5',6' - PeCB	121			6.34	2.25	1.64	1.200
2',3,3',4,5' - PeCB	122		U		3.82		
2',3,4,4',5' - PeCB	123		K	195	4.16	1.61	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126			17.8	4.58	1.53	1.000
3,3',4,5,5' - PeCB	127			27.6	3.87	1.42	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1530	12.8	1.27	0.958
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C B	18600	12.7	1.26	0.928
2,2',3,3',4,5' - HxCB	130			1070	16.3	1.27	0.913
2,2',3,3',4,6' - HxCB	131			61.2	15.6	1.26	1.159
2,2',3,3',4,6' - HxCB	132		B	1470	15.9	1.27	1.174
2,2',3,3',5,5' - HxCB	133			333	14.9	1.26	1.191
2,2',3,3',5,6' - HxCB	134	134 + 143	C	471	15.3	1.26	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	4410	0.284	1.27	1.104
2,2',3,3',6,6' - HxCB	136		B	743	0.222	1.27	1.024
2,2',3,4,4',5' - HxCB	137			850	14.0	1.20	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C	234	13.9	1.26	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	1970	14.5	1.26	0.903
2,2',3,4,5,6' - HxCB	142		U		14.9		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144			495	0.297	1.27	1.121
2,2',3,4,6,6' - HxCB	145		J	4.41	0.226	1.31	1.033
2,2',3,4',5,5' - HxCB	146		B	3560	13.6	1.26	0.884
2,2',3,4',5,6' - HxCB	147	147 + 149	C B	5900	14.4	1.27	1.133
2,2',3,4',5,6' - HxCB	140			36.6	0.293	1.29	1.084
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			14.0	0.217	1.27	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			5.92	0.216	1.23	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	19500	11.3	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	1.69	0.202	1.30	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	1770	13.4	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	1580	10.6	1.27	0.937
2,3,3',4,5,5' - HxCB	159			34.9	11.3	1.34	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		10.9		
2,3,3',4',5,5' - HxCB	162			55.9	11.0	1.37	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			535	11.6	1.28	0.921
2,3,3',5,5',6 - HxCB	165		U		12.0		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	709	10.4	1.25	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		12.4		
2,2',3,3',4,4',5 - HpCB	170		B	3020	0.373	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	932	0.359	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			465	0.363	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	607	0.336	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			146	0.322	1.03	1.102
2,2',3,3',4,6,6' - HpCB	176			127	0.252	1.06	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1640	0.358	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178		B	810	0.337	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	639	0.251	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	7980	0.295	1.04	0.910
2,2',3,4,4',5,6 - HpCB	181			21.8	0.329	1.02	1.156
2,2',3,4,4',5,6' - HpCB	182			49.1	0.330	1.05	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	2720	0.319	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184		J	2.92	0.239	1.03	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.258		
2,2',3,4',5,5',6 - HpCB	187		B	5230	0.302	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			7.51	0.238	1.08	1.000
2,3,3',4,4',5,5' - HpCB	189			102	0.952	1.04	1.000
2,3,3',4,4',5,6 - HpCB	190		B	617	0.280	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			168	0.280	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.290		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	917	0.586	0.91	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	344	0.621	0.89	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	555	0.0486	0.90	0.915
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	75.9	0.0486	0.89	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	972	0.0486	0.89	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	169	0.0486	0.88	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	349	0.0486	0.91	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	816	0.0486	0.90	0.919
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.479	0.0486	0.80	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	44.5	0.530	0.88	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	352	0.107	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			43.4	0.0811	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			78.8	0.0868	0.79	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	41.0	0.0486	0.71	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
Contract No.: 4033  
Matrix: TISSUE  
Sample Receipt Date: 26-Oct-2004  
Extraction Date: 02-Mar-2005  
Analysis Date: 14-Mar-2005 Time: 22:30:30  
Extract Volume (µL): 50  
Injection Volume (µL): 1.0  
Dilution Factor: N/A  
Concentration Unite : ng/kg (wet weight basic)

Sample Collection: 03-Aug-04  
Project No.: 04-08-06-22  
Lab Sample ID: L7311-34 (A)  
Sample Size: 10.3 g (wet)  
Initial Calibration Date: 01-Mar-2005  
Instrument ID: HR GC/MS  
GC Column ID: SPB-OCTYL  
Blank Data Filename: PB5C\_135 S:7  
Cal. Ver. Data Filename: PB5C\_136 S:1  
Sample Datafile(s): PB5C\_136 S:4

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		3.27	0.191
Total Dichloro Biphenyls		88.0	0.433
Total Trichloro Biphenyls		6310	1.21
Total Tetrachloro Biphenyls		29100	7.68
Total Pentachloro Biphenyls		62900	4.58
Total Hexachloro Biphenyls		65900	16.3
Total Heptachloro Biphenyls		25300	0.952
Total Octachloro Biphenyls		4240	0.621
Total Nonachloro Biphenyls		474	0.107
Decachloro Biphenyl		41.0	0.0486
TOTAL PCBs		194000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S5

Approved by:  QA/QC Chemist

26-04-2005  
da-mm-yyyy

014

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.3 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 03-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-34 (A)  
 GC Column ID(s): SPB-OCTYL  
 Sample Datafile(s): PB5C\_136 S:4

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			150	7.68	0.0001	1.50E-02	1.50E-02
3,4,4',5-TetraCB	81		U		6.98	0.0001	3.49E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			3940	3.88	0.0001	3.94E-01	3.94E-01
2,3,4,4',5-PentaCB	114			235	3.89	0.0005	1.18E-01	1.18E-01
2,3',4,4',5-PentaCB	118			12700	3.68	0.0001	1.27E+00	1.27E+00
2',3,4,4',5-PentaCB	123		U		4.16	0.0001	2.08E-04	0.00E+00
3,3',4,4',5-PentaCB	126			17.8	4.58	0.1	1.78E+00	1.78E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1770	13.4	0.0005	8.83E-01	8.83E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			709	10.4	0.00001	7.09E-03	7.09E-03
3,3',4,4',5,5'-HexaCB	169		U		12.4	0.01	6.22E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	169			102	0.952	0.0001	1.02E-02	1.02E-02
TOTAL TEQ							4.54	4.48

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-M-M-PP-FL-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	WG15204-103 (DUP L7311-34)
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005	Instrument ID:	HR GC/MS
Time: 23:34:44	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename:	PB5C_136 S:5
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.67	0.119	3.06	1.000
3 - MoCB	2		J	0.425	0.130	2.77	0.988
4 - MoCB	3		J	0.747	0.137	2.91	1.000
2,2' - DiCB	4			12.7	0.342	1.56	1.001
2,3 - DiCB	5		J	0.451	0.281	1.70	1.197
2,3' - DiCB	6			14.2	0.251	1.60	1.176
2,4 - DiCB	7		J	2.06	0.251	1.46	1.158
2,4' - DiCB	8		B	21.7	0.223	1.60	1.207
2,5 - DiCB	9			13.8	0.259	1.52	1.145
2,6 - DiCB	10		J	1.73	0.274	1.50	1.014
3,3' - DiCB	11		JB	2.98	0.288	1.34	0.968
3,4 - DiCB	12	12 + 13	C J	2.99	0.266	1.41	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.271		
4,4' - DiCB	15		B	13.6	0.335	1.42	1.000
2,2',3 - TriCB	16		B	14.4	0.149	1.03	1.166
2,2',4 - TriCB	17		B	62.7	0.151	1.04	1.139
2,2',6 - TriCB	18	18 + 30	C B	441	0.126	1.05	1.113
2,2',6 - TriCB	19			20.7	0.175	1.07	1.001
2,3,3' - TriCB	20	20 + 28	C B	2100	1.04	1.04	0.848

15204AD2\_1.xls, S3

Approved by:  QA/QC Chemist

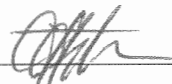
25-04-2005  
 dd-mm-yyyy

0144

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	113	0.991	1.03	0.857
2,3,4' - TriCB	22		B	124	1.10	1.03	0.871
2,3,5 - TriCB	23		J	1.51	1.03	1.13	1.282
2,3,6 - TriCB	24			10.2	0.114	1.07	1.158
2,3',4 - TriCB	25			292	0.889	1.04	0.825
2,3',5 - TriCB	26	26 + 29	C B	1020	1.06	1.04	1.301
2,3',6 - TriCB	27			40.7	0.107	1.03	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1530	1.01	1.05	0.836
2,4',6 - TriCB	32		B	231	1.07	1.04	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			9.53	1.11	1.04	1.273
3,3',4 - TriCB	35		U		1.13		
3,3',5 - TriCB	36		U		1.05		
3,4,4' - TriCB	37		B	60.1	1.13	1.03	1.001
3,4,5 - TriCB	38		U		1.06		
3,4',5 - TriCB	39		J	1.81	1.03	0.90	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	322	0.176	0.79	1.339
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	193	0.167	0.79	1.312
2,2',3,5 - TeCB	43		U		0.195		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	2560	0.162	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	120	0.180	0.78	1.148
2,2',3,6' - TeCB	46			38.5	0.205	0.79	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	173	0.171	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C B	3450	0.154	0.79	1.261
2,2',4,6 - TeCB	50	50 + 53	C B	290	0.176	0.78	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	8790	0.176	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		J	3.51	0.160	0.80	1.001
2,3,3',4 - TeCB	55		U		9.63		
2,3,3',4' - TeCB	56		B	155	10.1	0.78	0.904
2,3,3',5 - TeCB	57			61.9	10.3	0.75	0.844
2,3,3',5' - TeCB	58			34.1	10.5	0.81	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	364	0.138	0.78	1.303
2,3,4,4' - TeCB	60		B	545	9.70	0.78	0.910
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	5870	9.55	0.78	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			251	9.72	0.77	0.864

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		B	1020	0.127	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	2760	9.52	0.78	0.884
2,3',4,5 - TeCB	67			111	9.15	0.77	0.856
2,3',4,5' - TeCB	68			62.9	9.38	0.73	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			158	9.90	0.77	0.822
2,3',5,6 - TeCB	73		U		0.132		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			133	10.6	0.77	1.000
3,3',4,5 - TeCB	78		U		9.92		
3,3',4,5' - TeCB	79			67.8	8.19	0.73	0.970
3,3',5,5' - TeCB	80		U		9.26		
3,4,4',5 - TeCB	81		K	10.2	9.89	0.78	1.000
2,2',3,3',4 - PeCB	82			126	3.03	1.56	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	8810	2.87	1.57	0.886
2,2',3,3',6 - PeCB	84		B	868	3.10	1.59	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	811	2.37	1.57	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	4870	2.42	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	715	2.73	1.57	1.155
2,2',3,4,6' - PeCB	89			14.4	3.01	1.66	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	13200	2.49	1.58	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	2540	2.93	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	5130	2.69	1.58	1.121
2,2',3,5,6' - PeCB	94			11.8	2.92	1.53	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			24.0	0.178	1.61	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			119	2.60	1.57	1.094
2,2',4,6,6' - PeCB	104		J	1.01	0.207	1.60	1.001
2,3,3',4,4' - PeCB	105		B	3890	4.46	1.54	1.000
2,3,3',4,5 - PeCB	106		U		3.88		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	375	4.23	1.55	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			1060	3.85	1.56	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C B	6700	2.00	1.57	0.925
2,3,3',5,5' - PeCB	111			15.4	2.09	1.78	0.945
2,3,3',5,6 - PeCB	112		U		2.03		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			287	4.33	1.54	1.001
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		B	12800	3.97	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			83.2	2.05	1.68	0.958
2,3',4,5',6 - PeCB	121			5.84	2.17	1.46	1.201
2',3,3',4,5 - PeCB	122			92.7	4.26	1.55	1.010
2',3,4,4',5 - PeCB	123		K	223	4.47	1.54	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126			23.4	4.98	1.54	1.000
3,3',4,5,5' - PeCB	127			28.4	4.32	1.54	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1520	8.04	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C B	17600	7.99	1.26	0.928
2,2',3,3',4,5' - HxCB	130			1050	10.3	1.27	0.913
2,2',3,3',4,6 - HxCB	131			63.5	9.81	1.24	1.159
2,2',3,3',4,6' - HxCB	132		B	1520	9.99	1.26	1.174
2,2',3,3',5,5' - HxCB	133			336	9.38	1.26	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C	474	9.61	1.26	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	4330	0.256	1.28	1.103
2,2',3,3',6,6' - HxCB	136		B	750	0.200	1.27	1.023
2,2',3,4,4',5 - HxCB	137			778	9.30	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	228	8.76	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	1790	9.13	1.27	0.903
2,2',3,4,5,6 - HxCB	142		U		9.41		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			472	0.268	1.29	1.121
2,2',3,4,6,6' - HxCB	145		J	3.81	0.203	1.23	1.033
2,2',3,4',5,5' - HxCB	146		B	3430	8.56	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	5800	9.07	1.26	1.132
2,2',3,4',5,6' - HxCB	148			36.7	0.265	1.25	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			13.7	0.196	1.22	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			5.74	0.194	1.19	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	18600	7.13	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	1.70	0.193	1.20	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	1720	8.39	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	1520	6.67	1.26	0.938
2,3,3',4,5,5' - HxCB	159			28.2	7.09	1.22	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		6.83		
2,3,3',4',5,5' - HxCB	162			50.6	6.92	1.26	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			529	7.30	1.27	0.921
2,3,3',5,5',6 - HxCB	165			11.4	7.56	1.32	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	678	6.48	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		8.39		
2,2',3,3',4,4',5 - HpCB	170		B	2980	0.287	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	918	0.277	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			446	0.279	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	613	0.259	1.04	1.133
2,2',3,3',4,5',6 - HpCB	175			138	0.248	1.03	1.103
2,2',3,3',4,6,6' - HpCB	176			122	0.194	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1580	0.276	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178		B	798	0.259	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	651	0.193	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	7720	0.227	1.04	0.910
2,2',3,4,4',5,6 - HpCB	181			21.4	0.253	1.02	1.157
2,2',3,4,4',5,6' - HpCB	182			36.2	0.254	1.03	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	2620	0.246	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184		J	2.34	0.184	1.13	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.199		
2,2',3,4',5,5',6 - HpCB	187		B	5070	0.233	1.04	1.110
2,2',3,4',5,6,6' - HpCB	188			7.28	0.184	0.98	1.000
2,3,3',4,4',5,5' - HpCB	189			101	0.676	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	612	0.216	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191			155	0.216	1.02	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.223		



0155





COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	932	0.487	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	338	0.516	0.91	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	551	0.0562	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	73.8	0.0491	0.89	1.045
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	988	0.0566	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	165	0.0491	0.91	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	349	0.0491	0.89	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	815	0.0515	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.325	0.0491	0.91	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	44.3	0.437	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	365	0.117	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			44.6	0.0901	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			84.8	0.0978	0.78	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	42.0	0.0491	0.68	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Aug-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	WG15204-103 (DUP L7311-34)
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 14-Mar-2005 Time: 23:34:44	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_136 S:5

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		2.85	0.137
Total Dichloro Biphenyls		86.2	0.342
Total Trichloro Biphenyls		6080	1.13
Total Tetrachloro Biphenyls		27500	10.6
Total Pentachloro Biphenyls		62500	4.98
Total Hexachloro Biphenyls		63300	10.3
Total Heptachloro Biphenyls		24600	0.676
Total Octachloro Biphenyls		4260	0.516
Total Nonachloro Biphenyls		495	0.117
Decachloro Biphenyl		42.0	0.0491
TOTAL PCBs		189000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

CLIENT ID:  
 LDW-M-M-PP-FL-comp-1  
 (DUPLICATE)

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: WG15204-103  
 (DUP L7311-34)

Sample Size: 10.2 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s): PB5C\_136 S:5

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			133	10.6	0.0001	1.33E-02	1.33E-02
3,4,4',5-TetraCB	81		U		9.89	0.0001	4.95E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			3890	4.46	0.0001	3.89E-01	3.89E-01
2,3,4,4',5-PentaCB	114			287	4.33	0.0005	1.44E-01	1.44E-01
2,3',4,4',5-PentaCB	118			12800	3.97	0.0001	1.28E+00	1.28E+00
2',3,4,4',5-PentaCB	123		U		4.47	0.0001	2.24E-04	0.00E+00
3,3',4,4',5-PentaCB	126			23.4	4.98	0.1	2.34E+00	2.34E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1720	8.39	0.0005	8.62E-01	8.62E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			678	6.48	0.00001	6.78E-03	6.78E-03
3,3',4,4',5,5'-HexaCB	169		U		8.39	0.01	4.19E-02	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			101	0.676	0.0001	1.01E-02	1.01E-02
TOTAL TEQ							5.08	5.04

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTEQ\_1.xls, S3 (TEQ) Approved by:  QA/QC Chemist 26-04-2005 dd-mm-yyyy

0158

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-M-M-SP-FL-comp-1

<b>Lab Name:</b> AXYS ANALYTICAL SERVICES	<b>Sample Collection:</b> 04-Aug-2004
<b>Contract No.:</b> 4033	<b>Project No.:</b> 04-08-06-22
<b>Matrix:</b> TISSUE	<b>Lab Sample ID:</b> L7311-35
<b>Sample Receipt Date:</b> 26-Oct-2004	<b>Sample Size:</b> 10.1 g (wet)
<b>Extraction Date:</b> 02-Mar-2005	<b>Initial Calibration Date:</b> 01-Mar-2005
<b>Analysis Date:</b> 15-Mar-2005	<b>Instrument ID:</b> HR GC/MS
<b>Time:</b> 0:39:00	<b>GC Column ID:</b> SPB-OCTYL
<b>Extract Volume (µL):</b> 50	<b>Sample Data Filename:</b> PB5C_136 S:6
<b>Injection Volume (µL):</b> 1.0	<b>Blank Data Filename:</b> PB5C_135 S:7
<b>Dilution Factor:</b> N/A	<b>Cal. Ver. Data Filename:</b> PB5C_136 S:1
<b>Concentration Units :</b> ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.94	0.184	3.22	1.000
3 - MoCB	2		J	0.525	0.202	2.72	0.988
4 - MoCB	3		J	0.787	0.213	3.47	1.001
2,2' - DiCB	4			17.9	0.410	1.47	1.001
2,3 - DiCB	5		J	0.691	0.290	1.58	1.198
2,3' - DiCB	6			19.1	0.260	1.55	1.176
2,4 - DiCB	7		J	2.01	0.260	1.60	1.158
2,4' - DiCB	8		B	22.7	0.230	1.55	1.207
2,5 - DiCB	9			7.78	0.268	1.56	1.146
2,6 - DiCB	10		J	2.51	0.284	1.53	1.014
3,3' - DiCB	11		JB	4.20	0.298	1.77	0.968
3,4 - DiCB	12	12 + 13	C J	4.50	0.275	1.76	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.280		
4,4' - DiCB	15		B	16.9	0.320	1.64	1.001
2,2',3 - TriCB	16		B	18.4	0.138	1.03	1.165
2,2',4 - TriCB	17		B	95.0	0.140	1.05	1.138
2,2',5 - TriCB	18	10 + 30	C D	406	0.116	1.04	1.113
2,2',6 - TriCB	19			30.0	0.184	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C B	2850	0.774	1.04	0.848

15204AD2\_1.xls, S4

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0160

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	131	0.737	1.04	0.857
2,3,4' - TriCB	22		B	186	0.815	1.05	0.872
2,3,5 - TriCB	23		J	1.44	0.764	1.02	1.282
2,3,6 - TriCB	24			9.26	0.106	1.10	1.158
2,3',4 - TriCB	25			405	0.661	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	1120	0.785	1.04	1.301
2,3',6 - TriCB	27			46.7	0.0987	1.05	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1820	0.753	1.04	0.837
2,4',6 - TriCB	32		B	296	0.797	1.02	1.196
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			12.1	0.823	1.01	1.273
3,3',4 - TriCB	35		U		0.844		
3,3',5 - TriCB	36		U		0.784		
3,4,4' - TriCB	37		B	129	0.797	1.04	1.002
3,4,5 - TriCB	38		J	1.64	0.787	1.00	0.969
3,4',5 - TriCB	39		J	4.49	0.764	1.08	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	517	0.189	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	293	0.179	0.79	1.312
2,2',3,5 - TeCB	43		U		0.209		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	3390	0.174	0.79	1.287
2,2',3,6 - TeCB	45	45 + 51	C	203	0.193	0.79	1.148
2,2',3,6' - TeCB	46			32.6	0.220	0.80	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	247	0.183	0.78	1.275
2,2',4,5' - TeCB	49	49 + 69	C B	5410	0.165	0.79	1.261
2,2',4,6 - TeCB	50	50 + 53	C B	325	0.189	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	13600	0.189	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			5.25	0.185	0.78	1.001
2,3,3',4 - TeCB	55		U		4.95		
2,3,3',4' - TeCB	56		B	332	5.18	0.78	0.904
2,3,3',5 - TeCB	57			111	5.32	0.75	0.844
2,3,3',5' - TeCB	58			50.7	5.40	0.79	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	511	0.148	0.78	1.303
2,3,4,4' - TeCB	60		B	932	4.99	0.78	0.910
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	9710	4.91	0.77	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			400	5.00	0.77	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	1820	0.136	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	6150	4.90	0.78	0.884
2,3',4,5 - TeCB	67			148	4.71	0.75	0.856
2,3',4,5' - TeCB	68			215	4.82	0.76	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			367	5.09	0.76	0.822
2,3',5',6 - TeCB	73		U		0.142		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			193	5.40	0.78	1.000
3,3',4,5 - TeCB	78		U		5.10		
3,3',4,5' - TeCB	79			139	4.21	0.73	0.970
3,3',5,5' - TeCB	80		U		4.76		
3,4,4',5 - TeCB	81		K	25.3	4.91	0.85	1.000
2,2',3,3',4 - PeCB	82			193	4.87	1.53	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	921	4.99	1.59	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1850	3.82	1.58	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	7510	3.89	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2070	4.40	1.58	1.155
2,2',3,4,6' - PeCB	89			13.7	4.85	1.66	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	5420	4.71	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	8300	4.33	1.58	1.121
2,2',3,5,6' - PeCB	94			11.6	4.71	1.59	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			26.7	0.184	1.64	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			121	4.19	1.58	1.094
2,2',4,6,6' - PeCB	104		J	2.00	0.216	1.50	1.001
2,3,3',4,4' - PeCB	105		B	8730	7.27	1.55	1.000
2,3,3',4,5 - PeCB	106		U		6.35		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	605	6.91	1.53	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			2220	6.29	1.55	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			37.6	3.37	1.59	0.945
2,3,3',5,6 - PeCB	112		U		3.27		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			545	7.25	1.52	1.001
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			209	3.30	1.59	0.958
2,3',4,5',6 - PeCB	121			16.8	3.50	1.73	1.201
2',3,3',4,5 - PeCB	122			127	6.96	1.49	1.010
2',3,4,4',5 - PeCB	123			489	7.41	1.56	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126			50.4	8.33	1.54	1.000
3,3',4,5,5' - PeCB	127			57.8	7.06	1.61	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4330	11.2	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130			2370	14.3	1.26	0.913
2,2',3,3',4,6 - HxCB	131			77.8	13.6	1.26	1.159
2,2',3,3',4,6' - HxCB	132		B	3630	13.9	1.27	1.174
2,2',3,3',5,5' - HxCB	133			904	13.0	1.26	1.190
2,2',3,3',5,6 - HxCB	134	134 + 143	C	834	13.3	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	10700	0.246	1.27	1.104
2,2',3,3',6,6' - HxCB	136		B	1420	0.193	1.27	1.023
2,2',3,4,4',5 - HxCB	137			1880	12.9	1.25	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	660	12.2	1.26	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	4830	12.7	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		13.1		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			091	0.250	1.26	1.121
2,2',3,4,6,6' - HxCB	145			5.80	0.196	1.29	1.033
2,2',3,4',5,5' - HxCB	146		B	8770	11.9	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	17100	12.6	1.26	1.132
2,2',3,4',5,6' - HxCB	148			136	0.254	1.30	1.083
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			36.4	0.188	1.25	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			10.3	0.187	1.28	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			5.20	0.179	1.29	1.000
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	3990	11.6	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	4810	9.27	1.26	0.938
2,3,3',4,5,5' - HxCB	159			114	9.86	1.26	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		9.50		
2,3,3',4',5,5' - HxCB	162			116	9.61	1.25	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			1950	10.1	1.27	0.921
2,3,3',5,5',6 - HxCB	165			31.0	10.5	1.26	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1500	9.14	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		U		28.0		
2,2',3,3',4,4',5 - HpCB	170		B	9650	0.596	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	3000	0.575	1.04	1.163
2,2',3,3',4,5,5' - HpCB	172			1430	0.580	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	2650	0.537	1.05	1.134
2,2',3,3',4,5',6 - HpCB	175			443	0.515	1.04	1.103
2,2',3,3',4,6,6' - HpCB	176			379	0.402	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	5380	0.573	1.05	1.146
2,2',3,3',5,5',6 - HpCB	178		B	2350	0.539	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2260	0.401	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			61.2	0.526	1.05	1.157
2,2',3,4,4',5,6' - HpCB	182			111	0.527	1.07	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	7930	0.511	1.03	1.127
2,2',3,4,4',6,6' - HpCB	184			6.55	0.382	1.10	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.413		
2,2',3,4',5,5',6 - HpCB	187		B	15800	0.484	1.04	1.110
2,2',3,4',5,6,6' - HpCB	188			21.6	0.377	1.06	1.001
2,3,3',4,4',5,5' - HpCB	189			291	1.26	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2150	0.448	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			491	0.448	1.05	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.463		





Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-M-M-SP-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 23-Mar-2005

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 8

Concentration Units : ng/kg (wet weight basis)

Time: 2:39:59

Sample Collection: 04-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-35 W

Sample Size: 10.1 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_152 S:8

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_152 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD4\_1.xls, S3

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0168

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 76					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	21400	77.4	1.58	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	23600	66.3	1.58	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.1 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 04-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-35  
 GC Column ID(s): SPB-OCTYL DB-1  
 Sample Datafile(s): PB5C\_136 S:6  
 PB5C\_152 S:8

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			193	5.40	0.0001	1.93E-02	1.93E-02
3,4,4',5-TetraCB	81		U		4.91	0.0001	2.46E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			8/30	7.27	0.0001	8.73E-01	8.73E-01
2,3,4,4',5-PentaCB	114			545	7.25	0.0005	2.72E-01	2.72E-01
2,3',4,4',5-PentaCB	118			28300	166	0.0001	2.83E+00	2.83E+00
2',3,4,4',5-PentaCB	123			489	7.41	0.0001	4.89E-02	4.89E-02
3,3',4,4',5-PentaCB	126			50.4	8.33	0.1	5.04E+00	5.04E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	3990	11.6	0.0005	2.00E+00	2.00E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1500	9.14	0.00001	1.50E-02	1.50E-02
3,3',4,4',5,5'-HexaCB	169		U		28.0	0.01	1.40E-01	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			291	1.20	0.0001	2.91E-02	2.91E-02
<b>TOTAL TEQ</b>							11.3	11.1

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-44
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 1:43:16	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_136 S:7
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	7.19	0.196	3.18	1.001
3 - MoCB	2		J	1.01	0.213	2.73	0.987
4 - MoCB	3		J	1.25	0.223	2.83	1.000
2,2' - DiCB	4			124	1.36	1.55	1.001
2,3 - DiCB	5		J	2.50	0.864	1.36	1.197
2,3' - DiCB	6			83.9	0.773	1.52	1.176
2,4 - DiCB	7		J	4.85	0.773	1.55	1.158
2,4' - DiCB	8		B	166	0.685	1.52	1.207
2,5 - DiCB	9			13.2	0.797	1.53	1.146
2,6 - DiCB	10			5.50	0.844	1.63	1.013
3,3' - DiCB	11		JB	2.15	0.886	1.78	0.968
3,4 - DiCB	12	12 + 13	C J	4.32	0.819	1.45	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.833		
4,4' - DiCB	15		B	30.7	0.911	1.54	0.999
2,2',3 - TriCB	16		B	230	0.134	1.03	1.165
2,2',4 - TriCB	17		B	504	0.135	1.04	1.138
2,2',5 - TriCB	18	18 + 30	C B	1080	0.112	1.06	1.113
2,2',6 - TriCB	19			148	0.217	1.06	1.001
2,3,3' - TriCB	20	20 + 28	C B	4330	1.59	1.04	0.848

15204AD2\_1.xls, S5

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0179

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	678	1.51	1.01	0.857
2,3,4' - TriCB	22		B	412	1.67	1.00	0.871
2,3,5 - TriCB	23		J	3.09	1.57	1.08	1.282
2,3,6 - TriCB	24			26.0	0.103	1.17	1.158
2,3',4 - TriCB	25			150	1.36	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	848	1.61	1.04	1.301
2,3',6 - TriCB	27			166	0.0958	1.03	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1940	1.55	1.03	0.836
2,4',6 - TriCB	32		B	447	1.64	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			15.9	1.69	1.02	1.273
3,3',4 - TriCB	35		U		1.73		
3,3',5 - TriCB	36		U		1.61		
3,4,4' - TriCB	37		B	121	1.54	1.02	1.002
3,4,5 - TriCB	38		J	3.89	1.62	1.16	0.968
3,4',5 - TriCB	39			17.8	1.57	0.98	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1790	0.198	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	1280	0.187	0.79	1.313
2,2',3,5 - TeCB	43			286	0.219	0.77	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	7160	0.182	0.79	1.287
2,2',3,6 - TeCB	45	45 + 51	C	457	0.202	0.79	1.148
2,2',3,6' - TeCB	46			173	0.230	0.78	1.162
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	750	0.192	0.79	1.275
2,2',4,5' - TeCB	49	49 + 69	C B	6510	0.173	0.79	1.261
2,2',4,6 - TeCB	50	50 + 53	C B	683	0.198	0.79	1.112
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	13600	0.198	0.79	1.230
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			9.54	0.244	0.78	1.001
2,3,3',4 - TeCB	55		U		6.10		
2,3,3',4' - TeCB	56		B	739	6.39	0.78	0.904
2,3,3',5 - TeCB	57			52.7	6.56	0.71	0.844
2,3,3',5' - TeCB	58			28.9	6.66	0.72	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	749	0.155	0.78	1.303
2,3,4,4' - TeCB	60		B	1900	6.15	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	10400	6.05	0.77	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			509	0.10	0.77	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		B	2680	0.143	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	8810	6.03	0.77	0.884
2,3',4,5 - TeCB	67			91.1	5.80	0.74	0.856
2,3',4,5' - TeCB	68			35.4	5.94	0.78	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			225	6.27	0.77	0.823
2,3',5',6 - TeCB	73		U		0.149		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			275	6.23	0.83	1.000
3,3',4,5 - TeCB	78		U		6.29		
3,3',4,5' - TeCB	79			159	5.19	0.74	0.970
3,3',5,5' - TeCB	80		U		5.87		
3,4,4',5 - TeCB	81		K	16.4	5.69	0.74	1.001
2,2',3,3',4 - PeCB	82			1100	4.12	1.61	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	2370	4.22	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	3790	3.23	1.56	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C E				
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2200	3.73	1.58	1.154
2,2',3,4,6' - PeCB	89			57.0	4.11	1.56	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	5620	3.99	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C E				
2,2',3,5,6' - PeCB	94			42.6	3.99	1.55	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			55.9	0.122	1.58	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			315	3.55	1.57	1.093
2,2',4,6,6' - PeCB	104		J	2.91	0.160	1.40	1.001
2,3,3',4,4' - PeCB	105		B	8380	4.97	1.54	1.001
2,3,3',4,5 - PeCB	106		U		4.61		

COMPOUND	HPAC NO.	CO-ELUTIONS	I AB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	472	5.01	1.53	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			2250	4.57	1.51	0.998
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			37.6	2.85	1.77	0.945
2,3,3',5,6 - PeCB	112		U		2.77		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			576	5.16	1.54	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			159	2.79	1.64	0.958
2,3',4,5',6 - PeCB	121			14.7	2.96	1.56	1.200
2',3,3',4,5 - PeCB	122		U		5.05		
2',3,4,4',5 - PeCB	123		K	308	5.25	1.75	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			55.9	5.13	1.53	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4440	8.47	1.26	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130			2640	10.8	1.27	0.913
2,2',3,3',4,6 - HxCB	131			213	10.3	1.29	1.159
2,2',3,3',4,6' - HxCB	132		B	5640	10.5	1.27	1.174
2,2',3,3',5,5' - HxCB	133			1010	9.88	1.26	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	1160	10.1	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	12200	0.186	1.26	1.103
2,2',3,3',6,6' - HxCB	136		B	2090	0.146	1.28	1.023
2,2',3,4,4',5 - HxCB	137			1670	9.79	1.28	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	588	9.22	1.27	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	5070	9.61	1.27	0.903
2,2',3,4,5,6 - HxCB	142		U		9.90		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1320	0.106	1.27	1.121
2,2',3,4,6,6' - HxCB	145		J	4.40	0.148	1.41	1.033
2,2',3,4',5,5' - HxCB	146		B	8950	9.01	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	20600	9.55	1.27	1.133
2,2',3,4',5,6' - HxCB	148			88.4	0.192	1.30	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			57.1	0.142	1.28	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			10.9	0.141	1.26	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			5.48	0.150	1.30	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	4540	8.61	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3450	7.03	1.27	0.938
2,3,3',4,5,5' - HxCB	159			158	7.47	1.23	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		7.20		
2,3,3',4',5,5' - HxCB	162			138	7.28	1.30	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			1720	7.69	1.27	0.921
2,3,3',5,5',6 - HxCB	165			39.0	7.96	1.29	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1590	6.80	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	8980	0.746	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	2610	0.720	1.04	1.163
2,2',3,3',4,5,5' - HpCB	172			1580	0.726	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	3550	0.672	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			364	0.645	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			604	0.504	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	5800	0.718	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	2840	0.674	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2360	0.502	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			58.4	0.659	1.07	1.156
2,2',3,4,4',5,6' - HpCB	182			88.8	0.660	1.06	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	7370	0.639	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184			6.11	0.478	0.98	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.517		
2,2',3,4',5,5',6 - HpCB	187		E				
2,2',3,4',5,6,6' - HpCB	188			20.4	0.467	1.04	1.000
2,3,3',4,4',5,5' - HpCB	189			303	0.922	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2120	0.561	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191			454	0.562	1.05	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.580		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	2350	0.579	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	1000	0.613	0.90	0.946
2,2',3,3',4,4',5,6' - OcCB	196		B	1430	0.0508	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	257	0.0498	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	2920	0.0511	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	348	0.0498	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	940	0.0498	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	2140	0.0498	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.642	0.0498	0.84	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	124	0.521	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	466	0.0919	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			55.1	0.0703	0.78	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			130	0.0758	0.77	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	55.7	0.0498	0.70	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-44 W
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 23-Mar-2005	Instrument ID: HR GC/MS
Time: 3:44:18	GC Column ID: SPB-OCTYL
Extract Volume (µL): 400	Sample Data Filename: PB5C_152 S:9
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: 8	Cal. Ver. Data Filename: PB5C_152 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD4\_1.xls, S4

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0187

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	17700	30.1	1.57	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C D B	11500	25.3	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	25500	25.8	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C D B	13000	27.7	1.57	1.121
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109						
2,3,3',4',6' - PeCB	110	110 + 115	C D B	18400	21.7	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6' - PeCB	112						
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114						
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117					
2,3,4',5,6' - PeCB	117	85 + 116 + 117					
2,3',4,4',5' - PeCB	118		D B	27300	125	1.56	1.000
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120						
2,3',4,5',6' - PeCB	121						
2',3,3',4,5' - PeCB	122						
2',3,4,4',5' - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C D B	48600	78.0	1.27	0.928
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6' - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6' - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5' - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6' - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6' - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6' - HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6' - HxCB	149	147 + 149					



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	50200	70.3	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	128 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	24300	1.17	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187		D B	15500	1.17	1.04	1.110
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2'.3.3'.4.4'.6.6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2'.3.3'.4.5.5'.6.6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-44 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005	Instrument ID: HR GC/MS
Time: 16:06:34	GC Column ID: DB-1
Extract Volume (µL): 50	Sample Datafile: DT53_097 S: 13
Injection Volume (µL): 2.0	Blank Data Filename: DT53_096 S: 5
Dilution Factor: N/A	Cal. Ver. Data Filename: DT53_097 S: 1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			46.2	0.540	1.50	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3'.4.4'.5.5' - HxCB	169			2.07	0.420	1.16	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; R = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-04
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-44
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 1:43:16	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_136 S:7 PB5C_152 S:9 DT53_097 S: 13

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		9.45	0.223
Total Dichloro Biphenyls		437	1.36
Total Trichloro Biphenyls		11100	1.73
Total Tetrachloro Biphenyls		59500	6.66
Total Pentachloro Biphenyls		141000	5.25
Total Hexachloro Biphenyls		178000	10.8
Total Heptachloro Biphenyls		78900	0.922
Total Octachloro Biphenyls		11500	0.613
Total Nonachloro Biphenyls		651	0.0919
Decachloro Biphenyl		55.7	0.0498
TOTAL PCBs		481000	

(1) U = Not detected  
 (2) All header information pertains to the initial instrumental analysis of the sample extract.  
 Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-44

Sample Size: 10.1 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s):  
 DB-1  
 PB5C\_136 S:7  
 PB5C\_152 S:9  
 DT53\_097 S:13

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			275	6.23	0.0001	2.75E-02	2.75E-02
3,4,4',5-TetraCB	81		U		5.69	0.0001	2.85E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			8380	4.97	0.0001	8.38E-01	8.38E-01
2,3,4,4',5-PentaCB	114			576	5.16	0.0005	2.88E-01	2.88E-01
2,3',4,4',5-PentaCB	118			27300	125	0.0001	2.73E+00	2.73E+00
2',3,4,4',5-PentaCB	123		U		5.25	0.0001	2.63E-04	0.00E+00
3,3',4,4',5-PentaCB	126			46.2	0.540	0.1	4.62E+00	4.62E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	4540	8.61	0.0005	2.27E+00	2.27E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1590	6.80	0.00001	1.59E-02	1.59E-02
3,3',4,4',5,5'-HexaCB	169			2.07	0.420	0.01	2.07E-02	2.07E-02
2,3,3',4,4',5,5'-HeptaCB	189			303	0.922	0.0001	3.03E-02	3.03E-02
<b>TOTAL TEQ</b>							<b>10.8</b>	<b>10.8</b>

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-56
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 2:47:33	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_136 S:8
Dilution Factor: N/A	Blank Data Filename: PB5C_135 S:7
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_136 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	2.19	0.176	3.22	1.001
3 - MoCB	2		J	0.488	0.188	2.72	0.988
4 - MoCB	3		KJ	0.538	0.194	3.89	1.000
2,2' - DiCB	4			41.8	0.683	1.53	1.000
2,3 - DiCB	5		J	1.37	0.523	1.47	1.197
2,3' - DiCB	6			38.6	0.468	1.54	1.175
2,4 - DiCB	7		J	2.21	0.468	1.56	1.157
2,4' - DiCB	8		B	62.1	0.415	1.55	1.206
2,5 - DiCB	9			5.24	0.482	1.57	1.145
2,6 - DiCB	10		J	2.58	0.511	1.68	1.013
3,3' - DiCB	11		JB	1.28	0.536	1.77	0.967
3,4 - DiCB	12	12 + 13	C J	2.77	0.496	1.78	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.504		
4,4' - DiCB	15		B	8.27	0.600	1.58	0.998
2,2',3 - TriCB	16		B	105	0.174	1.03	1.166
2,2',4 - TriCB	17		B	301	0.176	1.05	1.138
2,2',5 - TriCB	18	18 + 30	C B	634	0.146	1.05	1.113
2,2',6 - TriCB	19			61.4	0.221	1.06	1.001
2,3,3' - TriCB	20	20 + 28	C B	1920	0.658	1.04	0.848

15204AD2\_1.xls, S6

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0200

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	206	0.626	1.06	0.857
2,3,4' - TriCB	22		B	165	0.693	1.02	0.872
2,3,5 - TriCB	23		J	1.58	0.649	1.05	1.283
2,3,6 - TriCB	24			11.9	0.134	0.99	1.158
2,3',4 - TriCB	25			100	0.562	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	629	0.667	1.03	1.301
2,3',6 - TriCB	27			114	0.125	1.06	1.151
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	635	0.640	1.04	0.836
2,4',6 - TriCB	32		B	264	0.677	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			10.8	0.700	1.09	1.275
3,3',4 - TriCB	35		U		0.717		
3,3',5 - TriCB	36		U		0.666		
3,4,4' - TriCB	37		B	35.1	0.693	1.00	1.002
3,4,5 - TriCB	38		J	2.39	0.668	1.11	0.969
3,4',5 - TriCB	39			6.93	0.649	0.90	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	756	0.258	0.78	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	547	0.244	0.79	1.312
2,2',3,5 - TeCB	43			176	0.285	0.80	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	4020	0.238	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	222	0.263	0.79	1.147
2,2',3,6' - TeCB	46			76.7	0.300	0.80	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	351	0.250	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	4620	0.225	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	420	0.258	0.79	1.110
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	9040	0.258	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			5.08	0.240	0.74	1.000
2,3,3',4 - TeCB	55		U		5.85		
2,3,3',4' - TeCB	56		B	168	6.13	0.67	0.904
2,3,3',5 - TeCB	57			50.4	6.29	0.76	0.844
2,3,3',5' - TeCB	58			24.2	6.39	0.88	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	442	0.201	0.78	1.303
2,3,4,4' - TeCB	60		B	828	5.90	0.76	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	4650	5.80	0.78	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			299	5.91	0.78	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	1440	0.186	0.78	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	4360	5.79	0.77	0.884
2,3',4,5 - TeCB	67			38.1	5.56	0.79	0.856
2,3',4,5' - TeCB	68			20.0	5.70	0.78	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			195	6.02	0.77	0.823
2,3',5',6 - TeCB	73		U		0.194		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			54.2	6.51	0.77	1.000
3,3',4,5 - TeCB	78		U		6.03		
3,3',4,5' - TeCB	79			84.6	4.98	0.71	0.970
3,3',5,5' - TeCB	80		U		5.63		
3,4,4',5 - TeCB	81		K	11.0	5.85	0.79	1.000
2,2',3,3',4 - PeCB	82			505	5.36	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	14600	5.08	1.57	0.886
2,2',3,3',6 - PeCB	84		B	1180	5.48	1.57	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	2390	4.20	1.58	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	8110	4.28	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	1600	4.84	1.57	1.154
2,2',3,4,6' - PeCB	89			19.5	5.33	1.57	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	4390	5.18	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	8140	4.76	1.57	1.120
2,2',3,5,6' - PeCB	94			20.7	5.17	1.62	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			37.7	0.192	1.56	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			256	4.61	1.56	1.093
2,2',4,6,6' - PeCB	104		J	1.79	0.213	1.61	1.001
2,3,3',4,4' - PeCB	105		B	5880	4.11	1.54	1.001
2,3,3',4,5 - PeCB	106		U		3.58		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			39.5	0.186	1.27	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			8.33	0.185	1.22	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	3.74	0.176	1.24	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	3570	3.79	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3270	3.06	1.26	0.938
2,3,3',4,5,5' - HxCB	159			79.6	3.25	1.25	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.13		
2,3,3',4',5,5' - HxCB	162			105	3.17	1.27	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			1130	3.35	1.29	0.921
2,3,3',5,5',6 - HxCB	165			24.1	3.46	1.18	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1050	3.01	1.27	1.000
2,3',4,4',5,6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	6980	0.663	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	1970	0.639	1.04	1.163
2,2',3,3',4,5,5' - HpCB	172			1210	0.645	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1720	0.597	1.04	1.133
2,2',3,3',4,5',6 - HpCB	175			279	0.573	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			410	0.447	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	4010	0.637	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	1940	0.599	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	1800	0.446	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			58.8	0.585	1.05	1.156
2,2',3,4,4',5,6' - HpCB	182			77.6	0.586	1.05	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	5600	0.568	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184			5.53	0.425	1.01	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.459		
2,2',3,4',5,5',6 - HpCB	187		B	11600	0.538	1.04	1.110
2,2',3,4',5,6,6' - HpCB	100			15.2	0.428	1.03	1.000
2,3,3',4,4',5,5' - HpCB	189			249	1.02	1.02	1.000
2,3,3',4,4',5,6 - HpCB	190		B	1520	0.499	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191			332	0.499	1.04	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.515		



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-56 W

Sample Receipt Date: 26-Oct-2004

Sample Size: 10.2 g (wet)

Extraction Date: 02-Mar-2005

Initial Calibration Date: 01-Mar-2005

Analysis Date: 23-Mar-2005

Time: 4:48:35

Instrument ID: HR GC/MS

Extract Volume (µL): 400

GC Column ID: SPB-OCTYL

Injection Volume (µL): 1.0

Sample Data Filename: PB5C\_152 S:10

Dilution Factor: 8

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_152 S:1

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD4\_1.xls, S5

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0208



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99					
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	20100	23.1	1.56	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5 - PeCB	99	83 + 99					
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-C-PS-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-56 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 15:27:02	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_097 S: 12
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: D153_097 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			25.9	0.454	1.57	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			1.43	0.354	1.22	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; R = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204cAD2\_1.xls, S2

Approved by:  QA/QC Chemist

22-04-2005  
 dd-mm-yyyy

0216

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 04-Aug-04
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-56
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 2:47:33	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_136 S:8 PB5C_152 S:10 DT53_097 S: 12

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		2.68	0.194
Total Dichloro Biphenyls		166	0.683
Total Trichloro Biphenyls		5210	0.717
Total Tetrachloro Biphenyls		32900	6.51
Total Pentachloro Biphenyls		103000	5.48
Total Hexachloro Biphenyls		140000	4.70
Total Heptachloro Biphenyls		58300	1.02
Total Octachloro Biphenyls		9000	0.584
Total Nonachloro Biphenyls		525	0.136
Decachloro Biphenyl		39.3	0.0491
TOTAL PCBs		349000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S14

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0218

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-D-PS-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-58
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.0 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 3:51:49	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_136 S:9
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	3.81	0.200	3.31	1.000
3 - MoCB	2		J	0.619	0.216	2.73	0.988
4 - MoCB	3		J	0.810	0.224	2.74	1.001
2,2' - DiCB	4			107	1.02	1.51	1.001
2,3 - DiCB	5		J	2.71	0.685	1.42	1.197
2,3' - DiCB	6			105	0.613	1.54	1.176
2,4 - DiCB	7		J	4.84	0.613	1.59	1.158
2,4' - DiCB	8		B	146	0.543	1.55	1.208
2,5 - DiCB	9			12.7	0.632	1.58	1.146
2,6 - DiCB	10			5.79	0.669	1.45	1.014
3,3' - DiCB	11		JB	3.38	0.702	1.78	0.907
3,4 - DiCB	12	12 + 13	C J	6.92	0.649	1.77	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.660		
4,4' - DiCB	15		B	21.5	0.737	1.70	0.999
2,2',3 - TriCB	16		B	209	0.183	1.06	1.166
2,2',4 - TriCB	17		B	632	0.185	1.04	1.138
2,2',5 - TriCB	18	18 + 30	C B	1390	0.154	1.01	1.113
2,2',6 - TriCB	19			164	0.250	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C B	4330	4.47	1.03	0.848

15204AD2\_1.xls, S7

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0221

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	494	4.25	1.02	0.856
2,3,4' - TriCB	22		B	426	4.71	1.04	0.871
2,3,5 - TriCB	23		U		4.41		
2,3,6 - TriCB	24			25.2	0.140	0.93	1.158
2,3',4 - TriCB	25			321	3.82	1.01	0.825
2,3',5 - TriCB	26	26 + 29	C B	1650	4.54	1.03	1.302
2,3',6 - TriCB	27			259	0.131	1.05	1.152
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1960	4.35	1.03	0.836
2,4',6 - TriCB	32		B	603	4.60	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			23.7	4.76	1.07	1.275
3,3',4 - TriCB	35		U		4.87		
3,3',5 - TriCB	36		U		4.53		
3,4,4' - TriCB	37		B	80.6	4.61	1.01	1.002
3,4,5 - TriCB	38		U		4.54		
3,4',5 - TriCB	39			11.2	4.41	1.02	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1620	0.223	0.78	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	993	0.211	0.79	1.312
2,2',3,5 - TeCB	43			421	0.247	0.78	1.246
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	7560	0.206	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	508	0.228	0.79	1.148
2,2',3,6' - TeCB	46			165	0.259	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	661	0.216	0.78	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	8590	0.194	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	919	0.223	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	17000	0.220	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			11.5	0.231	0.79	1.001
2,3,3',4 - TeCB	55		U		9.25		
2,3,3',4' - TeCB	56		B	527	9.69	0.78	0.905
2,3,3',5 - TeCB	57			85.5	9.94	0.73	0.844
2,3,3',5' - TeCB	58			40.1	10.1	0.84	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	877	0.174	0.79	1.303
2,3,4,4' - TeCB	60		B	1460	9.32	0.78	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	9440	9.17	0.76	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			459	9.34	0.76	0.864



COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	2690	0.161	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	7290	9.15	0.76	0.884
2,3',4,5 - TeCB	67			110	8.79	0.77	0.857
2,3',4,5' - TeCB	68			61.4	9.01	0.73	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			315	9.51	0.76	0.823
2,3',5',6 - TeCB	73		U		0.168		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			155	10.1	0.77	1.000
3,3',4,5 - TeCB	78		U		9.54		
3,3',4,5' - TeCB	79			149	7.87	0.74	0.970
3,3',5,5' - TeCB	80		U		8.90		
3,4,4',5 - TeCB	81		K	16.7	8.86	0.67	1.000
2,2',3,3',4 - PeCB	82			644	7.20	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C E				
2,2',3,3',6 - PeCB	84		B	2100	7.36	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	3090	5.64	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	11000	5.75	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	2460	6.50	1.58	1.154
2,2',3,4,6' - PeCB	89			44.1	7.17	1.61	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	6150	6.96	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	13200	6.39	1.58	1.120
2,2',3,5,6' - PeCB	94			36.4	6.95	1.56	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			66.5	0.195	1.59	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			367	6.19	1.57	1.094
2,2',4,6,6' - PeCB	104		J	3.40	0.239	1.55	1.001
2,3,3',4,4' - PeCB	105		B	7690	5.98	1.55	1.000
2,3,3',4,5 - PeCB	106		U		5.45		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	428	5.94	1.54	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			2090	5.40	1.52	0.998
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			35.1	4.97	1.71	0.945
2,3,3',5,6 - PeCB	112		U		4.83		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			558	6.25	1.52	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			176	4.88	1.61	0.959
2,3',4,5',6 - PeCB	121			14.4	5.16	1.57	1.200
2',3,3',4,5 - PeCB	122		U		5.98		
2',3,4,4',5 - PeCB	123		K	305	6.33	1.71	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			69.3	6.07	1.59	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4660	8.24	1.27	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130			2610	10.5	1.27	0.913
2,2',3,3',4,6 - HxCB	131			183	10.1	1.23	1.159
2,2',3,3',4,6' - HxCB	132		B	4920	10.2	1.26	1.174
2,2',3,3',5,5' - HxCB	133			988	9.62	1.26	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	1220	9.85	1.24	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	12900	0.309	1.28	1.103
2,2',3,3',6,6' - HxCB	136		B	2470	0.242	1.28	1.024
2,2',3,4,4',5 - HxCB	137			2020	9.53	1.24	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	697	8.98	1.26	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	5740	9.36	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		9.64		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 HxCB	144			1620	0.324	1.28	1.121
2,2',3,4,6,6' - HxCB	145		J	4.77	0.246	1.41	1.034
2,2',3,4',5,5' - HxCB	146		B	9760	8.78	1.27	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	19100	9.30	1.26	1.133
2,2',3,4',5,6' - HxCB	148			92.3	0.319	1.31	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			57.7	0.236	1.29	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			13.0	0.235	1.34	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			5.51	0.232	1.39	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	4240	8.43	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	4250	6.84	1.26	0.938
2,3,3',4,5,5' - HxCB	159			116	7.27	1.29	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		7.01		
2,3,3',4',5,5' - HxCB	162			125	7.09	1.22	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			1440	7.49	1.24	0.921
2,3,3',5,5',6 - HxCB	165			34.0	7.75	1.39	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1500	6.63	1.26	1.001
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	9440	0.491	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	2800	0.473	1.04	1.163
2,2',3,3',4,5,5' - HpCB	172			1660	0.477	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	2630	0.442	1.04	1.133
2,2',3,3',4,5',6 - HpCB	175			410	0.424	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			613	0.331	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	5680	0.472	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	2720	0.444	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2680	0.330	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			69.0	0.433	1.05	1.157
2,2',3,4,4',5,6' - HpCB	182			103	0.434	1.03	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	8180	0.420	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184			7.44	0.314	0.98	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.340		
2,2',3,4',5,5',6 - HpCB	187		B	17000	0.398	1.04	1.110
2,2',3,4',5,6,6' - HpCB	188			21.8	0.306	1.05	1.000
2,3,3',4,4',5,5' - HpCB	189			315	1.47	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2060	0.369	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			463	0.369	1.04	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.382		





COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	2700	0.530	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	1220	0.561	0.90	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	1610	0.0561	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	279	0.0499	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	2910	0.0565	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	459	0.0499	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	952	0.0499	0.91	1.001
2,2',3,4,4',5,5',6 - OcCB	203		B	2400	0.0515	0.90	0.919
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.909	0.0499	0.86	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	137	0.474	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	513	0.125	0.79	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			72.2	0.0935	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			133	0.0995	0.77	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	53.3	0.0499	0.70	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-D-PS-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 23-Mar-2005

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 8

Concentration Units : ng/kg (wet weight basis)

Time: 5:52:52

Sample Collection: 30-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-58 W

Sample Size: 10.0 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_152 S:11

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_152 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD4\_1.xls, S6

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0220

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



0230

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99	C D B	21000	21.7	1.56	0.886
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	29500	18.6	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125					
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	20100	15.7	1.57	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 - PeCB	118		D B	27000	115	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125					
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125					
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	49400	67.8	1.26	0.928
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6 - HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149					



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	55800	61.1	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	120 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	25500	1.60	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187						
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	208						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-D-PS-WB-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	30-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-58 P
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.0 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	04-Apr-2005
Analysis Date: 09-Apr-2005	Instrument ID:	HR GC/MS
Time: 17:25:39	GC Column ID:	DB-1
Extract Volume (µL): 50	Sample Datafile:	DT53_097 S: 15
Injection Volume (µL): 2.0	Blank Data Filename:	DT53_096 S: 5
Dilution Factor: N/A	Cal. Ver. Data Filename:	DT53_097 S: 1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			38.6	0.718	1.57	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			1.71	0.571	1.10	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; R = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by: \_\_\_\_\_



QA/QC Chemist

22-04-2005  
 dd-mm-yyyy

0251



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	30-Aug-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-58
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.0 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 3:51:49	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_136 S:9 PB5C_152 S:11 DT53_097 S: 15

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		5.24	0.224
Total Dichloro Biphenyls		416	1.02
Total Trichloro Biphenyls		12600	4.87
Total Tetrachloro Biphenyls		62200	10.1
Total Pentachloro Biphenyls		148000	7.36
Total Hexachloro Biphenyls		186000	10.5
Total Heptachloro Biphenyls		82400	1.47
Total Octachloro Biphenyls		12700	0.561
Total Nonachloro Biphenyls		719	0.125
Decachloro Biphenyl		53.3	0.0499
TOTAL PCBs		505000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.0 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-58  
 GC Column ID(s): SPB-OCTYL  
 DB 1  
 Sample Datafile(s): PB5C\_136 S:9  
 PB5C\_152 S:11  
 DT53\_097 S: 15

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			155	10.1	0.0001	1.55E-02	1.55E-02
3,4,4',5-TetraCB	81		U		8.86	0.0001	4.43E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			7690	5.98	0.0001	7.69E-01	7.69E-01
2,3,4,4',5-PentaCB	114			558	6.25	0.0005	2.79E-01	2.79E-01
2,3',4,4',5-PentaCB	118			27000	115	0.0001	2.70E+00	2.70E+00
2',3,4,4',5-PentaCB	123		U		6.33	0.0001	3.17E-04	0.00E+00
3,3',4,4',5-PentaCB	126			38.6	0.718	0.1	3.86E+00	3.86E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	4240	8.43	0.0005	2.12E+00	2.12E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5'-HexaCB	167			1500	6.63	0.00001	1.50E-02	1.50E-02
3,3',4,4',5,5'-HexaCB	169			1.71	0.571	0.01	1.71E-02	1.71E-02
2,3,3',4,4',5,5'-HeptaCB	189			315	1.47	0.0001	3.15E-02	3.15E-02
TOTAL TEQ							9.81	9.81

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-SF-WB-comp-1

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	04-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-112
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID:	HR GC/MS
Time: 4:56:05	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename:	PB5C_136 S:10
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		B	5.92	0.198	3.08	1.000
3 - MoCB	2		KJ	0.736	0.211	2.54	0.988
4 - MoCB	3		J	1.19	0.217	3.43	1.000
2,2' - DiCB	4			176	0.963	1.55	1.001
2,3 - DiCB	5			5.42	0.765	1.60	1.197
2,3' - DiCB	6			165	0.685	1.52	1.175
2,4 - DiCB	7			10.5	0.684	1.50	1.157
2,4' - DiCB	8		B	229	0.607	1.54	1.206
2,5 - DiCB	9			22.0	0.706	1.51	1.145
2,6 - DiCB	10			9.38	0.747	1.67	1.014
3,3' - DiCB	11		B	5.48	0.784	1.33	0.967
3,4 - DiCB	12	12 + 13	C J	8.57	0.725	1.42	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.737		
4,4' - DiCB	15		B	30.8	0.895	1.45	0.999
2,2',3 - TriCB	16		B	206	0.264	1.01	1.166
2,2',4 - TriCB	17		B	667	0.267	1.04	1.138
2,2',5 - TriCB	18	18 + 30	C B	1710	0.222	1.05	1.113
2,2',6 - TriCB	19			199	0.326	1.05	1.001
2,3,3' - TriCB	20	20 + 28	C B	5470	3.28	1.04	0.848

15204AD2\_1.xls, S8

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0242

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	586	3.12	1.04	0.857
2,3,4' - TriCB	22		B	889	3.46	1.04	0.872
2,3,5 - TriCB	23		U		3.24		
2,3,6 - TriCB	24			28.1	0.203	1.17	1.158
2,3',4 - TriCB	25			648	2.80	1.03	0.825
2,3',5 - TriCB	26	26 + 29	C B	1920	3.33	1.03	1.301
2,3',6 - TriCB	27			304	0.189	1.04	1.152
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	3470	3.19	1.04	0.836
2,4',6 - TriCB	32		B	941	3.38	1.01	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			18.4	3.49	1.02	1.275
3,3',4 - TriCB	35		U		3.58		
3,3',5 - TriCB	36		U		3.32		
3,4,4' - TriCB	37		B	129	3.48	1.01	1.002
3,4,5 - TriCB	38		J	4.04	3.33	1.20	0.968
3,4',5 - TriCB	39			7.88	3.24	1.08	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1620	0.363	0.78	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	677	0.344	0.79	1.312
2,2',3,5 - TeCB	43			261	0.402	0.78	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	6550	0.335	0.79	1.287
2,2',3,6 - TeCB	45	45 + 51	C	718	0.371	0.79	1.147
2,2',3,6' - TeCB	46			91.5	0.423	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	478	0.352	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	7850	0.317	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	643	0.364	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	17000	0.363	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			17.3	0.319	0.79	1.001
2,3,3',4 - TeCB	55		U		5.78		
2,3,3',4' - TeCB	56		B	1170	6.05	0.77	0.905
2,3,3',5 - TeCB	57			70.7	6.21	0.78	0.844
2,3,3',5' - TeCB	58			37.3	6.31	0.70	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	944	0.284	0.79	1.300
2,3,4,4' - TeCB	60		B	1690	5.82	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	12800	5.73	0.76	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			302	5.83	0.76	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	3140	0.262	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	8290	5.72	0.77	0.884
2,3',4,5 - TeCB	67			160	5.49	0.75	0.856
2,3',4,5' - TeCB	68			116	5.63	0.76	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			285	5.94	0.76	0.823
2,3',5',6 - TeCB	73		U		0.273		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			242	6.50	0.78	1.000
3,3',4,5 - TeCB	78		U		5.96		
3,3',4,5' - TeCB	79			86.6	4.92	0.75	0.970
3,3',5,5' - TeCB	80		U		5.56		
3,4,4',5 - TeCB	81		K	21.8	5.94	0.82	1.001
2,2',3,3',4 - PeCB	82			356	4.93	1.58	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	19100	4.68	1.58	0.886
2,2',3,3',6 - PeCB	84		B	1500	5.05	1.56	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	3730	3.87	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	8230	3.94	1.58	0.902
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	1980	4.46	1.57	1.154
2,2',3,4,6' - PeCB	89			34.2	4.91	1.65	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C E				
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	5830	4.77	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	11300	4.38	1.58	1.121
2,2',3,5,6' - PeCB	94			26.7	4.77	1.68	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			60.9	0.253	1.60	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			436	4.24	1.57	1.094
2,2',4,6,6' - PeCB	104		J	3.12	0.276	1.54	1.001
2,3,3',4,4' - PeCB	105		B	6450	5.56	1.55	1.000
2,3,3',4,5 - PeCB	106		U		4.95		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	528	5.39	1.57	0.991
2,3,3',4',5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			1400	4.91	1.54	0.998
2,3,3',4',6 - PeCB	110	110 + 115	C E				
2,3,3',5,5' - PeCB	111			35.3	3.41	1.54	0.945
2,3,3',5,6 - PeCB	112		U		3.31		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			509	5.72	1.55	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		E				
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			194	3.34	1.57	0.959
2,3',4,5',6 - PeCB	121			14.6	3.54	1.58	1.200
2',3,3',4,5 - PeCB	122		U		5.43		
2',3,4,4',5 - PeCB	123			310	5.93	1.56	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			54.6	5.51	1.52	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	4230	9.28	1.26	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C E				
2,2',3,3',4,5' - HxCB	130			1110	11.8	1.27	0.913
2,2',3,3',4,6 - HxCB	131			115	11.3	1.28	1.159
2,2',3,3',4,6' - HxCB	132		B	3920	11.5	1.26	1.174
2,2',3,3',5,5' - HxCB	133			857	10.8	1.26	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	736	11.1	1.27	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	12000	0.330	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	2150	0.258	1.28	1.024
2,2',3,4,4',5 - HxCB	137			1520	10.7	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	791	10.1	1.26	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	5660	10.5	1.27	0.903
2,2',3,4,5,6 - HxCB	142		U		10.9		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			1330	0.346	1.27	1.121
2,2',3,4,6,6' - HxCB	145			5.76	0.262	1.24	1.034
2,2',3,4',5,5' - HxCB	146		B	6820	9.88	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	16700	10.5	1.27	1.133
2,2',3,4',5,6' - HxCB	148			85.7	0.341	1.29	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			53.7	0.252	1.31	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			8.96	0.251	1.24	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C E				
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155			5.87	0.239	1.20	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	3280	9.49	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	3850	7.70	1.26	0.937
2,3,3',4,5,5' - HxCB	159			147	8.19	1.26	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		7.89		
2,3,3',4,5,5' - HxCB	162			101	7.98	1.27	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			1610	8.43	1.26	0.921
2,3,3',5,5',6 - HxCB	165			29.8	8.72	1.25	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	1460	7.73	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	8100	0.908	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	2750	0.875	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			1300	0.882	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	3070	0.817	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			322	0.784	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176			568	0.612	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	2490	0.872	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	2250	0.820	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	2730	0.610	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C E				
2,2',3,4,4',5,6 - HpCB	181			65.3	0.801	1.04	1.157
2,2',3,4,4',5,6' - HpCB	182			112	0.802	1.05	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	8200	0.777	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184			6.51	0.581	1.02	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.629		
2,2',3,4',5,5',6 - HpCB	187		B	11700	0.736	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			22.0	0.574	1.07	1.000
2,3,3',4,4',5,5' - HpCB	189			252	1.23	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	2010	0.683	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			444	0.683	1.06	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.705		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	2680	0.808	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	1210	0.856	0.90	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	1760	0.0755	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	107	197 + 200	C R	365	0.0556	0.89	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	2910	0.0760	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	432	0.0574	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	845	0.0653	0.89	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	2570	0.0692	0.90	0.919
2,2',3,4,4',5,6,6' - OcCB	204		JB	1.27	0.0571	0.88	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	159	0.722	0.90	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	632	0.146	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			89.9	0.111	0.77	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			163	0.118	0.79	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	109	0.0485	0.70	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.





Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-SF-WB-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 23-Mar-2005

Extract Volume (µL): 400

Injection Volume (µL): 1.0

Dilution Factor: 8

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 04-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-112 W

Sample Size: 10.3 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_153 S:11

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_153 S:1

Time: 17:44:52

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1						
3 - MoCB	2						
4 - MoCB	3						
2,2' - DiCB	4						
2,3 - DiCB	5						
2,3' - DiCB	6						
2,4 - DiCB	7						
2,4' - DiCB	8						
2,5 - DiCB	9						
2,6 - DiCB	10						
3,3' - DiCB	11						
3,4 - DiCB	12	12 + 13					
3,4' - DiCB	13	12 + 13					
3,5 - DiCB	14						
4,4' - DiCB	15						
2,2',3 - TriCB	16						
2,2',4 - TriCB	17						
2,2',5 - TriCB	18	18 + 30					
2,2',6 - TriCB	19						
2,3,3' - TriCB	20	20 + 28					

15204AD5\_1.xls, S2

Approved by: \_\_\_\_\_



QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0256

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33					
2,3,4' - TriCB	22						
2,3,5 - TriCB	23						
2,3,6 - TriCB	24						
2,3',4 - TriCB	25						
2,3',5 - TriCB	26	26 + 29					
2,3',6 - TriCB	27						
2,4,4' - TriCB	28	20 + 28					
2,4,5 - TriCB	29	26 + 29					
2,4,6 - TriCB	30	18 + 30					
2,4',5 - TriCB	31						
2,4',6 - TriCB	32						
2',3,4 - TriCB	33	21 + 33					
2',3,5 - TriCB	34						
3,3',4 - TriCB	35						
3,3',5 - TriCB	36						
3,4,4' - TriCB	37						
3,4,5 - TriCB	38						
3,4',5 - TriCB	39						
2,2',3,3' - TeCB	40	40 + 41 + 71					
2,2',3,4 - TeCB	41	40 + 41 + 71					
2,2',3,4' - TeCB	42						
2,2',3,5 - TeCB	43						
2,2',3,5' - TeCB	44	44 + 47 + 65					
2,2',3,6 - TeCB	45	45 + 51					
2,2',3,6' - TeCB	46						
2,2',4,4' - TeCB	47	44 + 47 + 65					
2,2',4,5 - TeCB	48						
2,2',4,5' - TeCB	49	49 + 69					
2,2',4,6 - TeCB	50	50 + 53					
2,2',4,6' - TeCB	51	45 + 51					
2,2',5,5' - TeCB	52						
2,2',5,6' - TeCB	53	50 + 53					
2,2',6,6' - TeCB	54						
2,3,3',4 - TeCB	55						
2,3,3',4' - TeCB	56						
2,3,3',5 - TeCB	57						
2,3,3',5' - TeCB	58						
2,3,3',6 - TeCB	59	59 + 62 + 75					
2,3,4,4' - TeCB	60						
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76					
2,3,4,6 - TeCB	62	59 + 62 + 75					
2,3,4',5 - TeCB	63						



Lab Sample ID: L7311-112 W

CLIENT ID:

LDW-T4-M-SF-WB-comp-1

Project No.:

04-08-06-22

Sample Data Filename:

PB5C\_153 S:11

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAD FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64						
2,3,5,6 - TeCB	65	44 + 47 + 65					
2,3',4,4' - TeCB	66						
2,3',4,5 - TeCB	67						
2,3',4,5' - TeCB	68						
2,3',4,6 - TeCB	69	49 + 69					
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76					
2,3',4',6 - TeCB	71	40 + 41 + 71					
2,3',5,5' - TeCB	72						
2,3',5',6 - TeCB	73						
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76					
2,4,4',6 - TeCB	75	59 + 62 + 75					
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76					
3,3',4,4' - TeCB	77						
3,3',4,5 - TeCB	78						
3,3',4,5' - TeCB	79						
3,3',5,5' - TeCB	80						
3,4,4',5 - TeCB	81						
2,2',3,3',4 - PeCB	82						
2,2',3,3',5 - PeCB	83	83 + 99					
2,2',3,3',6 - PeCB	84						
2,2',3,4,4' - PeCB	85	85 + 116 + 117					
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125					
2,2',3,4,6 - PeCB	88	88 + 91					
2,2',3,4,6' - PeCB	89						
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C D B	23600	28.3	1.58	0.869
2,2',3,4',6 - PeCB	91	88 + 91					
2,2',3,5,5' - PeCB	92						
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102					
2,2',3,5,6' - PeCB	94						
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102					
2,2',3,6,6' - PeCB	96						
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125					
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102					
2,2',4,4',5 - PeCB	99	83 + 99					
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102					
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102					
2,2',4,5',6 - PeCB	103						
2,2',4,6,6' - PeCB	104						
2,3,3',4,4' - PeCB	105						
2,3,3',4,5 - PeCB	106						

15204AD5\_1.xls, S2

Approved by: \_\_\_\_\_



QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0252

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124					
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125					
2,3,3',4,6 - PeCB	109						
2,3,3',4',6 - PeCB	110	110 + 115	C D B	20600	24.2	1.58	0.925
2,3,3',5,5' - PeCB	111						
2,3,3',5,6 - PeCB	112						
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114						
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117					
2,3,4',5,6 - PeCB	117	85 + 116 + 117					
2,3',4,4',5 PeCB	118		D B	22700	114	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125					
2,3',4,5,5' - PeCB	120						
2,3',4,5',6 - PeCB	121						
2',3,3',4,5 - PeCB	122						
2',3,4,4',5 - PeCB	123						
2',3,4,5,5' - PeCB	124	107 + 124					
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125					
3,3',4,4',5 - PeCB	126						
3,3',4,5,5' - PeCB	127						
2,2',3,3',4,4' - HxCB	128	128 + 166					
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C D B	40700	58.0	1.28	0.928
2,2',3,3',4,5' - HxCB	130						
2,2',3,3',4,6 - HxCB	131						
2,2',3,3',4,6' - HxCB	132						
2,2',3,3',5,5' - HxCB	133						
2,2',3,3',5,6 - HxCB	134	134 + 143					
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154					
2,2',3,3',6,6' - HxCB	136						
2,2',3,4,4',5 - HxCB	137						
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140					
2,2',3,4,4',6' - HxCB	140	139 + 140					
2,2',3,4,5,5' - HxCB	141						
2,2',3,4,5,6 - HxCB	142						
2,2',3,4,5,6' - HxCB	143	134 + 143					
2,2',3,4,5',6 - HxCB	144						
2,2',3,4,6,6' - HxCB	145						
2,2',3,4',5,5' - HxCB	146						
2,2',3,4',5,6 HxCB	147	147 + 149					
2,2',3,4',5,6' - HxCB	148						
2,2',3,4',5',6 - HxCB	149	147 + 149					



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150						
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154					
2,2',3,5,6,6' - HxCB	152						
2,2',4,4',5,5' - HxCB	153	153 + 168	C D B	54000	52.3	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154					
2,2',4,4',6,6' - HxCB	155						
2,3,3',4,4',5 - HxCB	156	156 + 157					
2,3,3',4,4',5' - HxCB	157	156 + 157					
2,3,3',4,4',6 - HxCB	158						
2,3,3',4,5,5' - HxCB	159						
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161						
2,3,3',4',5,5' - HxCB	162						
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164						
2,3,3',5,5',6 - HxCB	165						
2,3,4,4',5,6 - HxCB	166	120 + 166					
2,3',4,4',5,5' - HxCB	167						
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169						
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,3',4,4',6 - HpCB	171	171 + 173					
2,2',3,3',4,5,5' - HpCB	172						
2,2',3,3',4,5,6 - HpCB	173	171 + 173					
2,2',3,3',4,5,6' - HpCB	174						
2,2',3,3',4,5',6 - HpCB	175						
2,2',3,3',4,6,6' - HpCB	176						
2,2',3,3',4',5,6 - HpCB	177						
2,2',3,3',5,5',6 - HpCB	178						
2,2',3,3',5,6,6' - HpCB	179						
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C D B	22300	1.34	1.06	0.910
2,2',3,4,4',5,6 - HpCB	181						
2,2',3,4,4',5,6' - HpCB	182						
2,2',3,4,4',5',6 - HpCB	183	183 + 185					
2,2',3,4,4',6,6' - HpCB	184						
2,2',3,4,5,5',6 - HpCB	185	183 + 185					
2,2',3,4,5,6,6' - HpCB	186						
2,2',3,4',5,5',6 - HpCB	187						
2,2',3,4',5,6,6' - HpCB	188						
2,3,3',4,4',5,5' - HpCB	189						
2,3,3',4,4',5,6 - HpCB	190						
2,3,3',4,4',5',6 - HpCB	191						
2,3,3',4,5,5',6 - HpCB	192						

15204AD5\_1.xls, S2

Approved by:



QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0254



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAD FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194						
2,2',3,3',4,4',5,6 - OcCB	195						
2,2',3,3',4,4',5,6' - OcCB	196						
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200					
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199					
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199					
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200					
2,2',3,3',4,5',6,6' - OcCB	201						
2,2',3,3',5,5',6,6' - OcCB	202						
2,2',3,4,4',5,5',6 - OcCB	203						
2,2',3,4,4',5,6,6' - OcCB	204						
2,3,3',4,4',5,5',6 - OcCB	205						
2,2',3,3',4,4',5,5',6 - NoCB	206						
2,2',3,3',4,4',5,6,6' - NoCB	207						
2,2',3,3',4,5,5',6,6' - NoCB	200						
2,2',3,3',4,4',5,5',6,6' - DeCB	209						

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-M-SF-WB-comp-1

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	04-Aug-2004
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-112 P
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	04-Apr-2005
Analysis Date: 09-Apr-2005	Instrument ID:	HR GC/MS
Time: 16:46:06	GC Column ID:	DB-1
Extract Volume (µL): 50	Sample Datafile:	DT53_097 S: 14
Injection Volume (µL): 2.0	Blank Data Filename:	DT53_096 S: 5
Dilution Factor: N/A	Cal. Ver. Data Filename:	DT53_097 S: 1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			30.2	1.17	1.52	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			1.24	1.23	1.34	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; R = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name:	AXYS ANALYTICAL SERVICES	Sample Collection:	04-Aug-04
Contract No.:	4033	Project No.:	04-08-06-22
Matrix:	TISSUE	Lab Sample ID:	L7311-112
Sample Receipt Date:	26-Oct-2004	Sample Size:	10.3 g (wet)
Extraction Date:	02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date:	15-Mar-2005	Instrument ID:	HR GC/MS
	Time: 4:56:05	GC Column ID:	SPB-OCTYL
Extract Volume (µL):	50	Blank Data Filename:	PB5C_135 S:7
Injection Volume (µL):	1.0	Cal. Ver. Data Filename:	PB5C_136 S:1
Dilution Factor:	N/A	Sample Datafile(s):	PB5C_136 S:10 PB5C_153 S:11 DT53_097 S: 14
Concentration Units :	ng/kg (wet weight basis)		

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		7.12	0.217
Total Dichloro Biphenyls		663	0.963
Total Trichloro Biphenyls		17200	3.58
Total Tetrachloro Biphenyls		65300	6.50
Total Pentachloro Biphenyls		129000	5.93
Total Hexachloro Biphenyls		163000	11.8
Total Heptachloro Biphenyls		68700	1.23
Total Octachloro Biphenyls		12900	0.856
Total Nonachloro Biphenyls		885	0.116
Decachloro Biphenyl		109	0.0485
TOTAL PCBs		458000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.





Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 04-Aug-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-112

Sample Size: 10.3 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s):  
 DB-1  
 PB5C\_136 S:10  
 PB5C\_153 S:11  
 DT53\_097 S: 14

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			242	6.50	0.0001	2.42E-02	2.42E-02
3,4,4',5-TetraCB	81		U		5.94	0.0001	2.97E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			6450	5.56	0.0001	6.45E-01	6.45E-01
2,3,4,4',5-PentaCB	114			509	5.72	0.0005	2.54E-01	2.54E-01
2,3',4,4',5-PentaCB	118			22700	114	0.0001	2.27E+00	2.27E+00
2',3,4,4',5-PentaCB	123			310	5.93	0.0001	3.10E-02	3.10E-02
3,3',4,4',5-PentaCB	126			30.2	1.17	0.1	3.02E+00	3.02E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	3280	9.49	0.0005	1.64E+00	1.64E+00
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			1460	7.73	0.00001	1.46E-02	1.46E-02
3,3',4,4',5,5'-HexaCB	169			1.24	1.23	0.01	1.24E-02	1.24E-02
2,3,3',4,4',5,5'-HeptaCB	189			252	1.23	0.0001	2.52E-02	2.52E-02
TOTAL TEQ							7.93	7.93

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by:  QA/QC Chemist

026.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-SF-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-115
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 6:00:27	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_136 S:11
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_136 S:1
Concentration Units: ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	4.34	0.154	3.07	1.001
3 - MoCB	2		J	0.424	0.177	2.99	0.987
4 - MoCB	3		J	0.738	0.194	3.41	1.000
2,2' - DiCB	4			154	0.928	1.53	1.001
2,3 - DiCB	5		J	2.93	0.715	1.72	1.197
2,3' - DiCB	6			99.9	0.640	1.54	1.175
2,4 - DiCB	7			7.63	0.639	1.48	1.157
2,4' - DiCB	8		B	151	0.567	1.54	1.207
2,5 - DiCB	9			17.5	0.659	1.50	1.145
2,6 - DiCB	10			8.21	0.698	1.58	1.013
3,3' - DiCB	11		JB	4.69	0.733	1.51	0.968
3,4 - DiCB	12	12 + 13	C J	5.02	0.678	1.49	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.689		
4,4' - DiCB	15		B	29.8	0.822	1.57	1.000
2,2',3 - TriCB	16		B	167	0.190	1.05	1.166
2,2',4 - TriCB	17		B	410	0.192	1.05	1.138
2,2',5 - TriCB	18	18 + 30	C B	1240	0.100	1.04	1.113
2,2',6 - TriCB	19			153	0.222	1.04	1.001
2,3,3' - TriCB	20	20 + 28	C B	5030	2.15	1.04	0.848

15204AD2\_1.xls, S9

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0263

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	426	2.05	1.01	0.857
2,3,4' - TriCB	22		B	666	2.27	1.03	0.872
2,3,5 - TriCB	23		U		2.12		
2,3,6 - TriCB	24			22.6	0.146	1.06	1.159
2,3',4 - TriCB	25			525	1.84	1.04	0.825
2,3',5 - TriCB	26	26 + 29	C B	1610	2.18	1.03	1.301
2,3',6 - TriCB	27			264	0.136	1.06	1.152
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	3190	2.09	1.04	0.837
2,4',6 - TriCB	32		B	700	2.21	1.01	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34			11.9	2.29	1.05	1.275
3,3',4 - TriCB	35		U		2.34		
3,3',5 - TriCB	36		U		2.18		
3,4,4' - TriCB	37		B	126	2.35	1.04	1.002
3,4,5 - TriCB	38		J	3.77	2.19	1.06	0.969
3,4',5 - TriCB	39		J	3.17	2.12	0.90	0.947
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	1170	0.350	0.79	1.338
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	456	0.332	0.79	1.312
2,2',3,5 - TeCB	43		U		0.388		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	5640	0.323	0.79	1.287
2,2',3,6 - TeCB	45	45 + 51	C	544	0.358	0.78	1.147
2,2',3,6' - TeCB	46			76.0	0.408	0.78	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	300	0.340	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	5960	0.306	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	547	0.351	0.79	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	13000	0.350	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54			15.6	0.296	0.76	1.001
2,3,3',4 - TeCB	55		U		2.70		
2,3,3',4' - TeCB	56		B	945	2.83	0.76	0.905
2,3,3',5 - TeCB	57			49.8	2.90	0.78	0.844
2,3,3',5' - TeCB	58			28.8	2.94	0.70	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	112	0.274	0.79	1.303
2,3,4,4' - TeCB	60		B	1520	2.72	0.77	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	10900	2.68	0.76	0.875
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			208	2.72	0.76	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	2640	0.253	0.79	1.350
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	7250	2.67	0.76	0.884
2,3',4,5 - TeCB	67			108	2.56	0.77	0.857
2,3',4,5' - TeCB	68			99.4	2.63	0.75	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			203	2.77	0.76	0.823
2,3',5',6 - TeCB	73		U		0.264		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			221	3.09	0.77	1.000
3,3',4,5 - TeCB	78		U		2.78		
3,3',4,5' - TeCB	79			59.7	2.30	0.72	0.970
3,3',5,5' - TeCB	80		U		2.60		
3,4,4',5 - TeCB	81		K	16.2	2.80	0.82	1.001
2,2',3,3',4 - PeCB	82			274	4.98	1.62	0.933
2,2',3,3',5 - PeCB	83	83 + 99	C B	12900	4.73	1.57	0.886
2,2',3,3',6 - PeCB	84		B	1100	5.09	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	2860	3.90	1.66	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	5470	3.98	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	1360	4.50	1.58	1.154
2,2',3,4,6' - PeCB	89			22.7	4.96	1.56	1.183
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	13800	4.10	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	3810	4.82	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	7940	4.42	1.58	1.121
2,2',3,5,6' - PeCB	94			20.1	4.81	1.54	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			55.0	0.232	1.58	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			272	4.28	1.57	1.094
2,2',4,0,0' - PeCB	104		J	2.90	0.235	1.40	1.001
2,3,3',4,4' - PeCB	105		B	4650	4.28	1.54	1.000
2,3,3',4,5 - PeCB	106		U		3.63		



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	380	3.95	1.56	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			987	3.60	1.54	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C B	13000	3.29	1.57	0.925
2,3,3',5,5' - PeCB	111			19.3	3.44	1.63	0.945
2,3,3',5,6 - PeCB	112		U		3.34		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			370	4.11	1.52	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		B	15300	3.80	1.55	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			104	3.37	1.66	0.958
2,3',4,5',6 - PeCB	121			9.08	3.57	1.64	1.200
2',3,3',4,5 - PeCB	122		U		3.98		
2',3,4,4',5 - PeCB	123			240	4.33	1.54	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			39.8	4.04	1.58	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	2740	4.69	1.25	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C B	25500	4.66	1.27	0.928
2,2',3,3',4,5' - HxCB	130			732	5.99	1.30	0.913
2,2',3,3',4,6 - HxCB	131			84.4	5.73	1.24	1.159
2,2',3,3',4,6' - HxCB	132		B	2250	5.83	1.27	1.174
2,2',3,3',5,5' - HxCB	133			523	5.48	1.27	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	519	5.61	1.29	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	7300	0.290	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	1490	0.227	1.27	1.024
2,2',3,4,4',5 - HxCB	137			1150	5.43	1.27	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	497	5.11	1.26	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	2780	5.33	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		5.49		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			94.3	0.304	1.27	1.121
2,2',3,4,6,6' - HxCB	145			5.24	0.231	1.25	1.034
2,2',3,4',5,5' - HxCB	146		B	4430	5.00	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	10000	5.30	1.28	1.133
2,2',3,4',5,6' - HxCB	148			56.1	0.300	1.29	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			36.2	0.222	1.26	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152			6.56	0.221	1.31	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	31200	4.16	1.26	0.898
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	3.03	0.193	1.39	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	2000	4.99	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	2430	3.90	1.27	0.937
2,3,3',4,5,5' - HxCB	159			67.0	4.14	1.33	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.99		
2,3,3',4',5,5' - HxCB	162			64.6	4.04	1.24	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			744	4.26	1.28	0.921
2,3,3',5,5',6 - HxCB	165			16.7	4.41	1.23	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	859	3.72	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	3900	0.411	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	1550	0.397	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			667	0.400	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1420	0.370	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			209	0.355	1.08	1.102
2,2',3,3',4,6,6' - HpCB	176			327	0.278	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1630	0.395	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	1320	0.372	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	1550	0.276	1.04	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	11500	0.325	1.04	0.910
2,2',3,4,4',5,6 - HpCB	181			37.2	0.363	1.02	1.157
2,2',3,4,4',5,6' - HpCB	182			62.0	0.364	1.06	1.116
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	4720	0.352	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184			5.11	0.263	1.09	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.285		
2,2',3,4',5,5',6 - HpCB	187		B	7190	0.334	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			13.2	0.239	1.08	1.000
2,3,3',4,4',5,5' - HpCB	189			115	1.11	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	935	0.309	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			224	0.309	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		U.32U		

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T4-M-SF-FL-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-115 P  
 Sample Size: 10.2 g (wet)  
 Initial Calibration Date: 04-Apr-2005  
 Instrument ID: HR GC/MS  
 GC Column ID: DB-1  
 Sample Datafile: DT53\_096 S: 13  
 Blank Data Filename: DT53\_096 S: 5  
 Cal. Ver. Data Filename: DT53\_096 S: 1

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 09-Apr-2005 Time: 5:46:20

Extract Volume (µL): 50

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			21.4	0.327	1.49	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			0.916	0.255	1.05	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	30-Aug-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-115
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 6:00:27	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_136 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_136 S:11 DT53_096 S: 13

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		5.50	0.194
Total Dichloro Biphenyls		480	0.928
Total Trichloro Biphenyls		14500	2.35
Total Tetrachloro Biphenyls		52700	3.09
Total Pentachloro Biphenyls		85000	5.09
Total Hexachloro Biphenyls		98500	5.99
Total Heptachloro Biphenyls		37300	1.11
Total Octachloro Biphenyls		6080	0.359
Total Nonachloro Biphenyls		171	0.129
Decachloro Biphenyl		53.3	0.0489
TOTAL PCBs		295000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S18

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0275



Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.2 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-115  
 GC Column ID(s): SPB-OCTYL  
 DD-1  
 Sample Datafile(s): PB5C\_136 S:11  
 DT53\_096 S: 13

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			221	3.09	0.0001	2.21E-02	2.21E-02
3,4,4',5-TetraCB	81		U		2.80	0.0001	1.40E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			4650	4.28	0.0001	4.65E-01	4.65E-01
2,3,4,4',5-PentaCB	114			370	4.11	0.0005	1.85E-01	1.85E-01
2,3',4,4',5-PentaCB	118			15300	3.80	0.0001	1.53E+00	1.53E+00
2',3,4,4',5-PentaCB	123			240	4.33	0.0001	2.40E-02	2.40E-02
3,3',4,4',5-PentaCB	126			21.4	0.327	0.1	2.14E+00	2.14E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	2000	4.99	0.0005	9.99E-01	9.99E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			859	3.72	0.00001	8.59E-03	8.59E-03
3,3',4,4',5,5'-HexaCB	169			0.916	0.255	0.01	9.16E-03	9.16E-03
2,3,3',4,4',5,5'-HeptaCB	189			115	1.11	0.0001	1.15E-02	1.15E-02
TOTAL TEQ							5.39	5.39

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by:  QA/QC Chemist

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-SC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-125
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 10:24:00	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Sample Data Filename: PB5C_137A S:3
Dilution Factor: N/A	Blank Data Filename: PB5C_135 S:7
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: PB5C_137 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	0.686	0.0707	2.88	1.001
3 - MoCB	2		KJ	0.340	0.0825	2.24	0.988
4 - MoCB	3		J	0.459	0.0875	3.15	1.001
2,2' - DiCB	4			8.51	0.189	1.56	1.001
2,3 - DiCB	5		J	0.222	0.149	1.51	1.198
2,3' - DiCB	6		J	2.23	0.134	1.48	1.176
2,4 - DiCB	7		KJ	0.454	0.130	1.91	1.158
2,4' - DiCB	8		JB	3.16	0.125	1.57	1.207
2,5 - DiCB	9		J	0.849	0.139	1.60	1.146
2,6 - DiCB	10		KJ	0.165	0.138	1.04	1.014
3,3' - DiCB	11		JD	2.40	0.102	1.03	0.900
3,4 - DiCB	12	12 + 13	C J	1.73	0.151	1.43	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.148		
4,4' - DiCB	15		B	314	0.187	1.54	1.000
2,2',3 - TriCB	16		B	21.0	0.0824	1.08	1.166
2,2',4 - TriCB	17		B	56.7	0.0807	1.07	1.138
2,2',5 - TriCB	18	18 + 30	C B	384	0.0666	1.05	1.113
2,2',6 - TriCB	19		J	3.01	0.0916	1.15	1.001
2,3,3' - TriCB	20	20 + 28	C B	3820	0.714	1.04	0.848

15204AD3\_1.xls, S2

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

027

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C U		0.658		
2,3,4' - TriCB	22		B	331	0.774	1.00	0.872
2,3,5 - TriCB	23		U		0.649		
2,3,6 - TriCB	24		J	1.42	0.0553	1.01	1.158
2,3',4 - TriCB	25			33.8	0.585	1.00	0.825
2,3',5 - TriCB	26	26 + 29	C B	233	0.703	1.04	1.301
2,3',6 - TriCB	27			5.58	0.0566	1.08	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	723	0.680	1.04	0.837
2,4',6 - TriCB	32		B	34.7	0.685	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		U		0.747		
3,3',4 - TriCB	35		U		0.783		
3,3',5 - TriCB	36		U		0.707		
3,4,4' - TriCB	37		B	981	0.792	1.04	1.001
3,4,5 - TriCB	38		U		0.690		
3,4',5 - TriCB	39			5.59	0.692	1.03	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	279	0.0984	0.78	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	486	0.0885	0.79	1.313
2,2',3,5 - TeCB	43			154	0.0957	0.78	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	2950	0.0884	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	30.9	0.0973	0.78	1.147
2,2',3,6' - TeCB	46			7.44	0.109	0.81	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	192	0.0933	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	2800	0.0829	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	33.9	0.0951	0.78	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	6250	0.0980	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.0799		
2,3,3',4 - TeCB	55		U		5.32		
2,3,3',4' - TeCB	56		B	869	5.50	0.79	0.905
2,3,3',5 - TeCB	57			13.1	5.24	0.79	0.844
2,3,3',5' - TeCB	58			18.3	5.21	0.78	0.851
2,3,3',6 - TeCB	59	59 + 02 + 75	C	101	0.0750	0.70	1.303
2,3,4,4' - TeCB	60		B	1650	5.30	0.79	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	5200	4.85	0.79	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			248	4.99	0.79	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	836	0.0699	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	5730	5.26	0.80	0.884
2,3',4,5 - TeCB	67			55.2	4.53	0.77	0.857
2,3',4,5' - TeCB	68			26.0	4.86	0.86	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			60.5	4.93	0.78	0.823
2,3',5',6 - TeCB	73		U		0.0782		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			456	5.67	0.79	1.000
3,3',4,5 - TeCB	78		U		5.26		
3,3',4,5' - TeCB	79			101	4.22	0.74	0.970
3,3',5,5' - TeCB	80		U		4.84		
3,4,4',5 - TeCB	81			25.4	5.26	0.74	1.000
2,2',3,3',4 - PeCB	82			426	3.24	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	6940	2.91	1.57	0.886
2,2',3,3',6 - PeCB	84		B	395	3.27	1.55	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1710	2.52	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	4690	2.57	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	762	2.84	1.56	1.154
2,2',3,4,6' - PeCB	89		U		3.10		
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	12700	2.65	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	2150	3.00	1.56	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	3510	2.74	1.56	1.121
2,2',3,5,6' - PeCB	94		J	4.58	2.89	1.58	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		J	2.09	0.141	1.53	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			95.2	2.58	1.57	1.094
2,2',4,6,6' - PeCB	104		J	0.222	0.149	1.34	1.001
2,3,3',4,4' - PeCB	105		B	4380	3.29	1.56	1.000
2,3,3',4,5 - PeCB	106		U		3.07		



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-M-SC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 09-Apr-2005

Extract Volume (µL): 50

Injection Volume (µL): 2.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-125 P

Sample Size: 10.1 g (wet)

Initial Calibration Date: 04-Apr-2005

Instrument ID: HR GC/MS

GC Column ID: DB-1

Sample Datafile: DT53\_096 S: 9

Blank Data Filename: DT53\_096 S: 5

Cal. Ver. Data Filename: DT53\_096 S: 1

Time: 3:07:55

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			23.1	0.654	1.51	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			0.707	0.664	1.33	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-04
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-125
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 10:24:00	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_137A S:3 DT53_096 S: 9

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		1.15	0.0875
Total Dichloro Biphenyls		333	0.189
Total Trichloro Biphenyls		6630	0.792
Total Tetrachloro Biphenyls		28600	5.67
Total Pentachloro Biphenyls		53600	3.56
Total Hexachloro Biphenyls		60900	6.94
Total Heptachloro Biphenyls		21800	0.756
Total Octachloro Biphenyls		2680	0.627
Total Nonachloro Biphenyls		143	0.0959
Decachloro Biphenyl		17.5	0.0493
TOTAL PCBs		175000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S8

Approved by: \_\_\_\_\_



QA/QC Chemist

26-04-2005  
dd-mm-yyyy

0265

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.1 g (wet)  
 Concentration Units: ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-125  
 GC Column ID(s): SPB-OCTYL  
 DR-1  
 Sample Datafile(s): PB5C\_137A S:3  
 DT53\_096 S: 9

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			456	5.67	0.0001	4.56E-02	4.56E-02
3,4,4',5-TetraCB	81			25.4	5.26	0.0001	2.54E-03	2.54E-03
2,3,3',4,4'-PentaCB	105			4380	3.29	0.0001	4.38E-01	4.38E-01
2,3,4,4',5-PentaCB	114			324	3.28	0.0005	1.62E-01	1.62E-01
2,3',4,4',5-PentaCB	118			10800	3.08	0.0001	1.08E+00	1.08E+00
2',3,4,4',5-PentaCB	123			190	3.56	0.0001	1.90E-02	1.90E-02
3,3',4,4',5-PentaCB	126			23.1	0.654	0.1	2.31E+00	2.31E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1650	5.81	0.0005	8.23E-01	8.23E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			636	4.50	0.00001	6.36E-03	6.36E-03
3,3',4,4',5,5'-HexaCB	169			0.707	0.664	0.01	7.07E-03	7.07E-03
2,3,3',4,4',5,5'-HeptaCB	109			95.7	0.756	0.0001	9.57E-03	9.57E-03
TOTAL TEQ							4.91	4.91

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-M-SC-EM-comp-5

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-133
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 11:28:15	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_137A S:4
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		KJB	0.780	0.112	2.43	1.000
3 - MoCB	2		J	0.357	0.129	2.77	0.988
4 - MoCB	3		KJ	0.458	0.135	3.77	1.000
2,2' - DiCB	4			5.06	0.330	1.47	1.001
2,3 - DiCB	5		U		0.257		
2,3' - DiCB	6		J	1.33	0.232	1.33	1.176
2,4 - DiCB	7		KJ	0.440	0.226	1.12	1.158
2,4' - DiCB	8		JB	1.69	0.216	1.50	1.207
2,5 - DiCB	9		KJ	0.490	0.241	1.13	1.145
2,6 - DiCB	10		U		0.238		
3,3' - DiCB	11		JB	2.55	0.280	1.66	0.968
3,4 - DiCB	12	12 + 13	C J	1.49	0.261	1.71	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.256		
4,4' - DiCB	15		B	161	0.323	1.54	1.000
2,2',3 - TriCB	16		B	18.0	0.133	1.08	1.166
2,2',4 - TriCB	17		B	43.1	0.130	1.02	1.139
2,2',5 - TriCB	18	18 + 30	C B	412	0.107	1.04	1.113
2,2',6 - TriCB	19		J	2.57	0.158	1.10	1.001
2,3,3' - TriCB	20	20 + 28	C B	2430	0.906	1.03	0.848

15204AD3\_1.xls, S3

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0267



L7311-133

LDW-T2-M-SC-EM-comp-5

04-08-06-22

PB5C\_137A S:4

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C U		0.834		
2,3,4' - TriCB	22		B	206	0.982	1.05	0.872
2,3,5 - TriCB	23		U		0.824		
2,3,6 - TriCB	24		J	1.11	0.0891	1.03	1.158
2,3',4 - TriCB	25			23.9	0.742	1.05	0.825
2,3',5 - TriCB	26	26 + 29	C B	229	0.891	1.05	1.301
2,3',6 - TriCB	27		J	4.56	0.0913	0.89	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	620	0.863	1.04	0.837
2,4',6 - TriCB	32		B	21.3	0.869	1.06	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		U		0.948		
3,3',4 - TriCB	35		U		0.993		
3,3',5 - TriCB	36		U		0.897		
3,4,4' - TriCB	37		B	623	0.972	1.04	1.001
3,4,5 - TriCB	38		U		0.875		
3,4',5 - TriCB	39			11.3	0.878	0.91	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	293	0.109	0.79	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	528	0.0976	0.79	1.312
2,2',3,5 - TeCB	43			163	0.106	0.79	1.247
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	2980	0.0975	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	35.1	0.107	0.80	1.146
2,2',3,6' - TeCB	46			7.52	0.121	0.81	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	338	0.103	0.79	1.273
2,2',4,5' - TeCB	49	49 + 69	C B	2800	0.0914	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53	C B	44.2	0.105	0.76	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	6200	0.108	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.0960		
2,3,3',4 - TeCB	55		U		5.36		
2,3,3',4' - TeCB	56		B	900	5.55	0.79	0.904
2,3,3',5 - TeCB	57			14.2	5.28	0.78	0.843
2,3,3',5' - TeCB	58			18.6	5.26	0.77	0.851
2,3,3',6 - TeCB	59	59 + 02 + 75	C	187	0.0837	0.70	1.303
2,3,4,4' - TeCB	60		B	1300	5.34	0.79	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	5130	4.89	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			239	5.03	0.77	0.864



COMPOUND	ILIPAC NO.	CO-ELUTIONS	IAR FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,4',6 - TeCB	64		B	899	0.0771	0.79	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	5280	5.30	0.77	0.884
2,3',4,5 - TeCB	67			54.5	4.57	0.76	0.856
2,3',4,5' - TeCB	68			32.7	4.90	0.79	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			83.6	4.97	0.79	0.823
2,3',5',6 - TeCB	73		U		0.0862		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			355	5.58	0.79	1.000
3,3',4,5 - TeCB	78		U		5.30		
3,3',4,5' - TeCB	79			97.0	4.26	0.75	0.970
3,3',5,5' - TeCB	80		U		4.88		
3,4,4',5 - TeCB	81		K	24.9	5.09	0.78	1.000
2,2',3,3',4 - PeCB	82			522	4.05	1.56	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	7360	3.64	1.57	0.885
2,2',3,3',6 - PeCB	84		B	589	4.09	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1770	3.15	1.63	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	5430	3.22	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	906	3.55	1.59	1.154
2,2',3,4,6' - PeCB	89		U		3.88		
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	14200	3.31	1.56	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	2520	3.75	1.56	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	4730	3.43	1.58	1.120
2,2',3,5,6' - PeCB	94			8.84	3.61	1.74	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		J	3.26	0.152	1.55	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			113	3.23	1.62	1.093
2,2',4,6,6' - PeCB	104		J	0.296	0.173	1.64	1.001
2,3,3',4,4' - PeCB	105		B	3980	3.09	1.56	1.000
2,3,3',4,5 - PeCB	106		U		2.90		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C	335	3.29	1.57	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109			666	3.05	1.56	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C B	4520	2.73	1.55	0.925
2,3,3',5,5' - PeCB	111			7.28	2.76	1.34	0.945
2,3,3',5,6' - PeCB	112		U		2.87		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114			314	3.15	1.58	1.000
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		B	11400	2.86	1.57	1.000
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			23.9	2.73	1.54	0.959
2,3',4,5',6' - PeCB	121		U		2.78		
2',3,3',4,5' - PeCB	122			151	3.29	1.58	1.009
2',3,4,4',5' - PeCB	123			210	3.20	1.57	1.001
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		X				
3,3',4,5,5' - PeCB	127			23.8	3.17	1.59	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1780	3.50	1.27	0.958
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C B	16500	3.39	1.26	0.928
2,2',3,3',4,5' - HxCB	130			818	4.40	1.26	0.913
2,2',3,3',4,6' - HxCB	131			109	4.08	1.24	1.158
2,2',3,3',4,6' - HxCB	132		B	1690	4.07	1.25	1.174
2,2',3,3',5,5' - HxCB	133			311	3.89	1.26	1.191
2,2',3,3',5,6' - HxCB	134	134 + 143	C	500	4.06	1.25	1.139
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	4380	0.175	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	510	0.143	1.28	1.023
2,2',3,4,4',5' - HxCB	137			525	3.85	1.25	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C	232	3.57	1.27	1.152
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	1940	3.73	1.26	0.903
2,2',3,4,5,6' - HxCB	142		U		3.94		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144			461	0.180	1.27	1.121
2,2',3,4,6,6' - HxCB	145		U		0.147		
2,2',3,4',5,5' - HxCB	146		B	2970	3.63	1.25	0.884
2,2',3,4',5,6' - HxCB	147	147 + 149	C B	11600	3.57	1.26	1.133
2,2',3,4',5,6' - HxCB	148			23.1	0.187	1.25	1.083
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			21.8	0.133	1.30	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		J	2.93	0.137	1.26	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	15100	3.01	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	2.39	0.143	1.34	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	1620	3.55	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	1180	2.87	1.25	0.938
2,3,3',4,5,5' - HxCB	159			57.5	3.11	1.25	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		2.86		
2,3,3',4',5,5' - HxCB	162			32.4	3.04	1.22	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			744	3.12	1.26	0.921
2,3,3',5,5',6 - HxCB	165			8.86	3.28	1.26	0.878
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	645	2.86	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	1520	0.538	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	844	0.512	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172			307	0.532	1.05	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1190	0.481	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			105	0.457	1.05	1.102
2,2',3,3',4,6,6' - HpCB	176			330	0.354	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1960	0.508	1.05	1.145
2,2',3,3',5,5',6 - HpCB	178		B	914	0.471	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	1000	0.342	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	5590	0.424	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181			18.5	0.475	1.08	1.155
2,2',3,4,4',5,6' - HpCB	182		U		0.455		
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	2200	0.452	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184		J	2.64	0.323	1.00	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.353		
2,2',3,4',5,5',6 - HpCB	187		B	5150	0.421	1.05	1.109
2,2',3,4',5,6,6' - HpCB	188			8.01	0.347	1.05	1.000
2,3,3',4,4',5,5' - HpCB	189			78.8	0.634	1.05	1.000
2,3,3',4,4',5,6 - HpCB	190		B	654	0.412	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			133	0.398	1.05	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.421		



0295

Lab Sample ID: L7311-133

Project No.:

04-08-06-22

Sample Data Filename:

PB5C\_137A S:4

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	331	0.224	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	150	0.244	0.89	0.946
2,2',3,3',4,4',5,6' - OcCB	196		B	229	0.0489	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	77.1	0.0489	0.91	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	459	0.0489	0.91	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	122	0.0489	0.89	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	299	0.0489	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	398	0.0489	0.89	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.227	0.0489	0.99	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	22.5	0.211	0.92	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	47.2	0.0904	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			6.49	0.0668	0.77	1.019
2,2',3,3',4,5,5',6,6' - NoCB	208			19.9	0.0736	0.78	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	6.59	0.0489	0.71	1.001

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-SC-EM-comp-5

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-133 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 4:27:06	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_096 S: 11
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_096 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			20.4	0.352	1.55	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			0.626	0.392	1.21	1.000
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
 HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-04
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-133
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 11:28:15	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s): PB5C_137A S:4 DT53_096 S: 11

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		0.357	0.135
Total Dichloro Biphenyls		173	0.330
Total Trichloro Biphenyls		4650	0.993
Total Tetrachloro Biphenyls		28000	5.58
Total Pentachloro Biphenyls		59800	4.09
Total Hexachloro Biphenyls		63700	4.40
Total Heptachloro Biphenyls		22000	0.634
Total Octachloro Biphenyls		2090	0.244
Total Nonachloro Biphenyl		73.6	0.0904
Decachloro Biphenyl		6.59	0.0489
TOTAL PCBs		180000	

(1) U = Not detected  
 (2) All header information pertains to the initial instrumental analysis of the sample extract.  
 Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.2 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 31-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-133  
 GC Column ID(s): SPB-OCTYL  
 DR-1  
 Sample Datafile(s): PB5C\_137A S:4  
 DT53\_096 S: 11

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			355	5.58	0.0001	3.55E-02	3.55E-02
3,4,4',5-TetraCB	81		U		5.09	0.0001	2.55E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			3980	3.09	0.0001	3.98E-01	3.98E-01
2,3,4,4',5-PentaCB	114			314	3.15	0.0005	1.57E-01	1.57E-01
2,3',4,4',5-PentaCB	118			11400	2.86	0.0001	1.14E+00	1.14E+00
2',3,4,4',5-PentaCB	123			210	3.20	0.0001	2.10E-02	2.10E-02
3,3',4,4',5-PentaCB	126			20.4	0.352	0.1	2.04E+00	2.04E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1620	3.55	0.0005	8.10E-01	8.10E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			645	2.86	0.00001	6.45E-03	6.45E-03
3,3',4,4',5,5'-HexaCB	169			0.626	0.392	0.01	6.26E-03	6.26E-03
2,3,3',4,4',5,5'-HeptaCB	189			70.0	0.034	0.0001	7.88E-03	7.88E-03
TOTAL TEQ							4.62	4.62

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T2-M-SC-EM-comp-6

Lab Name: <b>AXYS ANALYTICAL SERVICES</b>	Sample Collection:	31-Aug-2004
Contract No.: 4033	Project No.:	04-08-06 22
Matrix: TISSUE	Lab Sample ID:	L7311-134
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID:	HR GC/MS
Time: 12:32:31	GC Column ID:	SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename:	PB5C_137A S:5
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)		

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.04	0.148	3.07	1.000
3 - MoCB	2		J	0.417	0.168	3.41	0.988
4 - MoCB	3		J	0.567	0.175	2.93	1.001
2,2' - DiCB	4			13.5	0.386	1.49	1.001
2,3 - DiCB	5		U		0.295		
2,3' - DiCB	6		J	2.92	0.266	1.58	1.176
2,4 - DiCB	7		KJ	0.485	0.259	1.29	1.158
2,4' - DiCB	8		JB	4.21	0.248	1.56	1.207
2,5 - DiCB	9		J	0.722	0.277	1.35	1.145
2,6 - DiCB	10		U		0.274		
3,3' - DiCB	11		JB	2.07	0.322	1.41	0.968
3,4 - DiCB	12	12 + 13	C J	1.79	0.299	1.56	0.984
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.294		
4,4' - DiCB	15		B	192	0.367	1.55	1.001
2,2',3 - TriCB	16		B	38.3	0.171	1.03	1.165
2,2',4 - TriCB	17		B	99.5	0.168	1.06	1.138
2,2',5 - TriCB	18	18 + 30	C B	264	0.136	1.04	1.113
2,2',6 - TriCB	19			9.16	0.196	1.00	1.001
2,3,3' - TriCB	20	20 + 28	C B	1880	0.882	1.04	0.848

15204AD3\_1.xls, S4

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0302

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	121	0.812	1.05	0.858
2,3,4' - TriCB	22		B	206	0.956	1.04	0.872
2,3,5 - TriCB	23		U		0.802		
2,3,6 - TriCB	24		J	1.91	0.115	1.05	1.158
2,3',4 - TriCB	25			44.5	0.722	1.04	0.825
2,3',5 - TriCB	26	26 + 29	C B	237	0.868	1.04	1.300
2,3',6 - TriCB	27			19.5	0.118	1.03	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	595	0.840	1.04	0.837
2,4',6 - TriCB	32		B	99.3	0.846	1.04	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		J	1.89	0.923	0.97	1.273
3,3',4 - TriCB	35		U		0.967		
3,3',5 - TriCB	36		U		0.873		
3,4,4' - TriCB	37		R	463	0.963	1.04	1.001
3,4,5 - TriCB	38		U		0.852		
3,4',5 - TriCB	39			7.94	0.854	0.95	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	402	0.146	0.79	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	316	0.131	0.79	1.313
2,2',3,5 - TeCB	43			102	0.141	0.78	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	1850	0.131	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	72.2	0.144	0.78	1.147
2,2',3,6' - TeCB	46			20.1	0.162	0.75	1.161
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	219	0.138	0.77	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	1990	0.123	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	86.9	0.141	0.78	1.112
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	4440	0.145	0.79	1.235
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.118		
2,3,3',4 - TeCB	55		U		2.83		
2,3,3',4' - TeCB	56		B	594	2.93	0.80	0.905
2,3,3',5 - TeCB	57			14.4	2.78	0.76	0.844
2,3,3',5' - TeCB	58			13.7	2.77	0.73	0.852
2,3,3',6 - TeCB	59	59 + 62 + 75	C	145	0.112	0.79	1.303
2,3,4,4' - TeCB	60		B	855	2.82	0.79	0.912
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	3620	2.58	0.79	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			168	2.65	0.78	0.865



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	583	0.103	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	3560	2.80	0.80	0.885
2,3',4,5 - TeCB	67			44.6	2.41	0.77	0.857
2,3',4,5' - TeCB	68			24.5	2.58	0.87	0.832
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			69.8	2.62	0.83	0.823
2,3',5,6 - TeCB	73		U		0.116		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			251	3.00	0.79	1.000
3,3',4,5 - TeCB	78		U		2.80		
3,3',4,5' - TeCB	79			67.8	2.25	0.74	0.970
3,3',5,5' - TeCB	80		U		2.57		
3,4,4',5 - TeCB	81		K	14.6	2.80	0.80	1.000
2,2',3,3',4 - PeCB	82			302	2.41	1.54	0.933
2,2',3,3',5 - PeCB	83	83 + 99	C B	5120	2.16	1.57	0.885
2,2',3,3',6 - PeCB	84		B	450	2.43	1.57	1.162
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1060	1.87	1.55	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	3470	1.91	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	570	2.11	1.58	1.154
2,2',3,4,6' - PeCB	89			9.99	2.30	1.56	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	10200	1.97	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	1870	2.23	1.57	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	2940	2.03	1.57	1.120
2,2',3,5,6' - PeCB	94			8.81	2.15	1.62	1.101
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			6.03	0.166	1.55	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			68.0	1.92	1.59	1.093
2,2',4,6,6' - PeCB	104		J	0.364	0.177	1.39	1.001
2,3,3',4,4' - PeCB	105		B	2900	2.27	1.56	1.000
2,3,3',4,5 - PeCB	106		U		2.08		



0364

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			15.6	0.169	1.28	1.012
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		J	2.08	0.174	1.20	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	11800	2.49	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	1.34	0.166	1.08	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	1170	3.08	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	713	2.37	1.26	0.938
2,3,3',4,5,5' - HxCB	159			41.7	2.57	1.30	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		2.36		
2,3,3',4',5,5' - HxCB	162			23.7	2.51	1.35	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			527	2.58	1.26	0.921
2,3,3',5,5',6 - HxCB	165		U		2.71		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	457	2.36	1.27	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	1210	0.262	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	623	0.249	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172			235	0.259	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	845	0.234	1.02	1.133
2,2',3,3',4,5',6 - HpCB	175			76.4	0.222	1.04	1.103
2,2',3,3',4,6,6' - HpCB	176			259	0.172	1.05	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1480	0.247	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	712	0.229	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	636	0.166	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	4270	0.206	1.05	0.911
2,2',3,4,4',5,6 - HpCB	181			12.1	0.231	1.02	1.156
2,2',3,4,4',5,6' - HpCB	182		U		0.221		
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	1590	0.220	1.06	1.127
2,2',3,4,4',6,6' - HpCB	184		J	1.99	0.157	1.03	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.172		
2,2',3,4',5,5',6 - HpCB	187		B	3990	0.205	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			6.51	0.162	0.97	1.001
2,3,3',4,4',5,5' - HpCB	189			61.9	0.528	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	456	0.201	1.03	0.947
2,3,3',4,4',5',6 - HpCB	191			89.2	0.194	1.04	0.918
2,3,3',4,5,5',6 - HpCB	192		U		0.205		



0560

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	300	0.360	0.91	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	139	0.393	0.92	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	209	0.0489	0.90	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	70.0	0.0489	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	408	0.0489	0.90	1.114
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	113	0.0489	0.91	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	251	0.0489	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	307	0.0489	0.89	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.177	0.0489	0.81	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	17.7	0.335	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	43.9	0.0676	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			6.59	0.0513	0.74	1.019
2,2',3,3',4,5,5',6,6' - NoCB	208			16.8	0.0579	0.84	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	5.62	0.0489	0.73	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T2-M-SC-EM-comp-6

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-134 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.2 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 1:48:45	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_096 S: 7
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_096 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			13.2	0.572	1.69	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		0.378		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name:	AXYS ANALYTICAL SERVICES	Sample Collection:	31-Aug-04
Contract No.:	4033	Project No.:	04-08-06-22
Matrix:	TISSUE	Lab Sample ID:	L7311-134
Sample Receipt Date:	26-Oct-2004	Sample Size:	10.2 g (wet)
Extraction Date:	02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date:	15-Mar-2005	Instrument ID:	HR GC/MS
	Time: 12:32:31	GC Column ID:	SPB-OCTYL
Extract Volume (µL):	50	Blank Data Filename:	PB5C_135 S:7
Injection Volume (µL):	1.0	Cal. Ver. Data Filename:	PB5C_137 S:1
Dilution Factor:	N/A	Sample Datafile(s):	PB5C_137A S:5 DT53_096 S: 7
Concentration Units :	ng/kg (wet weight basis)		

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		2.02	0.175
Total Dichloro Biphenyls		217	0.386
Total Trichloro Biphenyls		4090	0.967
Total Tetrachloro Biphenyls		19500	3.00
Total Pentachloro Biphenyls		41400	2.43
Total Hexachloro Biphenyls		46000	3.64
Total Heptachloro Biphenyls		16500	0.528
Total Octachloro Biphenyls		1810	0.393
Total Nonachloro Biphenyls		67.3	0.0676
Decachloro Biphenyl		5.62	0.0489
TOTAL PCBs		130000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.2 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 31-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-134  
 GC Column ID(s): SPB-OCTYL  
 DB 1  
 Sample Datafile(s): PB5C\_137A S:5  
 DT53\_096 S: 7

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			251	3.00	0.0001	2.51E-02	2.51E-02
3,4,4',5-TetraCB	81		U		2.80	0.0001	1.40E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			2900	2.27	0.0001	2.90E-01	2.90E-01
2,3,4,4',5-PentaCB	114			238	2.30	0.0005	1.19E-01	1.19E-01
2,3',4,4',5-PentaCB	118			7980	2.09	0.0001	7.98E-01	7.98E-01
2',3,4,4',5-PentaCB	123			146	2.30	0.0001	1.46E-02	1.46E-02
3,3',4,4',5-PentaCB	126			13.2	0.572	0.1	1.32E+00	1.32E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1170	3.08	0.0005	5.83E-01	5.83E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			457	2.36	0.00001	4.57E-03	4.57E-03
3,3',4,4',5,5'-HexaCB	169		U		0.378	0.01	1.89E-03	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			61.9	0.528	0.0001	6.19E-03	6.19E-03
TOTAL TEQ							3.17	3.17

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-M-SC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 15-Mar-2005

Time: 13:36:52

Extract Volume (µL): 50

Injection Volume (µL): 1.0

Dilution Factor: N/A

Concentration Units: ng/kg (wet weight basis)

Sample Collection: 03-Sep-2004

Project No.: 04 08 06 22

Lab Sample ID: L7311-137

Sample Size: 10.0 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_137A S:6

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_137 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	0.695	0.0995	2.80	1.001
3 - MoCB	2		KJ	0.354	0.117	2.20	0.988
4 - MoCB	3		KJ	0.401	0.125	3.73	1.000
2,2' - DiCB	4			5.02	0.397	1.50	1.001
2,3 - DiCB	5		U		0.343		
2,3' - DiCB	6		J	1.79	0.309	1.36	1.176
2,4 - DiCB	7		KJ	0.391	0.300	1.22	1.158
2,4' - DiCB	8		JB	2.26	0.288	1.42	1.207
2,5 - DiCB	9		KJ	0.515	0.321	1.01	1.145
2,6 - DiCB	10		U		0.317		
3,3' - DiCB	11		JB	3.43	0.373	1.36	0.968
3,4 - DiCB	12	12 + 13	C J	1.64	0.347	1.43	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.341		
4,4' - DiCB	15		B	132	0.457	1.54	1.000
2,2',3 - TriCB	16		B	15.3	0.170	1.02	1.166
2,2',4 - TriCB	17		B	46.9	0.166	1.05	1.138
2,2',5 - TriCB	18	18 + 30	C B	229	0.137	1.04	1.113
2,2',6 - TriCB	19		J	3.16	0.179	1.12	1.001
2,3,3' - TriCB	20	20 + 28	C B	1850	0.927	1.04	0.848

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C U		0.854		
2,3,4' - TriCB	22		B	183	1.00	1.03	0.872
2,3,5 - TriCB	23		U		0.843		
2,3,6 - TriCB	24		J	1.34	0.114	0.98	1.158
2,3',4 - TriCB	25			54.8	0.759	1.04	0.825
2,3',5 - TriCB	26	26 + 29	C B	340	0.912	1.04	1.301
2,3',6 - TriCB	27			7.13	0.117	1.03	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	613	0.883	1.05	0.837
2,4',6 - TriCB	32		B	37.4	0.889	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		U		0.970		
3,3',4 - TriCB	35		U		1.02		
3,3',5 - TriCB	36		U		0.918		
3,4,4' - TriCB	37		R	415	1.06	1.04	1.001
3,4,5 - TriCB	38		U		0.895		
3,4',5 - TriCB	39			6.06	0.898	1.15	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	232	0.151	0.78	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	274	0.136	0.79	1.312
2,2',3,5 - TeCB	43		U		0.147		
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	1980	0.135	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	37.8	0.149	0.78	1.147
2,2',3,6' - TeCB	46			11.0	0.168	0.79	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	174	0.143	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	2720	0.127	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	55.2	0.146	0.77	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	5180	0.150	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.116		
2,3,3',4 - TeCB	55		U		5.31		
2,3,3',4' - TeCB	56		B	549	5.50	0.80	0.904
2,3,3',5 - TeCB	57			18.0	5.23	0.72	0.844
2,3,3',5' - TeCB	58			16.3	5.21	0.76	0.851
2,3,3',6 - TeCB	59	59 + 62 + 75	C	144	0.116	0.79	1.303
2,3,4,4' - TeCB	60		B	792	5.29	0.80	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	3860	4.85	0.79	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			170	4.99	0.79	0.864



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	591	0.107	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	3400	5.25	0.79	0.884
2,3',4,5 - TeCB	67			51.6	4.52	0.81	0.856
2,3',4,5' - TeCB	68			46.1	4.86	0.80	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			107	4.93	0.76	0.823
2,3',5',6 - TeCB	73		U		0.120		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			232	5.87	0.78	1.000
3,3',4,5 - TeCB	78		U		5.26		
3,3',4,5' - TeCB	79			69.5	4.22	0.73	0.970
3,3',5,5' - TeCB	80		U		4.84		
3,4,4',5 - TeCB	81		K	12.8	5.31	0.74	1.000
2,2',3,3',4 - PeCB	82			338	2.38	1.60	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	5510	2.14	1.56	0.886
2,2',3,3',6 - PeCB	84		B	486	2.41	1.55	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	1270	1.85	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	4000	1.89	1.57	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	744	2.09	1.55	1.155
2,2',3,4,6' - PeCB	89		J	4.35	2.28	1.58	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	11100	1.95	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	2170	2.21	1.56	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	3560	2.02	1.56	1.121
2,2',3,5,6' - PeCB	94			8.51	2.13	1.47	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96			5.36	0.193	1.48	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			87.6	1.90	1.59	1.094
2,2',4,6,6' - PeCB	104		KJ	0.287	0.190	1.27	1.001
2,3,3',4,4' - PeCB	105		B	3020	3.27	1.56	1.001
2,3,3',4,5 - PeCB	106		U		2.96		



COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	261	3.36	1.57	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			597	3.12	1.54	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C B	3570	1.61	1.58	0.925
2,3,3',5,5' - PeCB	111			7.54	1.62	1.66	0.945
2,3,3',5,6 - PeCB	112		U		1.69		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			244	3.34	1.58	1.000
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		B	9160	2.92	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			23.2	1.60	1.61	0.959
2,3',4,5',6 - PeCB	121		U		1.63		
2',3,3',4,5 - PeCB	122			115	3.36	1.60	1.010
2',3,4,4',5 - PeCB	123			155	3.40	1.63	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			21.6	3.24	1.56	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1330	4.33	1.28	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C B	11400	4.19	1.26	0.928
2,2',3,3',4,5' - HxCB	130			613	5.45	1.27	0.913
2,2',3,3',4,6 - HxCB	131			67.4	5.05	1.28	1.159
2,2',3,3',4,6' - HxCB	132		B	1430	5.04	1.26	1.174
2,2',3,3',5,5' - HxCB	133			254	4.81	1.26	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	345	5.03	1.24	1.140
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	3040	0.237	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	434	0.194	1.29	1.024
2,2',3,4,4',5 - HxCB	137			395	4.76	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	162	4.42	1.28	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	1840	4.61	1.27	0.904
2,2',3,4,5,6 - HxCB	142		U		4.87		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			311	0.244	1.26	1.121
2,2',3,4,6,6' - HxCB	145		U		0.200		
2,2',3,4',5,5' - HxCB	146		B	2230	4.50	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	8010	4.42	1.26	1.133
2,2',3,4',5,6' - HxCB	148			22.7	0.254	1.30	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			14.9	0.180	1.28	1.013
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		J	3.01	0.186	1.28	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	10700	3.73	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	1.33	0.174	1.23	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	1180	4.51	1.26	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	939	3.55	1.26	0.938
2,3,3',4,5,5' - HxCB	159			49.8	3.85	1.27	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.54		
2,3,3',4',5,5' - HxCB	162			20.5	3.76	1.24	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			649	3.86	1.27	0.921
2,3,3',5,5',6 - HxCB	165		U		4.06		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	432	3.56	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	1170	0.424	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	548	0.404	1.04	1.162
2,2',3,3',4,5,5' - HpCB	172			262	0.420	1.02	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1090	0.379	1.04	1.133
2,2',3,3',4,5',6 - HpCB	175			72.7	0.361	1.02	1.103
2,2',3,3',4,6,6' - HpCB	176			225	0.279	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	1240	0.400	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	617	0.371	1.05	1.085
2,2',3,3',5,6,6' - HpCB	179		B	673	0.269	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	4100	0.334	1.04	0.910
2,2',3,4,4',5,6 - HpCB	181			14.8	0.375	0.89	1.156
2,2',3,4,4',5,6' - HpCB	182		U		0.359		
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	1430	0.356	1.05	1.127
2,2',3,4,4',6,6' - HpCB	184		J	1.88	0.255	1.04	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.279		
2,2',3,4',5,5',6 - HpCB	187		B	3430	0.332	1.05	1.110
2,2',3,4',5,6,6' - HpCB	188			5.60	0.265	1.03	1.000
2,3,3',4,4',5,5' - HpCB	189			54.4	0.773	1.01	1.000
2,3,3',4,4',5,6 - HpCB	190		B	459	0.325	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			98.5	0.314	1.01	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.332		



0519

COMPOUND	IUPAC NO.	CO ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	266	0.326	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	128	0.355	0.88	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	206	0.0500	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	61.8	0.0500	0.90	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	424	0.0500	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	78.5	0.0500	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	190	0.0500	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	317	0.0500	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.186	0.0500	0.97	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	18.3	0.309	0.91	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	41.6	0.108	0.78	1.001
2,2',3,3',4,4',5,6,6' - NoCB	207			5.64	0.0797	0.80	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			15.2	0.0878	0.78	1.001
2,2',3,3',4,4',5,5',6,6' - DeCB	209		JB	4.40	0.0500	0.79	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-SC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 03-Sep-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-137 PL i
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.0 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 16-Apr-2005 Time: 14:35:39	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_108B S: 12
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_108B S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			12.6	2.62	1.48	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		0.848		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; R = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	03-Sep-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-137
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.0 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 13:36:52	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_137A S:6 DT53_108B S: 12

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		0.695	0.125
Total Dichloro Biphenyls		146	0.457
Total Trichloro Biphenyls		3800	1.06
Total Tetrachloro Biphenyls		20700	5.87
Total Pentachloro Biphenyls		46500	3.40
Total Hexachloro Biphenyls		45800	5.45
Total Heptachloro Biphenyls		15500	0.773
Total Octachloro Biphenyls		1690	0.355
Total Nonachloro Biphenyls		62.4	0.108
Decachloro Biphenyl		4.40	0.0500
TOTAL PCBs		134000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.



Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES

Sample Collection: 03-Sep-2004

Contract No.: 4033

Project No.: 04-08-06-22

Matrix: TISSUE

Lab Sample ID: L7311-137

Sample Size: 10.0 g (wet)

GC Column ID(s): SPB-OCTYL

Concentration Units : ng/kg (wet weight basis)

Sample Datafile(s): DB-1  
 PB5C\_137A S:6  
 DT53\_108B S: 12

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			232	5.87	0.0001	2.32E-02	2.32E-02
3,4,4',5-TetraCB	81		U		5.31	0.0001	2.65E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			3020	3.27	0.0001	3.02E-01	3.02E-01
2,3,4,4',5-PentaCB	114			244	3.34	0.0005	1.22E-01	1.22E-01
2,3',4,4',5-PentaCB	118			9160	2.92	0.0001	9.16E-01	9.16E-01
2',3,4,4',5-PentaCB	123			155	3.40	0.0001	1.55E-02	1.55E-02
3,3',4,4',5-PentaCB	126			12.6	2.62	0.1	1.26E+00	1.26E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1180	4.51	0.0005	5.90E-01	5.90E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			432	3.56	0.00001	4.32E-03	4.32E-03
3,3',4,4',5,5'-HexaCB	169		U		0.848	0.01	4.24E-03	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			54.4	0.773	0.0001	5.44E-03	5.44E-03
TOTAL TEQ							3.25	3.24

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by:  QA/QC Chemist

0525

Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T1-M-DC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04 08 06 22
Matrix: TISSUE	Lab Sample ID: L7311-149
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 14:41:09	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_137A S:7
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.11	0.141	3.23	1.001
3 - MoCB	2		J	0.452	0.174	2.95	0.988
4 - MoCB	3		J	1.20	0.195	3.00	1.000
2,2' - DiCB	4			8.60	0.469	1.53	1.001
2,3 - DiCB	5		J	0.991	0.408	1.67	1.196
2,3' - DiCB	6			14.6	0.368	1.56	1.176
2,4 - DiCB	7		J	1.75	0.358	1.64	1.158
2,4' - DiCB	8		B	37.6	0.343	1.55	1.207
2,5 - DiCB	9		J	2.02	0.383	1.35	1.145
2,6 - DiCB	10		KJ	0.494	0.379	0.98	1.013
3,3' - DiCB	11		B	6.33	0.445	1.64	0.968
3,4 - DiCB	12	12 + 13	C J	9.33	0.414	1.55	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.407		
4,4' - DiCB	15		B	226	0.548	1.56	1.000
2,2',3 - TriCB	16		B	42.5	0.131	1.05	1.166
2,2',4 - TriCB	17		B	68.5	0.129	1.07	1.138
2,2',5 - TriCB	18	18 + 30	C B	201	0.100	1.05	1.113
2,2',6 - TriCB	19		J	3.14	0.146	1.08	1.001
2,3,3' - TriCB	20	20 + 28	C B	2510	1.54	1.03	0.848

15204AD3\_1.xls, S6

Approved by:  QA/QC Chemist

25-04-2005  
 dd-mm-yyyy

0320

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	298	1.42	0.98	0.858
2,3,4' - TriCB	22		B	361	1.67	1.02	0.872
2,3,5 - TriCB	23		U		1.40		
2,3,6 - TriCB	24		J	3.18	0.0881	1.01	1.158
2,3',4 - TriCB	25			57.2	1.26	1.06	0.825
2,3',5 - TriCB	26	26 + 29	C B	129	1.52	1.02	1.301
2,3',6 - TriCB	27			25.5	0.0903	1.07	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	1330	1.47	1.03	0.837
2,4',6 - TriCB	32		B	75.6	1.48	1.03	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		J	2.79	1.61	1.09	1.274
3,3',4 - TriCB	35			5.36	1.69	1.14	0.985
3,3',5 - TriCB	36		U		1.53		
3,4,4' - TriCB	37		B	725	1.71	1.04	1.001
3,4,5 - TriCB	38		U		1.49		
3,4',5 - TriCB	39		J	4.61	1.49	1.19	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	344	0.145	0.78	1.336
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	237	0.131	0.80	1.313
2,2',3,5 - TeCB	43			83.3	0.141	0.79	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	1370	0.130	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	41.8	0.144	0.78	1.146
2,2',3,6' - TeCB	46			8.92	0.161	0.74	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	159	0.138	0.79	1.274
2,2',4,5' - TeCB	49	49 + 69	C B	1050	0.122	0.79	1.260
2,2',4,6 - TeCB	50	50 + 53	C B	42.4	0.140	0.77	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	2360	0.145	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.124		
2,3,3',4 - TeCB	55		U		3.29		
2,3,3',4' - TeCB	56		B	526	3.40	0.79	0.904
2,3,3',5 - TeCB	57			8.80	3.24	0.79	0.844
2,3,3',5' - TeCB	58			9.47	3.22	0.77	0.851
2,3,3',6 - TeCB	59	59 + 02 + 75	C	140	0.112	0.00	1.303
2,3,4,4' - TeCB	60		B	973	3.27	0.80	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	5900	3.00	0.79	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			143	3.09	0.79	0.864

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	732	0.103	0.79	1.349
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	4790	3.25	0.79	0.884
2,3',4,5 - TeCB	67			35.0	2.80	0.77	0.856
2,3',4,5' - TeCB	68			15.1	3.00	0.83	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			35.1	3.05	0.80	0.823
2,3',5,6 - TeCB	73		U		0.115		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			218	3.42	0.78	1.000
3,3',4,5 - TeCB	78		U		3.25		
3,3',4,5' - TeCB	79			64.7	2.61	0.75	0.970
3,3',5,5' - TeCB	80		U		2.99		
3,4,4',5 - TeCB	81		K	9.49	3.20	0.79	1.000
2,2',3,3',4 - PeCB	82			227	2.57	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	3980	2.31	1.57	0.886
2,2',3,3',6 - PeCB	84		B	403	2.59	1.57	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	868	1.99	1.57	0.920
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	2530	2.04	1.56	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	393	2.25	1.54	1.155
2,2',3,4,6' - PeCB	89			5.10	2.46	1.42	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	6430	2.10	1.57	0.870
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	962	2.38	1.56	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	1840	2.17	1.58	1.121
2,2',3,5,6' - PeCB	94			5.35	2.29	1.73	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		J	1.98	0.184	1.64	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			47.6	2.04	1.59	1.094
2,2',4,6,6' - PeCB	104		U		0.197		
2,3,3',4,4' - PeCB	105		B	2270	2.97	1.55	1.001
2,3,3',4,5 - PeCB	106		U		2.60		



0536

COMPOUND	IUPAC NO.	CO-FILTRATIONS	IAR FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5' - PeCB	107	107 + 124	C	153	2.95	1.58	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6' - PeCB	109			404	2.74	1.57	0.997
2,3,3',4',6' - PeCB	110	110 + 115	C B	3910	1.73	1.56	0.925
2,3,3',5,5' - PeCB	111		J	4.01	1.75	1.73	0.945
2,3,3',5,6' - PeCB	112		U		1.82		
2,3,3',5',6' - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5' - PeCB	114			178	2.89	1.57	1.000
2,3,4,4',6' - PeCB	115	110 + 115	C110				
2,3,4,5,6' - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6' - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5' - PeCB	118		B	6330	2.50	1.56	1.000
2,3',4,4',6' - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			5.69	1.73	1.61	0.959
2,3',4,5',6' - PeCB	121		U		1.76		
2',3,3',4,5' - PeCB	122			81.5	2.95	1.59	1.010
2',3,4,4',5' - PeCB	123			89.9	2.82	1.48	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5' - PeCB	126		X				
3,3',4,5,5' - PeCB	127			16.2	2.84	1.59	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1080	3.90	1.27	0.958
2,2',3,3',4,5' - HxCB	129	129 + 138 + 160 + 163	C B	9380	3.77	1.26	0.928
2,2',3,3',4,5' - HxCB	130			409	4.90	1.26	0.913
2,2',3,3',4,6' - HxCB	131			57.0	4.55	1.22	1.159
2,2',3,3',4,6' - HxCB	132		B	1060	4.53	1.28	1.174
2,2',3,3',5,5' - HxCB	133			148	4.33	1.29	1.191
2,2',3,3',5,6' - HxCB	134	134 + 143	C	247	4.52	1.32	1.140
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	2180	0.219	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	329	0.180	1.28	1.024
2,2',3,4,4',5' - HxCB	137			280	4.28	1.25	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6' - HxCB	139	139 + 140	C	94.7	3.98	1.21	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	1200	4.15	1.27	0.903
2,2',3,4,5,6' - HxCB	142		U		4.38		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6' - HxCB	144			240	0.226	1.28	1.121
2,2',3,4,6,6' - HxCB	145		U		0.185		
2,2',3,4',5,5' - HxCB	146		B	1480	4.04	1.26	0.884
2,2',3,4',5,6' - HxCB	147	147 + 149	C B	5940	3.97	1.26	1.133
2,2',3,4',5,6' - HxCB	148			9.13	0.235	1.28	1.084
2,2',3,4',5',6' - HxCB	149	147 + 149	C147				

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			9.05	0.167	1.25	1.013
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		J	1.78	0.172	1.24	1.006
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	10400	3.35	1.27	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	0.760	0.167	1.23	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	866	4.08	1.28	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	758	3.19	1.28	0.938
2,3,3',4,5,5' - HxCB	159			53.3	3.47	1.35	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		3.18		
2,3,3',4',5,5' - HxCB	162			21.7	3.38	1.21	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			446	3.47	1.26	0.921
2,3,3',5,5',6 - HxCB	165		U		3.65		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	352	3.04	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	1510	0.444	1.05	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	571	0.423	1.05	1.162
2,2',3,3',4,5,5' - HpCB	172			268	0.439	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	1060	0.397	1.05	1.133
2,2',3,3',4,5',6 - HpCB	175			59.4	0.377	1.04	1.103
2,2',3,3',4,6,6' - HpCB	176			189	0.292	1.06	1.034
2,2',3,3',4',5,6 - HpCB	177		B	901	0.419	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	479	0.389	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	639	0.282	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	4100	0.350	1.04	0.910
2,2',3,4,4',5,6 - HpCB	181			9.66	0.392	1.01	1.156
2,2',3,4,4',5,6' - HpCB	182		U		0.376		
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	1450	0.373	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184		J	1.31	0.267	1.06	1.025
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.292		
2,2',3,4',5,5',6 - HpCB	187		B	2800	0.347	1.05	1.110
2,2',3,4',5,6,6' - HpCB	100		J	4.67	0.286	1.10	1.000
2,3,3',4,4',5,5' - HpCB	189			57.7	0.608	1.03	1.000
2,3,3',4,4',5,6 - HpCB	190		B	374	0.340	1.04	0.947
2,3,3',4,4',5',6 - HpCB	191			87.9	0.329	1.03	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.347		

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T1-M-DC-EM-comp-2

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-149 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 2:28:17	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_096 S: 8
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: U153_096 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			10.6	1.29	1.57	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		0.854		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T3-M-DC-EM-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-00-06-22
Matrix: TISSUE	Lab Sample ID: L7311-152
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 01-Mar-2005
Analysis Date: 15-Mar-2005	Instrument ID: HR GC/MS
Time: 15:45:26	GC Column ID: SPB-OCTYL
Extract Volume (µL): 50	Sample Data Filename: PB5C_137A S:8
Injection Volume (µL): 1.0	Blank Data Filename: PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename: PB5C_137 S:1
Concentration Units: ng/kg (wet weight basis)	

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.97	0.141	3.06	1.000
3 - MoCB	2		J	0.634	0.177	3.22	0.988
4 - MoCB	3		J	1.60	0.203	3.21	1.001
2,2' - DiCB	4			15.4	0.421	1.55	1.001
2,3 - DiCB	5		J	2.22	0.389	1.63	1.198
2,3' - DiCB	6			39.8	0.351	1.53	1.176
2,4 - DiCB	7		J	3.17	0.341	1.60	1.158
2,4' - DiCB	8		B	59.0	0.327	1.60	1.207
2,5 - DiCB	9		J	2.89	0.365	1.77	1.145
2,6 - DiCB	10		J	1.20	0.360	1.74	1.014
3,3' - DiCB	11		B	8.84	0.424	1.54	0.968
3,4 - DiCB	12	12 + 13	C	16.0	0.394	1.51	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.387		
4,4' - DiCB	15		B	322	0.543	1.54	1.000
2,2',3 - TriCB	16		B	68.0	0.173	1.05	1.166
2,2',4 - TriCB	17		B	110	0.170	1.05	1.139
2,2',5 - TriCB	18	16 + 30	C B	289	0.140	1.05	1.113
2,2',6 - TriCB	19			5.36	0.174	1.11	1.001
2,3,3' - TriCB	20	20 + 28	C B	3210	1.44	1.04	0.848

15204AD3\_1.xls. S7

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

0341



Form 1A  
 PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
 LDW-T3-M-DC-EM-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 30-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-152 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 3:47:36	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_096 S: 10
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units : ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_096 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			12.4	0.556	1.57	1.001
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169		U		0.391		
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204cAD1\_1.xls, S7

Approved by: \_\_\_\_\_



QA/QC Chemist

22-04-2005  
 dd-mm-yyyy

0542

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	30-Aug-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-152
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.1 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 15:45:26	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_137A S:8 DT53_096 S: 10

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		4.20	0.203
Total Dichloro Biphenyls		471	0.543
Total Trichloro Biphenyls		8080	1.69
Total Tetrachloro Biphenyls		25300	11.4
Total Pentachloro Biphenyls		44200	5.35
Total Hexachloro Biphenyls		48600	6.32
Total Heptachloro Biphenyls		19500	0.864
Total Octachloro Biphenyls		2950	0.321
Total Nonachloro Biphenyls		169	0.0890
Decachloro Biphenyl		11.8	0.0496
TOTAL PCBs		149000	

(1) U = Not detected  
(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1C  
 PCB CONGENER TEQ ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES  
 Contract No.: 4033  
 Matrix: TISSUE  
 Sample Size: 10.1 g (wet)  
 Concentration Units : ng/kg (wet weight basis)

Sample Collection: 30-Aug-2004  
 Project No.: 04-08-06-22  
 Lab Sample ID: L7311-152  
 GC Column ID(s): SPB-OCTYL  
 DB-1  
 Sample Datafile(s): PB5C\_137A S:8  
 DT53\_096 S: 10

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	WHO 1998 TEF	TEQ	
							U=1/2 DL	U=0
3,3',4,4'-TetraCB	77			217	5.40	0.0001	2.17E-02	2.17E-02
3,4,4',5-TetraCB	81		U		11.4	0.0001	5.70E-04	0.00E+00
2,3,3',4,4'-PentaCB	105			2630	3.49	0.0001	2.63E-01	2.63E-01
2,3,4,4',5-PentaCB	114			211	3.33	0.0005	1.06E-01	1.06E-01
2,3',4,4',5-PentaCB	118			8040	3.18	0.0001	8.04E-01	8.04E-01
2',3,4,4',5-PentaCB	123			114	3.45	0.0001	1.14E-02	1.14E-02
3,3',4,4',5-PentaCB	126			12.4	0.556	0.1	1.24E+00	1.24E+00
2,3,3',4,4',5-HexaCB	156	156 + 157	C	1110	5.45	0.0005	5.56E-01	5.56E-01
2,3,3',4,4',5'-HexaCB	157	156 + 157	C156					
2,3',4,4',5,5'-HexaCB	167			425	4.08	0.00001	4.25E-03	4.25E-03
3,3',4,4',5,5'-HexaCB	169		U		0.391	0.01	1.95E-03	0.00E+00
2,3,3',4,4',5,5'-HeptaCB	189			00.4	0.004	0.0001	0.04E-03	0.04E-03
TOTAL TEQ							3.01	3.01

(1) C = co-eluting congener; U = not detected  
 (2) Concentrations that do not meet quantification criteria are not included in the TEQ calculations.  
 These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
PCB CONGENER ANALYSIS REPORT

CLIENT ID:  
LDW-T4-M-DC-EM-comp-1

Lab Name: AXYS ANALYTICAL SERVICES

Contract No.: 4033

Matrix: TISSUE

Sample Receipt Date: 26-Oct-2004

Extraction Date: 02-Mar-2005

Analysis Date: 15-Mar-2005

Time: 16:49:49

Extract Volume (µL): 50

Injection Volume (µL): 1.0

Dilution Factor: N/A

Concentration Units : ng/kg (wet weight basis)

Sample Collection: 31-Aug-2004

Project No.: 04-08-06-22

Lab Sample ID: L7311-156

Sample Size: 10.3 g (wet)

Initial Calibration Date: 01-Mar-2005

Instrument ID: HR GC/MS

GC Column ID: SPB-OCTYL

Sample Data Filename: PB5C\_137A S:9

Blank Data Filename: PB5C\_135 S:7

Cal. Ver. Data Filename: PB5C\_137 S:1

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2 - MoCB	1		JB	1.35	0.149	3.07	1.000
3 - MoCB	2		J	0.504	0.170	3.54	0.988
4 - MoCB	3		J	1.14	0.176	3.30	1.000
2,2' - DiCB	4			7.04	0.369	1.52	1.001
2,3 - DiCB	5		J	0.626	0.293	1.61	1.196
2,3' - DiCB	6			16.4	0.264	1.54	1.176
2,4 - DiCB	7		J	1.09	0.257	1.50	1.158
2,4' - DiCB	8		B	26.4	0.246	1.56	1.207
2,5 - DiCB	9		J	1.48	0.275	1.49	1.145
2,6 - DiCB	10		J	0.507	0.272	1.37	1.013
3,3' - DiCB	11		B	7.49	0.319	1.56	0.967
3,4 - DiCB	12	12 + 13	C	10.7	0.297	1.47	0.983
3,4' - DiCB	13	12 + 13	C12				
3,5 - DiCB	14		U		0.292		
4,4' - DiCB	15		B	193	0.372	1.55	1.000
2,2',3 - TriCB	16		B	22.4	0.165	1.07	1.166
2,2',4 - TriCB	17		B	40.8	0.162	1.06	1.139
2,2',5 - TriCB	18	10 + 30	C D	114	0.134	1.06	1.113
2,2',6 - TriCB	19		J	4.42	0.193	1.14	1.001
2,3,3' - TriCB	20	20 + 28	C B	1710	0.876	1.04	0.848

15204AD3\_1.xls, S8

Approved by:  QA/QC Chemist

25-04-2005  
dd-mm-yyyy

055

COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4 - TriCB	21	21 + 33	C B	184	0.807	1.03	0.858
2,3,4' - TriCB	22		B	233	0.949	1.03	0.872
2,3,5 - TriCB	23		U		0.797		
2,3,6 - TriCB	24		J	2.40	0.111	1.03	1.158
2,3',4 - TriCB	25			98.0	0.718	1.04	0.824
2,3',5 - TriCB	26	26 + 29	C B	195	0.862	1.04	1.301
2,3',6 - TriCB	27			26.4	0.114	1.07	1.150
2,4,4' - TriCB	28	20 + 28	C20				
2,4,5 - TriCB	29	26 + 29	C26				
2,4,6 - TriCB	30	18 + 30	C18				
2,4',5 - TriCB	31		B	825	0.834	1.04	0.837
2,4',6 - TriCB	32		B	71.6	0.840	1.02	1.197
2',3,4 - TriCB	33	21 + 33	C21				
2',3,5 - TriCB	34		J	2.77	0.917	1.06	1.274
3,3',4 - TriCB	35		J	3.69	0.961	1.01	0.985
3,3',5 - TriCB	36		U		0.868		
3,4,4' - TriCB	37		R	448	0.952	1.02	1.000
3,4,5 - TriCB	38		U		0.846		
3,4',5 - TriCB	39		J	2.38	0.849	1.01	0.946
2,2',3,3' - TeCB	40	40 + 41 + 71	C B	249	0.147	0.79	1.337
2,2',3,4 - TeCB	41	40 + 41 + 71	C40				
2,2',3,4' - TeCB	42		B	186	0.132	0.77	1.312
2,2',3,5 - TeCB	43			72.4	0.143	0.78	1.248
2,2',3,5' - TeCB	44	44 + 47 + 65	C B	1270	0.132	0.79	1.286
2,2',3,6 - TeCB	45	45 + 51	C	33.8	0.145	0.78	1.147
2,2',3,6' - TeCB	46			10.8	0.163	0.80	1.160
2,2',4,4' - TeCB	47	44 + 47 + 65	C44				
2,2',4,5 - TeCB	48		B	87.6	0.139	0.78	1.273
2,2',4,5' - TeCB	49	49 + 69	C B	781	0.124	0.79	1.259
2,2',4,6 - TeCB	50	50 + 53	C B	51.2	0.142	0.80	1.111
2,2',4,6' - TeCB	51	45 + 51	C45				
2,2',5,5' - TeCB	52		B	2870	0.146	0.79	1.234
2,2',5,6' - TeCB	53	50 + 53	C50				
2,2',6,6' - TeCB	54		U		0.132		
2,3,3',4 - TeCB	55		U		2.33		
2,3,3',4' - TeCB	56		B	392	2.41	0.78	0.904
2,3,3',5 - TeCB	57			12.0	2.30	0.76	0.843
2,3,3',5' - TeCB	58			16.1	2.29	0.77	0.851
2,3,3',b - TeCB	59	59 + 62 + 75	C	117	0.113	0.79	1.302
2,3,4,4' - TeCB	60		B	524	2.32	0.79	0.911
2,3,4,5 - TeCB	61	61 + 70 + 74 + 76	C B	4380	2.13	0.77	0.876
2,3,4,6 - TeCB	62	59 + 62 + 75	C59				
2,3,4',5 - TeCB	63			99.6	2.19	0.76	0.864



0355

COMPOUND	IUPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,3,4',6 - TeCB	64		B	507	0.104	0.79	1.348
2,3,5,6 - TeCB	65	44 + 47 + 65	C44				
2,3',4,4' - TeCB	66		B	3280	2.30	0.78	0.884
2,3',4,5 - TeCB	67			34.6	1.98	0.80	0.856
2,3',4,5' - TeCB	68			28.6	2.13	0.77	0.831
2,3',4,6 - TeCB	69	49 + 69	C49				
2,3',4',5 - TeCB	70	61 + 70 + 74 + 76	C61				
2,3',4',6 - TeCB	71	40 + 41 + 71	C40				
2,3',5,5' - TeCB	72			55.9	2.16	0.78	0.823
2,3',5',6 - TeCB	73		U		0.117		
2,4,4',5 - TeCB	74	61 + 70 + 74 + 76	C61				
2,4,4',6 - TeCB	75	59 + 62 + 75	C59				
2',3,4,5 - TeCB	76	61 + 70 + 74 + 76	C61				
3,3',4,4' - TeCB	77			148	2.41	0.79	1.000
3,3',4,5 - TeCB	78		U		2.31		
3,3',4,5' - TeCB	79			80.2	1.85	0.74	0.970
3,3',5,5' - TeCB	80		U		2.12		
3,4,4',5 - TeCB	81		U		10.8		
2,2',3,3',4 - PeCB	82			262	2.33	1.57	0.934
2,2',3,3',5 - PeCB	83	83 + 99	C B	4310	2.09	1.57	0.886
2,2',3,3',6 - PeCB	84		B	636	2.35	1.58	1.163
2,2',3,4,4' - PeCB	85	85 + 116 + 117	C B	824	1.81	1.57	0.919
2,2',3,4,5 - PeCB	86	86 + 87 + 97 + 108 + 119 + 125	C B	3010	1.85	1.58	0.901
2,2',3,4,5' - PeCB	87	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3,4,6 - PeCB	88	88 + 91	C B	527	2.04	1.59	1.154
2,2',3,4,6' - PeCB	89			4.89	2.23	1.68	1.182
2,2',3,4',5 - PeCB	90	90 + 101 + 113	C B	8050	1.90	1.57	0.869
2,2',3,4',6 - PeCB	91	88 + 91	C88				
2,2',3,5,5' - PeCB	92		B	1400	2.15	1.58	0.853
2,2',3,5,6 - PeCB	93	93 + 95 + 98 + 100 + 102	C B	3230	1.97	1.58	1.120
2,2',3,5,6' - PeCB	94			9.70	2.07	1.66	1.102
2,2',3,5',6 - PeCB	95	93 + 95 + 98 + 100 + 102	C93				
2,2',3,6,6' - PeCB	96		J	3.16	0.168	1.55	1.015
2,2',3',4,5 - PeCB	97	86 + 87 + 97 + 108 + 119 + 125	C86				
2,2',3',4,6 - PeCB	98	93 + 95 + 98 + 100 + 102	C93				
2,2',4,4',5 - PeCB	99	83 + 99	C83				
2,2',4,4',6 - PeCB	100	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5,5' - PeCB	101	90 + 101 + 113	C90				
2,2',4,5,6' - PeCB	102	93 + 95 + 98 + 100 + 102	C93				
2,2',4,5',6 - PeCB	103			65.2	1.85	1.62	1.094
2,2',4,6,6' - PeCB	104		KJ	0.226	0.198	1.31	1.001
2,3,3',4,4' - PeCB	105		B	2200	2.94	1.54	1.001
2,3,3',4,5 - PeCB	106		U		2.80		



COMPOUND	IIPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5 - PeCB	107	107 + 124	C	177	3.18	1.55	0.991
2,3,3',4,5' - PeCB	108	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3,3',4,6 - PeCB	109			465	2.95	1.53	0.997
2,3,3',4',6 - PeCB	110	110 + 115	C B	6180	1.57	1.57	0.925
2,3,3',5,5' - PeCB	111			5.95	1.58	1.48	0.945
2,3,3',5,6 - PeCB	112		U		1.65		
2,3,3',5',6 - PeCB	113	90 + 101 + 113	C90				
2,3,4,4',5 - PeCB	114			171	2.99	1.58	1.001
2,3,4,4',6 - PeCB	115	110 + 115	C110				
2,3,4,5,6 - PeCB	116	85 + 116 + 117	C85				
2,3,4',5,6 - PeCB	117	85 + 116 + 117	C85				
2,3',4,4',5 - PeCB	118		B	6790	2.78	1.56	1.000
2,3',4,4',6 - PeCB	119	86 + 87 + 97 + 108 + 119 + 125	C86				
2,3',4,5,5' - PeCB	120			10.7	1.56	1.40	0.959
2,3',4,5',6 - PeCB	121		U		1.59		
2',3,3',4,5 - PeCB	122			88.8	3.18	1.58	1.010
2',3,4,4',5 - PeCB	123			83.4	3.09	1.72	1.000
2',3,4,5,5' - PeCB	124	107 + 124	C107				
2',3,4,5,6' - PeCB	125	86 + 87 + 97 + 108 + 119 + 125	C86				
3,3',4,4',5 - PeCB	126		X				
3,3',4,5,5' - PeCB	127			17.5	3.06	1.50	1.042
2,2',3,3',4,4' - HxCB	128	128 + 166	C B	1410	6.68	1.26	0.958
2,2',3,3',4,5 - HxCB	129	129 + 138 + 160 + 163	C B	13700	6.46	1.26	0.928
2,2',3,3',4,5' - HxCB	130			551	8.40	1.25	0.913
2,2',3,3',4,6 - HxCB	131			78.6	7.79	1.28	1.159
2,2',3,3',4,6' - HxCB	132		B	2080	7.77	1.26	1.174
2,2',3,3',5,5' - HxCB	133			225	7.42	1.25	1.191
2,2',3,3',5,6 - HxCB	134	134 + 143	C	431	7.75	1.25	1.140
2,2',3,3',5,6' - HxCB	135	135 + 151 + 154	C B	4110	0.221	1.28	1.104
2,2',3,3',6,6' - HxCB	136		B	569	0.180	1.27	1.024
2,2',3,4,4',5 - HxCB	137			353	7.34	1.26	0.918
2,2',3,4,4',5' - HxCB	138	129 + 138 + 160 + 163	C129				
2,2',3,4,4',6 - HxCB	139	139 + 140	C	109	6.82	1.23	1.153
2,2',3,4,4',6' - HxCB	140	139 + 140	C139				
2,2',3,4,5,5' - HxCB	141		B	2170	7.11	1.26	0.903
2,2',3,4,5,6 - HxCB	142		U		7.51		
2,2',3,4,5,6' - HxCB	143	134 + 143	C134				
2,2',3,4,5',6 - HxCB	144			374	0.227	1.28	1.121
2,2',3,4,6,6' - HxCB	145		U		0.186		
2,2',3,4',5,5' - HxCB	146		B	2270	6.93	1.26	0.884
2,2',3,4',5,6 - HxCB	147	147 + 149	C B	11100	6.81	1.26	1.133
2,2',3,4',5,6' - HxCB	148			20.8	0.236	1.25	1.084
2,2',3,4',5',6 - HxCB	149	147 + 149	C147				



COMPOUND	IUPAC NO	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
2,2',3,4',6,6' - HxCB	150			13.0	0.168	1.32	1.013
2,2',3,5,5',6 - HxCB	151	135 + 151 + 154	C135				
2,2',3,5,6,6' - HxCB	152		J	2.72	0.173	1.27	1.007
2,2',4,4',5,5' - HxCB	153	153 + 168	C B	14400	5.75	1.26	0.899
2,2',4,4',5,6' - HxCB	154	135 + 151 + 154	C135				
2,2',4,4',6,6' - HxCB	155		J	0.782	0.177	1.38	1.001
2,3,3',4,4',5 - HxCB	156	156 + 157	C B	985	6.86	1.27	1.000
2,3,3',4,4',5' - HxCB	157	156 + 157	C156				
2,3,3',4,4',6 - HxCB	158		B	1160	5.47	1.26	0.938
2,3,3',4,5,5' - HxCB	159			133	5.94	1.25	0.981
2,3,3',4,5,6 - HxCB	160	129 + 138 + 160 + 163	C129				
2,3,3',4,5',6 - HxCB	161		U		5.45		
2,3,3',4',5,5' - HxCB	162			31.1	5.79	1.29	0.989
2,3,3',4',5,6 - HxCB	163	129 + 138 + 160 + 163	C129				
2,3,3',4',5',6 - HxCB	164			754	5.95	1.26	0.921
2,3,3',5,5',6 - HxCB	165		U		6.26		
2,3,4,4',5,6 - HxCB	166	128 + 166	C128				
2,3',4,4',5,5' - HxCB	167		B	389	5.43	1.26	1.000
2,3',4,4',5',6 - HxCB	168	153 + 168	C153				
3,3',4,4',5,5' - HxCB	169		X				
2,2',3,3',4,4',5 - HpCB	170		B	2620	0.901	1.04	0.936
2,2',3,3',4,4',6 - HpCB	171	171 + 173	C B	1040	0.858	1.05	1.163
2,2',3,3',4,5,5' - HpCB	172			491	0.892	1.04	0.897
2,2',3,3',4,5,6 - HpCB	173	171 + 173	C171				
2,2',3,3',4,5,6' - HpCB	174		B	2540	0.805	1.04	1.133
2,2',3,3',4,5',6 - HpCB	175			126	0.766	1.04	1.102
2,2',3,3',4,6,6' - HpCB	176			363	0.592	1.04	1.034
2,2',3,3',4',5,6 - HpCB	177		B	2060	0.850	1.04	1.145
2,2',3,3',5,5',6 - HpCB	178		B	904	0.789	1.04	1.085
2,2',3,3',5,6,6' - HpCB	179		B	1310	0.572	1.05	1.010
2,2',3,4,4',5,5' - HpCB	180	180 + 193	C B	7740	0.710	1.05	0.910
2,2',3,4,4',5,6 - HpCB	181			13.5	0.796	0.89	1.156
2,2',3,4,4',5,6' - HpCB	182		U		0.762		
2,2',3,4,4',5',6 - HpCB	183	183 + 185	C B	2680	0.757	1.04	1.127
2,2',3,4,4',6,6' - HpCB	184		J	1.27	0.542	0.98	1.024
2,2',3,4,5,5',6 - HpCB	185	183 + 185	C183				
2,2',3,4,5,6,6' - HpCB	186		U		0.592		
2,2',3,4',5,5',6 - HpCB	187		B	5530	0.705	1.04	1.110
2,2',3,4',5,6,6' - HpCB	188			0.15	0.500	1.07	1.000
2,3,3',4,4',5,5' - HpCB	189			87.5	0.751	1.00	1.000
2,3,3',4,4',5,6 - HpCB	190		B	703	0.691	1.05	0.947
2,3,3',4,4',5',6 - HpCB	191			149	0.667	1.05	0.917
2,3,3',4,5,5',6 - HpCB	192		U		0.705		





COMPOUND	IIIPAC NO.	CO-ELUTIONS	LAB FLAG <sup>1</sup>	CONC FOUND	DETECTION LIMIT	ION ABUND RATIO	RRT
2,3,3',4',5,5',6 - HpCB	193	180 + 193	C180				
2,2',3,3',4,4',5,5' - OcCB	194		B	875	0.428	0.90	0.991
2,2',3,3',4,4',5,6 - OcCB	195		B	368	0.466	0.91	0.945
2,2',3,3',4,4',5,6' - OcCB	196		B	653	0.0486	0.91	0.916
2,2',3,3',4,4',6,6' - OcCB	197	197 + 200	C B	167	0.0486	0.91	1.046
2,2',3,3',4,5,5',6 - OcCB	198	198 + 199	C B	1060	0.0486	0.90	1.115
2,2',3,3',4,5,5',6' - OcCB	199	198 + 199	C198				
2,2',3,3',4,5,6,6' - OcCB	200	197 + 200	C197				
2,2',3,3',4,5',6,6' - OcCB	201		B	229	0.0486	0.90	1.023
2,2',3,3',5,5',6,6' - OcCB	202		B	375	0.0486	0.90	1.000
2,2',3,4,4',5,5',6 - OcCB	203		B	765	0.0486	0.90	0.920
2,2',3,4,4',5,6,6' - OcCB	204		JB	0.374	0.0486	0.88	1.039
2,3,3',4,4',5,5',6 - OcCB	205		B	44.3	0.389	0.89	1.000
2,2',3,3',4,4',5,5',6 - NoCB	206		B	177	0.0880	0.78	1.000
2,2',3,3',4,4',5,6,6' - NoCB	207			26.9	0.0646	0.80	1.020
2,2',3,3',4,5,5',6,6' - NoCB	208			46.0	0.0707	0.78	1.000
2,2',3,3',4,4',5,5',6,6' - DeCB	209		B	21.8	0.0486	0.69	1.000

(1) C = co-eluting congener; U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; J = concentration less than LMCL; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Form 1A  
 PCB CONGENER ANALYSIS REPORT


CLIENT ID:  
 LDW-T4-M-DC-EM-comp-1

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection: 31-Aug-2004
Contract No.: 4033	Project No.: 04-08-06-22
Matrix: TISSUE	Lab Sample ID: L7311-156 P
Sample Receipt Date: 26-Oct-2004	Sample Size: 10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date: 04-Apr-2005
Analysis Date: 09-Apr-2005 Time: 5:06:47	Instrument ID: HR GC/MS
Extract Volume (µL): 50	GC Column ID: DB-1
Injection Volume (µL): 2.0	Sample Datafile: DT53_096 S: 12
Dilution Factor: N/A	Blank Data Filename: DT53_096 S: 5
Concentration Units: ng/kg (wet weight basis)	Cal. Ver. Data Filename: DT53_096 S: 1

COMPOUND	IUPAC NO.	CO-ELUTIONS	IAR FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT	ION ABUND. RATIO	RRT
3,3',4,4' - TeCB	77						
3,4,4',5 - TeCB	81						
2,3,3',4,4' - PeCB	105						
2,3,4,4',5 - PeCB	114						
2,3',4,4',5 - PeCB	118						
2',3,4,4',5 - PeCB	123						
3,3',4,4',5 - PeCB	126			10.2	0.349	1.45	1.000
2,3,3',4,4',5 - HxCB	156						
2,3,3',4,4',5' - HxCB	157						
2,3',4,4',5,5' - HxCB	167						
3,3',4,4',5,5' - HxCB	169			0.468	0.228	1.06	1.001
2,2',3,3',4,4',5 - HpCB	170						
2,2',3,4,4',5,5' - HpCB	180						
2,3,3',4,4',5,5' - HpCB	189						

(1) U = not detected; K = peak detected, but did not meet quantification criteria, result reported represents the estimated maximum possible concentration; E = exceeds calibrated linear range, see dilution data; D = dilution data; Z = compound not requested; B = analyte found in sample and the associated blank; X = results reported separately

These pages are part of a larger report that may contain information necessary for full data evaluation.

Approved by:  QA/QC Chemist

056

Form 1A  
HOMOLOGUE TOTAL POLYCHLORINATED BIPHENYLS (PCB) ANALYSIS REPORT

Lab Name: AXYS ANALYTICAL SERVICES	Sample Collection:	31-Aug-04
Contract No.: 4033	Project No.:	04-08-06-22
Matrix: TISSUE	Lab Sample ID:	L7311-156
Sample Receipt Date: 26-Oct-2004	Sample Size:	10.3 g (wet)
Extraction Date: 02-Mar-2005	Initial Calibration Date:	01-Mar-2005
Analysis Date: 15-Mar-2005 Time: 16:49:49	Instrument ID:	HR GC/MS
Extract Volume (µL): 50	GC Column ID:	SPB-OCTYL
Injection Volume (µL): 1.0	Blank Data Filename:	PB5C_135 S:7
Dilution Factor: N/A	Cal. Ver. Data Filename:	PB5C_137 S:1
Concentration Units : ng/kg (wet weight basis)	Sample Datafile(s):	PB5C_137A S:9 DT53_096 S: 12

PCB HOMOLOGUE GROUP	LAB FLAG <sup>1</sup>	CONC. FOUND	DETECTION LIMIT
Total Monochloro Biphenyls		2.99	0.176
Total Dichloro Biphenyls		265	0.372
Total Trichloro Biphenyls		3980	0.961
Total Tetrachloro Biphenyls		15300	10.8
Total Pentachloro Biphenyls		38500	3.18
Total Hexachloro Biphenyls		57400	8.40
Total Heptachloro Biphenyls		28400	0.901
Total Octachloro Biphenyls		4540	0.466
Total Nonachloro Biphenyls		250	0.0880
Decachloro Biphenyl		21.8	0.0486
TOTAL PCBs		149000	

(1) U = Not detected

(2) All header information pertains to the initial instrumental analysis of the sample extract.  
Additional sample datafiles listed refer to secondary analysis of the sample extract.

These pages are part of a larger report that may contain information necessary for full data evaluation.

15204PCBTOTAL\_1.xls, S17

Approved by:  QA/QC Chemist

26-04-2005  
dd-mm-yyyy

036

**MS/MSD**

---

June 13, 2005

Service Request No: K2503388

Susan McGroddy  
Windward Environmental  
200 W. Mercer St  
Suite 401  
Seattle, WA 98119

**RE: LDW / 04-08-06-22**

Dear Susan:

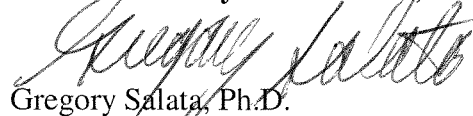
Enclosed are the results of the sample(s) submitted to our laboratory on December 1, 2004. For your reference, these analyses have been assigned our service request number K2503388.

All analyses were performed according to our laboratory's quality assurance program. The test results meet requirements of the NELAC standards except as noted in the case narrative report. All results are intended to be considered in their entirety, and Columbia Analytical Services, Inc. (CAS) is not responsible for use of less than the complete report. Results apply only to the items submitted to the laboratory for analysis and individual items (samples) analyzed, as listed in the report.

Please call if you have any questions. My extension is 3376.

Respectfully submitted,

**Columbia Analytical Services, Inc.**



Gregory Salata, Ph.D.  
Project Chemist

GS/jeb

Page 1 of 3535

## Acronyms

ASTM	American Society for Testing and Materials
A2LA	American Association for Laboratory Accreditation
CARB	California Air Resources Board
CAS Number	Chemical Abstract Service registry Number
CFC	Chlorofluorocarbon
CFU	Colony-Forming Unit
DEC	Department of Environmental Conservation
DEQ	Department of Environmental Quality
DHS	Department of Health Services
DOE	Department of Ecology
DOH	Department of Health
EPA	U. S. Environmental Protection Agency
ELAP	Environmental Laboratory Accreditation Program
GC	Gas Chromatography
GC/MS	Gas Chromatography/Mass Spectrometry
LUFT	Leaking Underground Fuel Tank
M	Modified
MCL	Maximum Contaminant Level is the highest permissible concentration of a substance allowed in drinking water as established by the USEPA.
MDL	Method Detection Limit
MPN	Most Probable Number
MRL	Method Reporting Limit
NA	Not Applicable
NC	Not Calculated
NCASI	National Council of the Paper Industry for Air and Stream Improvement
ND	Not Detected
NIOSH	National Institute for Occupational Safety and Health
PQL	Practical Quantitation Limit
RCRA	Resource Conservation and Recovery Act
SIM	Selected Ion Monitoring
TPH	Total Petroleum Hydrocarbons
tr	Trace level is the concentration of an analyte that is less than the PQL but greater than or equal to the MDL.

### **Inorganic Data Qualifiers**

- \* The result is an outlier. See case narrative.
- # The control limit criteria is not applicable. See case narrative.
- B The analyte was found in the associated method blank at a level that is significant relative to the sample result.
- E The result is an estimate amount because the value exceeded the instrument calibration range.
- J The result is an estimated concentration that is less than the MRL but greater than or equal to the MDL.
- U The compound was analyzed for, but was not detected ("Non-detect") at or above the MRL/MDL.
- i The MRL/MDL has been elevated due to a matrix interference.
- X See case narrative.

### **Metals Data Qualifiers**

- # The control limit criteria is not applicable. See case narrative.
- B The result is an estimated concentration that is less than the MRL but greater than or equal to the MDL.
- E The percent difference for the serial dilution was greater than 10%, indicating a possible matrix interference in the sample.
- M The duplicate injection precision was not met.
- N The Matrix Spike sample recovery is not within control limits. See case narrative.
- S The reported value was determined by the Method of Standard Additions (MSA).
- U The compound was analyzed for, but was not detected ("Non-detect") at or above the MRL/MDL.
- W The post-digestion spike for furnace AA analysis is out of control limits, while sample absorbance is less than 50% of spike absorbance.
- i The MRL/MDL has been elevated due to a matrix interference.
- X See case narrative.
- \* The duplicate analysis not within control limits. See case narrative.
- + The correlation coefficient for the MSA is less than 0.995.

### **Organic Data Qualifiers**

- \* The result is an outlier. See case narrative.
- # The control limit criteria is not applicable. See case narrative.
- A A tentatively identified compound, a suspected aldol-condensation product.
- B The analyte was found in the associated method blank at a level that is significant relative to the sample result.
- C The analyte was qualitatively confirmed using GC/MS techniques, pattern recognition, or by comparing to historical data.
- D The reported result is from a dilution.
- E The result is an estimate amount because the value exceeded the instrument calibration range.
- J The result is an estimated concentration that is less than the MRL but greater than or equal to the MDL.
- N The result is presumptive. The analyte was tentatively identified, but a confirmation analysis was not performed.
- P The GC or HPLC confirmation criteria was exceeded. The relative percent difference is greater than 40% between the two analytical results (25% for CLP Pesticides).
- U The compound was analyzed for, but was not detected ("Non-detect") at or above the MRL/MDL.
- i The MRL/MDL has been elevated due to a chromatographic interference.
- X See case narrative.

### **Additional Petroleum Hydrocarbon Specific Qualifiers**

- F The chromatographic fingerprint of the sample matches the elution pattern of the calibration standard.
- L The chromatographic fingerprint of the sample resembles a petroleum product, but the elution pattern indicates the presence of a greater amount of lighter molecular weight constituents than the calibration standard.
- H The chromatographic fingerprint of the sample resembles a petroleum product, but the elution pattern indicates the presence of a greater amount of heavier molecular weight constituents than the calibration standard.
- O The chromatographic fingerprint of the sample resembles an oil, but does not match the calibration standard.
- Y The chromatographic fingerprint of the sample resembles a petroleum product eluting in approximately the correct carbon range, but the elution pattern does not match the calibration standard.
- Z The chromatographic fingerprint does not resemble a petroleum product.

## Summary Package



## **Case Narrative**

# Lipids

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/3/2004  
**Date Received:** 12/9/2004

Lipids, Total

**Prep Method:** EPA 3540  
**Analysis Method:** NOAA  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Sample Name	Lab Code	MRL	Date Extracted	Date Analyzed	Result	Result Notes
LDW-T4-M-SF-FL-comp-1	K2503388-001	0.050	5/20/2005	6/2/2005	2.8	
LDW-T1-M-DC-EM-comp-1	K2503388-003	0.050	5/20/2005	6/2/2005	0.36	
LDW-T3-B-PS-WB-comp-1	K2503388-007	0.050	5/20/2005	6/2/2005	1.9	
LDW-T3-E-PS-WB-comp-1	K2503388-008	0.053	5/20/2005	6/2/2005	2.4	
LDW-T1-M-ES-WB-comp-2	K2503388-013	0.055	5/20/2005	6/2/2005	5.0	
LDW-T2-M-ES-WB-comp-3	K2503388-019	0.055	5/20/2005	6/2/2005	7.4	
LDW-T4-M-ES-WB-comp-2	K2503388-020	0.050	5/20/2005	6/2/2005	6.1	

Approved By: *C. Avalos* Date: 6-7-05

1A/092099p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

Client: Windward Environmental  
Project: LDW/04-08-06-22  
Sample Matrix: Tissue

Service Request: K2503388  
Date Collected: 8/3/2004  
Date Received: 12/9/2004  
Date Extracted: 5/20/2005  
Date Analyzed: 6/2/2005

Duplicate Summary  
Lipids, Total

Sample Name: LDW-T4-M-SF-FL-comp-1  
Lab Code: K2503388-001 DUP  
Test Notes:

Units: PERCENT  
Basis: AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Average	Relative Percent Difference	Result Notes
K2503388-001 DUP	EPA 3540	NOAA	0.050	2.8	2.5	2.7	11	

Approved By: Carol Jones

Date: 6-7-05

DUP (22) /091599p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

Client: Windward Environmental  
Project: LDW/04-08-06-22  
Sample Matrix: Tissue

Service Request: K2503388  
Date Collected: 8/3/2004  
Date Received: 12/9/2004  
Date Extracted: 5/20/2005  
Date Analyzed: 6/2/2005

Triplicate Summary  
Lipids, Total

Sample Name: LDW-T4-M-SF-FL-comp-1  
Lab Code: K2503388-001 TRP  
Test Notes:

Units: PERCENT  
Basis: AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Triplicate Sample Result	Average	Percent Relative Standard Deviation	Result Notes
K2503388-001 TRP	EPA 3540	NOAA	0.050	2.8	2.6	2.7	2.7	4	

Approved By: Carl Jones Date: 6-7-05

DUP/091599p

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/30/2004  
**Date Received:** 12/9/2004

Lipids, Total

**Prep Method:** TISSUEMIZER  
**Analysis Method:** NOAA  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Sample Name	Lab Code	MRL	Date Extracted	Date Analyzed	Result	Result Notes
LDW-T3-M-ES-WB-comp-4	K2503388-002	0.24	6/3/2005	6/4/2005	3.4	
LDW-T1-D-PS-WB-comp-1	K2503388-005	0.25	6/3/2005	6/4/2005	2.2	
LDW-T3-F-PS-WB-comp-1	K2503388-009	0.25	6/3/2005	6/4/2005	1.9	
LDW-T4-A-PS-WB-comp-1	K2503388-010	0.24	6/3/2005	6/4/2005	2.4	
LDW-T4-D-PS-WB-comp-1	K2503388-011	0.24	6/3/2005	6/4/2005	2.3	
LDW-T1-M-ES-WB-comp-3	K2503388-014	0.25	6/3/2005	6/4/2005	6.8	
LDW-T1-M-ES-WB-comp-4	K2503388-015	0.25	6/3/2005	6/4/2005	5.0	
LDW-T1-M-ES-WB-comp-5	K2503388-016	0.24	6/3/2005	6/4/2005	5.3	

Approved By: \_\_\_\_\_

*Carol Jones*

Date: \_\_\_\_\_

6-7-05

1A/092099p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/30/2004  
**Date Received:** 12/9/2004  
**Date Extracted:** 6/3/2005  
**Date Analyzed:** 6/4/2005

Duplicate Summary  
Lipids, Total

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002 DUP  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Average	Relative Percent Difference	Result Notes
K2503388-002 DUP	TISSUEMIZER	NOAA	0.24	3.4	3.4	3.4	<1	

Approved By: \_\_\_\_\_

Date: \_\_\_\_\_

6-7-05

DUP (22) /091599p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/30/2004  
**Date Received:** 12/9/2004  
**Date Extracted:** 6/3/2005  
**Date Analyzed:** 6/4/2005

Triplicate Summary  
 Lipids, Total

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002 TRP  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Triplicate Sample Result	Percent Relative		Result Notes
							Average	Standard Deviation	
K2503388-002 TRP	TISSUEMIZER	NOAA	0.24	3.4	3.4	3.4	3.4	<1	

Approved By: Carmel Jones Date: 6-7-05

DUP/091599p



COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

Client: Windward Environmental  
 Project: LDW/04-08-06-22  
 Sample Matrix: Tissue

Service Request: K2503388  
 Date Collected: 8/30/2004  
 Date Received: 12/9/2004

Lipids, Total

Prep Method: EPA 3540  
 Analysis Method: NOAA  
 Test Notes:

Units: PERCENT  
 Basis: AS RECEIVED

Sample Name	Lab Code	MRL	Date Extracted	Date Analyzed	Result	Result Notes
LDW-T1-M-DC-EM-comp-2	K2503388-004	0.062	5/26/2005	6/2/2005	0.50	
LDW-T2-A-PS-WB-comp-1	K2503388-006	0.062	5/26/2005	6/2/2005	2.2	
LDW-T4-E-PS-WB-comp-1	K2503388-012	0.061	5/26/2005	6/2/2005	1.9	
LDW-T2-M-ES-WB-comp-1	K2503388-017	0.062	5/26/2005	6/2/2005	8.4	
LDW-T2-M-ES-WB-comp-2	K2503388-018	0.062	5/26/2005	6/2/2005	6.8	

Approved By: Caval Jones Date: 6-7-05

1A/092099p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/30/2004  
**Date Received:** 12/9/2004  
**Date Extracted:** 5/26/2005  
**Date Analyzed:** 6/2/2005

Duplicate Summary  
Lipids, Total

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018 DUP  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Average	Relative Percent Difference	Result Notes
K2503388-018 DUP	EPA 3540	NOAA	0.062	6.8	6.8	6.8	<1	

Approved By: Carel Jones

Date: 6-7-05

DUP (22) /091599p

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 8/30/2004  
**Date Received:** 12/9/2004  
**Date Extracted:** 5/26/2005  
**Date Analyzed:** 6/2/2005

Triplicate Summary  
 Lipids, Total

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018 TRP  
**Test Notes:**

**Units:** PERCENT  
**Basis:** AS RECEIVED

Lab Code	Prep Method	Analysis Method	MRL	Sample Result	Duplicate Sample Result	Triplicate Sample Result	Average	Percent Relative Standard Deviation	Result Notes
K2503388-018 TRP	EPA 3540	NOAA	0.062	6.8	6.9	6.6	6.8	2	

Approved By: Carol Jones Date: 6-7-05  
 DUP/091599p

## **Butyltins**

Organic Analysis:  
Butyltins (as cation)

Summary Package

Sample and QC Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22

Service Request: K2503388

**Cover Page - Organic Analysis Data Package  
 Butyltins (as cation)**

Sample Name	Lab Code	Date Collected	Date Received
LDW-T3-M-ES-WB-comp-4	K2503388-002	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/2004	12/09/2004
LDW-T3-F-PS-WB-comp-1	K2503388-009	08/04/2004	12/01/2004
LDW-T4-A-PS-WB-comp-1	K2503388-010	08/04/2004	12/01/2004
LDW-T1-M-ES-WB-comp-4	K2503388-015	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5	K2503388-016	08/02/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1	K2503388-017	08/03/2004	12/01/2004
LDW-T3-M-ES-WB-comp-4MS	KWG0508072-1	08/30/2004	12/09/2004
LDW-T1-M-ES-WB-comp-4DM	KWG0508072-10	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5MS	KWG0508072-11	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5DM	KWG0508072-12	08/02/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1MS	KWG0508072-13	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1DM	KWG0508072-14	08/03/2004	12/01/2004
LDW-T3-M-ES-WB-comp-4	KWG0508072-17	08/30/2004	12/09/2004
LDW-T3-M-ES-WB-comp-4DM	KWG0508072-2	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2MS	KWG0508072-3	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2DM	KWG0508072-4	08/30/2004	12/09/2004
LDW-T3-F-PS-WB-comp-1MS	KWG0508072-5	08/04/2004	12/01/2004
LDW-T3-F-PS-WB-comp-1DMS	KWG0508072-6	08/04/2004	12/01/2004
LDW-T4-A-PS-WB-comp-1MS	KWG0508072-7	08/04/2004	12/01/2004
LDW-T4-A-PS-WB-comp-1DMS	KWG0508072-8	08/04/2004	12/01/2004
LDW-T1-M-ES-WB-comp-4MS	KWG0508072-9	08/02/2004	12/01/2004

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the case narrative. Release of the data contained in this hardcopy data package and in the computer-readable data submitted on floppy diskette has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature: Janet L. Heston

Name: Janet L. Heston

Date: 6/10/05

Title: Scientist

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002  
**File ID:** J:\GC26\DATA\053105\0531F007.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.19 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.13 U	2.0	0.13	
688-73-3	Tri-n-butyltin	3.9	2.0	0.053	
1002-53-5	Di-n-butyltin	2.2	2.0	0.081	
2406-65-7	n-Butyltin	1.0 J	2.0	0.12	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	61	10-160	05/31/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**File ID:** J:\GC26\DATA\053105\0531F011.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.40 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.13 U	1.9	0.13	
688-73-3	Tri-n-butyltin	1.8 J	1.9	0.050	
1002-53-5	Di-n-butyltin	0.64 J	1.9	0.078	
2406-65-7	n-Butyltin	0.12 U	1.9	0.12	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	55	10-160	05/31/05	Acceptable

**Comments:** \_\_\_\_\_



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T3-F-PS-WB-comp-1  
**Lab Code:** K2503388-009  
**File ID:** J:\GC26\DATA\053105\0531F014.D  
**Instrument ID:** GC26  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.22 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.13	U	2.0	0.13	
688-73-3	Tri-n-butyltin	40		2.0	0.052	
1002-53-5	Di-n-butyltin	4.1		2.0	0.081	
2406-65-7	n-Butyltin	0.46	J	2.0	0.12	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	77	10-160	05/31/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T4-A-PS-WB-comp-1  
**Lab Code:** K2503388-010  
**File ID:** J:\GC26\DATA\053105\0531F020.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.21 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.13	U	2.0	0.13	
688-73-3	Tri-n-butyltin	38		2.0	0.052	
1002-53-5	Di-n-butyltin	3.5		2.0	0.081	
2406-65-7	n-Butyltin	0.45	J	2.0	0.12	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	74	10-160	05/31/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**File ID:** J:\GC26\DATA\053105\0531F023.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.15 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.14	U	2.0	0.14	
688-73-3	Tri-n-butyltin	8.7		2.0	0.053	
1002-53-5	Di-n-butyltin	3.3		2.0	0.082	
2406-65-7	n-Butyltin	1.5	J	2.0	0.12	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	69	10-160	06/01/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-5  
**Lab Code:** K2503388-016  
**File ID:** J:\GC26\DATA\053105\0531F026.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.01 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.14 U	2.0	0.14	
688-73-3	Tri-n-butyltin	11	2.0	0.054	
1002-53-5	Di-n-butyltin	3.3	2.0	0.084	
2406-65-7	n-Butyltin	1.3 J	2.0	0.13	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	101	10-160	06/01/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**File ID:** J:\GC26\DATA\053105\0531F032.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.04 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.14	U	2.0	0.14	
688-73-3	Tri-n-butyltin	7.1		2.0	0.054	
1002-53-5	Di-n-butyltin	2.8		2.0	0.084	
2406-65-7	n-Butyltin	1.2	JP	2.0	0.13	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	80	10-160	06/01/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Butyltins (as cation)**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508072-16  
**File ID:** J:\GC26\DATA\053105\0531F004.D  
**Instrument ID:** GC26

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Calibration ID:** CAL4447

**Sample Amount:** 5.00 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** RTX-1  
**Column2:** RTX-35

CAS No.	Analyte Name	Result Q	MRL	MDL	Note
1461-25-2	Tetra-n-butyltin	0.14 U	2.0	0.14	
688-73-3	Tri-n-butyltin	0.054 U	2.0	0.054	
1002-53-5	Di-n-butyltin	0.084 U	2.0	0.084	
<b>2406-65-7</b>	<b>n-Butyltin</b>	<b>0.36 J</b>	2.0	0.13	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tri-n-propyltin	60	10-160	05/31/05	Acceptable

**Comments:** \_\_\_\_\_

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary**  
**Butyltins (as cation)**

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** PERCENT  
**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>
LDW-T3-M-ES-WB-comp-4	K2503388-002	61
LDW-T1-M-DC-EM-comp-2	K2503388-004	55
LDW-T3-F-PS-WB-comp-1	K2503388-009	77
LDW-T4-A-PS-WB-comp-1	K2503388-010	74
LDW-T1-M-ES-WB-comp-4	K2503388-015	69
LDW-T1-M-ES-WB-comp-5	K2503388-016	101
LDW-T2-M-ES-WB-comp-1	K2503388-017	80
LDW-T3-M-ES-WB-comp-4DUP	KWG0508072-17	63
Method Blank	KWG0508072-16	60
LDW-T3-M-ES-WB-comp-4MS	KWG0508072-1	71
LDW-T1-M-ES-WB-comp-4DM	KWG0508072-10	97
LDW-T1-M-ES-WB-comp-5MS	KWG0508072-11	97
LDW-T1-M-ES-WB-comp-5DM	KWG0508072-12	102
LDW-T2-M-ES-WB-comp-1MS	KWG0508072-13	49
LDW-T2-M-ES-WB-comp-1DM	KWG0508072-14	46
Batch QC	KWG0508072-18	76 D
LDW-T3-M-ES-WB-comp-4DM	KWG0508072-2	81
LDW-T1-M-DC-EM-comp-2MS	KWG0508072-3	66
LDW-T1-M-DC-EM-comp-2DM	KWG0508072-4	71
LDW-T3-F-PS-WB-comp-1MS	KWG0508072-5	99
LDW-T3-F-PS-WB-comp-1DMS	KWG0508072-6	92
LDW-T4-A-PS-WB-comp-1MS	KWG0508072-7	90
LDW-T4-A-PS-WB-comp-1DMS	KWG0508072-8	92
LDW-T1-M-ES-WB-comp-4MS	KWG0508072-9	92
Lab Control Sample	KWG0508072-15	73

**Surrogate Recovery Control Limits (%)**

Sur1 = Tri-n-propyltin 10-160

Results flagged with an asterisk (\*) indicate values outside control criteria.  
 Results flagged with a pound (#) indicate the control criteria is not applicable.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T3-M-ES-WB-comp-4MS KWG0508072-1 Matrix Spike			LDW-T3-M-ES-WB-comp-4DMS KWG0508072-2 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	40.4	50.7	80	40.7	50.0	81	12-104	1	50
Tri-n-butyltin	3.9	35.6	51.7	61	35.3	51.0	62	10-151	1	50
Di-n-butyltin	2.2	32.3	44.7	67	31.5	44.1	66	10-126	3	50
n-Butyltin	1.0	25.7	40.8	61	25.7	40.2	61	13-107	0	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-5  
**Lab Code:** K2503388-016  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-5MS KWG0508072-11 Matrix Spike			LDW-T1-M-ES-WB-comp-5DMS KWG0508072-12 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	48.6	50.9	95	47.9	49.8	96	12-104	1	50
Tri-n-butyltin	11	48.4	51.9	72	49.3	50.8	75	10-151	2	50
Di-n-butyltin	3.3	37.9	44.9	77	37.9	43.9	79	10-126	0	50
n-Butyltin	1.3	31.9	40.9	75	31.8	40.0	76	13-107	0	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Butyltins (as cation)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T2-M-ES-WB-comp-1MS KWG0508072-13 Matrix Spike			LDW-T2-M-ES-WB-comp-1DMS KWG0508072-14 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	21.0	50.8	41	21.7	50.6	43	12-104	4	50
Tri-n-butyltin	7.1	13.4	51.8	12	12.1	51.6	10	10-151	11	50
Di-n-butyltin	2.8	7.99	44.8	12	7.21	44.6	10	10-126	10	50
n-Butyltin	1.2	2.77	40.8	4 *	2.77	40.7	4 *	13-107	0	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-2MS KWG0508072-3 Matrix Spike			LDW-T1-M-DC-EM-comp-2DMS KWG0508072-4 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	17.2	50.7	34	23.7	51.0	46	12-104	32	50
Tri-n-butyltin	1.8	29.1	51.7	53	29.4	52.0	53	10-151	1	50
Di-n-butyltin	0.64	32.0	44.7	70	32.5	45.0	71	10-126	1	50
n-Butyltin	ND	24.1	40.8	59	22.4	41.0	55	13-107	7	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T3-F-PS-WB-comp-1  
**Lab Code:** K2503388-009  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T3-F-PS-WB-comp-1 MS KWG0508072-5 Matrix Spike			LDW-T3-F-PS-WB-comp-1 DMS KWG0508072-6 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	42.5	50.9	84	30.9	49.8	62	12-104	32	50
Tri-n-butyltin	40	79.1	51.9	75	77.8	50.8	75	10-151	2	50
Di-n-butyltin	4.1	39.5	44.9	79	37.3	43.9	76	10-126	6	50
n-Butyltin	0.46	31.4	40.9	76	30.5	40.0	75	13-107	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T4-A-PS-WB-comp-1  
**Lab Code:** K2503388-010  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T4-A-PS-WB-comp-1MS KWG0508072-7 Matrix Spike			LDW-T4-A-PS-WB-comp-1DMS KWG0508072-8 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	24.9	50.8	49	32.7	50.0	65	12-104	27	50
Tri-n-butyltin	38	69.7	51.8	62	71.5	51.0	67	10-151	3	50
Di-n-butyltin	3.5	36.0	44.8	72	36.1	44.1	74	10-126	0	50
n-Butyltin	0.45	28.4	40.8	68	28.7	40.2	70	13-107	1	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-4MS KWG0508072-9 Matrix Spike			LDW-T1-M-ES-WB-comp-4DMS KWG0508072-10 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Tetra-n-butyltin	ND	38.3	50.9	75	45.7	50.6	90	12-104	18	50
Tri-n-butyltin	8.7	42.1	51.9	64	44.2	51.6	69	10-151	5	50
Di-n-butyltin	3.3	36.7	44.9	74	36.4	44.6	74	10-126	1	50
n-Butyltin	1.5	29.6	40.9	69	30.4	40.7	71	13-107	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Duplicate Sample Summary  
 Butyltins (as cation)**

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Analyte Name	MRL	MDL	Sample Result	LDW-T3-M-ES-WB-comp-4DUP KWG0508072-17 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
Tetra-n-butyltin	2.0	0.13	ND	ND	ND	-	50
Tri-n-butyltin	2.0	0.053	3.9	4.1	4.0	6 #	50
Di-n-butyltin	2.0	0.082	2.2	2.1	2.1	6 #	50
n-Butyltin	2.0	0.12	1.0	0.96	1.0	7 #	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005

**Lab Control Spike Summary**  
**Butyltins (as cation)**

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508072

Lab Control Sample  
 KWG0508072-15  
 Lab Control Spike

Analyte Name	Result	Expected	%Rec	%Rec Limits
Tetra-n-butyltin	41.5	51.0	81	23-117
Tri-n-butyltin	33.7	52.0	65	23-117
Di-n-butyltin	33.3	45.0	74	10-130
n-Butyltin	22.8	41.0	56	10-123

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Winward Environmental  
**Project:** LDW/04-08-06-22  
**Matrix:** Tissue


**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 5/25/2005  
**Date Analyzed:** 6/10/2005

Standard Reference Material  
Butyltins

**Sample Name:** CRM 477  
**Lab Code:** KWG0508072-18  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Dry

Analyte	Prep Method	Analysis Method	True Value	Result	Result Notes
Tri-n-butyltin Cation	Method	Krone	2200 ± 190	1500	
Di-n-butyltin Cation	Method	Krone	1540 ± 120	1100	
n-butyltin Cation	Method	Krone	1500 ± 280	1300	

Approved By:   
LCS (44)/091898p  
03388svgmh1 - sm 6/10/2005

Date: 6/10/05

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 18:52

**Method Blank Summary**  
**Butyltins (as cation)**

**Sample Name:** Method Blank **File ID:** J:\GC26\DATA\053105\0531F004.D  
**Lab Code:** KWG0508072-16 **Instrument ID:** GC26  
**Extraction Method:** METHOD **Level:** Low  
**Analysis Method:** GC-FPD **Extraction Lot:** KWG0508072

This Method Blank applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Lab Control Sample	KWG0508072-15	J:\GC26\DATA\053105\0531F005.D	05/31/05	19:09
LDW-T3-M-ES-WB-comp-4	K2503388-002	J:\GC26\DATA\053105\0531F007.D	05/31/05	19:41
LDW-T3-M-ES-WB-comp-4DUP	KWG0508072-17	J:\GC26\DATA\053105\0531F008.D	05/31/05	19:57
LDW-T3-M-ES-WB-comp-4MS	KWG0508072-1	J:\GC26\DATA\053105\0531F009.D	05/31/05	20:13
LDW-T3-M-ES-WB-comp-4DMS	KWG0508072-2	J:\GC26\DATA\053105\0531F010.D	05/31/05	20:29
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\GC26\DATA\053105\0531F011.D	05/31/05	20:45
LDW-T1-M-DC-EM-comp-2MS	KWG0508072-3	J:\GC26\DATA\053105\0531F012.D	05/31/05	21:02
LDW-T1-M-DC-EM-comp-2DMS	KWG0508072-4	J:\GC26\DATA\053105\0531F013.D	05/31/05	21:18
LDW-T3-F-PS-WB-comp-1	K2503388-009	J:\GC26\DATA\053105\0531F014.D	05/31/05	21:34
LDW-T3-F-PS-WB-comp-1MS	KWG0508072-5	J:\GC26\DATA\053105\0531F018.D	05/31/05	22:39
LDW-T3-F-PS-WB-comp-1DMS	KWG0508072-6	J:\GC26\DATA\053105\0531F019.D	05/31/05	22:55
LDW-T4-A-PS-WB-comp-1	K2503388-010	J:\GC26\DATA\053105\0531F020.D	05/31/05	23:11
LDW-T4-A-PS-WB-comp-1MS	KWG0508072-7	J:\GC26\DATA\053105\0531F021.D	05/31/05	23:28
LDW-T4-A-PS-WB-comp-1DMS	KWG0508072-8	J:\GC26\DATA\053105\0531F022.D	05/31/05	23:44
LDW-T1-M-ES-WB-comp-4	K2503388-015	J:\GC26\DATA\053105\0531F023.D	06/01/05	00:00
LDW-T1-M-ES-WB-comp-4MS	KWG0508072-9	J:\GC26\DATA\053105\0531F024.D	06/01/05	00:16
LDW-T1-M-ES-WB-comp-4DMS	KWG0508072-10	J:\GC26\DATA\053105\0531F025.D	06/01/05	00:33
LDW-T1-M-ES-WB-comp-5	K2503388-016	J:\GC26\DATA\053105\0531F026.D	06/01/05	00:49
LDW-T1-M-ES-WB-comp-5MS	KWG0508072-11	J:\GC26\DATA\053105\0531F030.D	06/01/05	01:54
LDW-T1-M-ES-WB-comp-5DMS	KWG0508072-12	J:\GC26\DATA\053105\0531F031.D	06/01/05	02:10
LDW-T2-M-ES-WB-comp-1	K2503388-017	J:\GC26\DATA\053105\0531F032.D	06/01/05	02:27
LDW-T2-M-ES-WB-comp-1MS	KWG0508072-13	J:\GC26\DATA\053105\0531F033.D	06/01/05	02:43
LDW-T2-M-ES-WB-comp-1DMS	KWG0508072-14	J:\GC26\DATA\053105\0531F034.D	06/01/05	02:59
Batch QC	KWG0508072-18	J:\GC26\DATA\061005\0610F003.D	06/10/05	08:49

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 19:09

**Lab Control Sample Summary**  
**Butyltins (as cation)**

**Sample Name:** Lab Control Sample **File ID:** J:\GC26\DATA\053105\0531F005.D  
**Lab Code:** KWG0508072-15 **Instrument ID:** GC26  
**Extraction Method:** METHOD **Level:** Low  
**Analysis Method:** GC-FPD **Extraction Lot:** KWG0508072

This Lab Control Sample applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Method Blank	KWG0508072-16	J:\GC26\DATA\053105\0531F004.D	05/31/05	18:52
LDW-T3-M-ES-WB-comp-4	K2503388-002	J:\GC26\DATA\053105\0531F007.D	05/31/05	19:41
LDW-T3-M-ES-WB-comp-4DUP	KWG0508072-17	J:\GC26\DATA\053105\0531F008.D	05/31/05	19:57
LDW-T3-M-ES-WB-comp-4MS	KWG0508072-1	J:\GC26\DATA\053105\0531F009.D	05/31/05	20:13
LDW-T3-M-ES-WB-comp-4DMS	KWG0508072-2	J:\GC26\DATA\053105\0531F010.D	05/31/05	20:29
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\GC26\DATA\053105\0531F011.D	05/31/05	20:45
LDW-T1-M-DC-EM-comp-2MS	KWG0508072-3	J:\GC26\DATA\053105\0531F012.D	05/31/05	21:02
LDW-T1-M-DC-EM-comp-2DMS	KWG0508072-4	J:\GC26\DATA\053105\0531F013.D	05/31/05	21:18
LDW-T3-F-PS-WB-comp-1	K2503388-009	J:\GC26\DATA\053105\0531F014.D	05/31/05	21:34
LDW-T3-F-PS-WB-comp-1MS	KWG0508072-5	J:\GC26\DATA\053105\0531F018.D	05/31/05	22:39
LDW-T3-F-PS-WB-comp-1DMS	KWG0508072-6	J:\GC26\DATA\053105\0531F019.D	05/31/05	22:55
LDW-T4-A-PS-WB-comp-1	K2503388-010	J:\GC26\DATA\053105\0531F020.D	05/31/05	23:11
LDW-T4-A-PS-WB-comp-1MS	KWG0508072-7	J:\GC26\DATA\053105\0531F021.D	05/31/05	23:28
LDW-T4-A-PS-WB-comp-1DMS	KWG0508072-8	J:\GC26\DATA\053105\0531F022.D	05/31/05	23:44
LDW-T1-M-ES-WB-comp-4	K2503388-015	J:\GC26\DATA\053105\0531F023.D	06/01/05	00:00
LDW-T1-M-ES-WB-comp-4MS	KWG0508072-9	J:\GC26\DATA\053105\0531F024.D	06/01/05	00:16
LDW-T1-M-ES-WB-comp-4DMS	KWG0508072-10	J:\GC26\DATA\053105\0531F025.D	06/01/05	00:33
LDW-T1-M-ES-WB-comp-5	K2503388-016	J:\GC26\DATA\053105\0531F026.D	06/01/05	00:49
LDW-T1-M-ES-WB-comp-5MS	KWG0508072-11	J:\GC26\DATA\053105\0531F030.D	06/01/05	01:54
LDW-T1-M-ES-WB-comp-5DMS	KWG0508072-12	J:\GC26\DATA\053105\0531F031.D	06/01/05	02:10
LDW-T2-M-ES-WB-comp-1	K2503388-017	J:\GC26\DATA\053105\0531F032.D	06/01/05	02:27
LDW-T2-M-ES-WB-comp-1MS	KWG0508072-13	J:\GC26\DATA\053105\0531F033.D	06/01/05	02:43
LDW-T2-M-ES-WB-comp-1DMS	KWG0508072-14	J:\GC26\DATA\053105\0531F034.D	06/01/05	02:59
Batch QC	KWG0508072-18	J:\GC26\DATA\061005\0610F003.D	06/10/05	08:49

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Butyltins (as cation)**

**Analysis Method:** GC-SPD

**Analysis Lot:** KWG0508702  
**Instrument ID:** GC26  
**Column:** RTX-1

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0531F002.D	Instrument Blank	KWG0508702-1	5/31/2005	18:20		5/31/2005	18:30
0531F003.D	Continuing Calibration Verification	KWG0508702-2	5/31/2005	18:36		5/31/2005	18:46
0531F004.D	Method Blank	KWG0508072-16	5/31/2005	18:52		5/31/2005	19:02
0531F005.D	Lab Control Sample	KWG0508072-15	5/31/2005	19:09		5/31/2005	19:19
0531F007.D	LDW-T3-M-ES-WB-comp-4	K2503388-002	5/31/2005	19:41		5/31/2005	19:51
0531F008.D	LDW-T3-M-ES-WB-comp-4DUP	KWG0508072-17	5/31/2005	19:57		5/31/2005	20:07
0531F009.D	LDW-T3-M-ES-WB-comp-4MS	KWG0508072-1	5/31/2005	20:13		5/31/2005	20:23
0531F010.D	LDW-T3-M-ES-WB-comp-4DMS	KWG0508072-2	5/31/2005	20:29		5/31/2005	20:39
0531F011.D	LDW-T1-M-DC-EM-comp-2	K2503388-004	5/31/2005	20:45		5/31/2005	20:55
0531F012.D	LDW-T1-M-DC-EM-comp-2MS	KWG0508072-3	5/31/2005	21:02		5/31/2005	21:12
0531F013.D	LDW-T1-M-DC-EM-comp-2DMS	KWG0508072-4	5/31/2005	21:18		5/31/2005	21:28
0531F014.D	LDW-T3-F-PS-WB-comp-1	K2503388-009	5/31/2005	21:34		5/31/2005	21:44
0531F016.D	Instrument Blank	KWG0508702-3	5/31/2005	22:06		5/31/2005	22:17
0531F017.D	Continuing Calibration Verification	KWG0508702-4	5/31/2005	22:23		5/31/2005	22:33
0531F018.D	LDW-T3-F-PS-WB-comp-1MS	KWG0508072-5	5/31/2005	22:39		5/31/2005	22:49
0531F019.D	LDW-T3-F-PS-WB-comp-1DMS	KWG0508072-6	5/31/2005	22:55		5/31/2005	23:05
0531F020.D	LDW-T4-A-PS-WB-comp-1	K2503388-010	5/31/2005	23:11		5/31/2005	23:21
0531F021.D	LDW-T4-A-PS-WB-comp-1MS	KWG0508072-7	5/31/2005	23:28		5/31/2005	23:38
0531F022.D	LDW-T4-A-PS-WB-comp-1DMS	KWG0508072-8	5/31/2005	23:44		5/31/2005	23:54
0531F023.D	LDW-T1-M-ES-WB-comp-4	K2503388-015	6/1/2005	00:00		6/1/2005	00:10
0531F024.D	LDW-T1-M-ES-WB-comp-4MS	KWG0508072-9	6/1/2005	00:16		6/1/2005	00:26
0531F025.D	LDW-T1-M-ES-WB-comp-4DMS	KWG0508072-10	6/1/2005	00:33		6/1/2005	00:44
0531F026.D	LDW-T1-M-ES-WB-comp-5	K2503388-016	6/1/2005	00:49		6/1/2005	00:59
0531F028.D	Instrument Blank	KWG0508702-5	6/1/2005	01:21		6/1/2005	01:31
0531F029.D	Continuing Calibration Verification	KWG0508702-6	6/1/2005	01:38		6/1/2005	01:48
0531F030.D	LDW-T1-M-ES-WB-comp-5MS	KWG0508072-11	6/1/2005	01:54		6/1/2005	02:04
0531F031.D	LDW-T1-M-ES-WB-comp-5DMS	KWG0508072-12	6/1/2005	02:10		6/1/2005	02:20
0531F032.D	LDW-T2-M-ES-WB-comp-1	K2503388-017	6/1/2005	02:27		6/1/2005	02:37
0531F033.D	LDW-T2-M-ES-WB-comp-1MS	KWG0508072-13	6/1/2005	02:43		6/1/2005	02:53
0531F034.D	LDW-T2-M-ES-WB-comp-1DMS	KWG0508072-14	6/1/2005	02:59		6/1/2005	03:09
0531FX35.D	ZZZZZZ	ZZZZZZ	6/1/2005	03:15		6/1/2005	03:25
0531F036.D	Instrument Blank	KWG0508702-7	6/1/2005	03:48		6/1/2005	03:58
0531F037.D	Continuing Calibration Verification	KWG0508702-8	6/1/2005	04:04		6/1/2005	04:14

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Butyltins (as cation)**

**Analysis Method:** GC-FPD

**Analysis Lot:** KWG0509444  
**Instrument ID:** GC26  
**Column:** RTX-1

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0610F001.D	Instrument Blank	KWG0509444-1	6/10/2005	08:17		6/10/2005	08:27
0610F002.D	Continuing Calibration Verification	KWG0509444-2	6/10/2005	08:33		6/10/2005	08:43
0610F003.D	Batch QC	KWG0508072-18	6/10/2005	08:49		6/10/2005	08:59
0610F004.D	Instrument Blank	KWG0509444-3	6/10/2005	09:05		6/10/2005	09:15
0610F005.D	Continuing Calibration Verification	KWG0509444-4	6/10/2005	09:22		6/10/2005	09:32

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/25/2005

**Extraction Prep Log**  
**Butyltins (as cation)**

**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Extraction Lot:** KWG0508072  
**Level:** Low

Sample Name	Lab Code	Date Collected	Date Received	Sample Amount	Final Volume	% Solids	Note
LDW-T3-M-ES-WB-comp-4	K2503388-002	08/30/04	12/09/04	5.19g	1.0ml	NA	
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/04	12/09/04	5.40g	1.0ml	NA	
LDW-T3-F-PS-WB-comp-1	K2503388-009	08/04/04	12/01/04	5.22g	1.0ml	NA	
LDW-T4-A-PS-WB-comp-1	K2503388-010	08/04/04	12/01/04	5.21g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-4	K2503388-015	08/02/04	12/01/04	5.15g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-5	K2503388-016	08/02/04	12/01/04	5.01g	1.0ml	NA	
LDW-T2-M-ES-WB-comp-1	K2503388-017	08/03/04	12/01/04	5.04g	1.0ml	NA	
LDW-T3-M-ES-WB-comp-4D	KWG0508072-17	08/30/04	12/09/04	5.17g	1.0ml	NA	
Method Blank	KWG0508072-16	NA	NA	5.00g	1.0ml	NA	
LDW-T3-M-ES-WB-comp-4	KWG0508072-1	08/30/04	12/09/04	5.03g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-4D	KWG0508072-10	08/02/04	12/01/04	5.04g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-5	KWG0508072-11	08/02/04	12/01/04	5.01g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-5D	KWG0508072-12	08/02/04	12/01/04	5.12g	1.0ml	NA	
LDW-T2-M-ES-WB-comp-1	KWG0508072-13	08/03/04	12/01/04	5.02g	1.0ml	NA	
LDW-T2-M-ES-WB-comp-1D	KWG0508072-14	08/03/04	12/01/04	5.04g	1.0ml	NA	
Batch QC	KWG0508072-18	NA	NA	1.03g	1.0ml	NA	
LDW-T3-M-ES-WB-comp-4D	KWG0508072-2	08/30/04	12/09/04	5.10g	1.0ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0508072-3	08/30/04	12/09/04	5.03g	1.0ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0508072-4	08/30/04	12/09/04	5.00g	1.0ml	NA	
LDW-T3-F-PS-WB-comp-1M	KWG0508072-5	08/04/04	12/01/04	5.01g	1.0ml	NA	
LDW-T3-F-PS-WB-comp-1D	KWG0508072-6	08/04/04	12/01/04	5.12g	1.0ml	NA	
LDW-T4-A-PS-WB-comp-1M	KWG0508072-7	08/04/04	12/01/04	5.02g	1.0ml	NA	
LDW-T4-A-PS-WB-comp-1D	KWG0508072-8	08/04/04	12/01/04	5.10g	1.0ml	NA	
LDW-T1-M-ES-WB-comp-4	KWG0508072-9	08/02/04	12/01/04	5.01g	1.0ml	NA	
Lab Control Sample	KWG0508072-15	NA	NA	5.00g	1.0ml	NA	

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T3-M-ES-WB-comp-4  
**Lab Code:** K2503388-002  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.053	3.9	3.8	2.6		1	05/31/05
Di-n-butyltin	2.0	0.081	2.2	2.0	9.5		1	05/31/05
n-Butyltin	2.0	0.12	1.0	0.99	1.0	J	1	05/31/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	1.9	0.050	1.8	1.7	5.7	J	1	05/31/05
Di-n-butyltin	1.9	0.078	0.64	0.58	9.8	J	1	05/31/05



**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T3-F-PS-WB-comp-1  
**Lab Code:** K2503388-009  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.052	40	38	5.1		1	05/31/05
Di-n-butyltin	2.0	0.081	4.1	4.0	2.5		1	05/31/05
n-Butyltin	2.0	0.12	0.46	0.45	2.2	J	1	05/31/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T4-A-PS-WB-comp-1  
**Lab Code:** K2503388-010  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.052	38	35	8.2		1	05/31/05
Di-n-butyltin	2.0	0.081	3.5	3.5	0.0		1	05/31/05
n-Butyltin	2.0	0.12	0.45	0.41	9.3	J	1	05/31/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.053	8.7	7.8	10.9		1	06/01/05
Di-n-butyltin	2.0	0.082	3.3	3.1	6.2		1	06/01/05
n-Butyltin	2.0	0.12	1.5	1.3	14.3	J	1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T1-M-ES-WB-comp-5  
**Lab Code:** K2503388-016  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.054	11	10	9.5		1	06/01/05
Di-n-butyltin	2.0	0.084	3.3	3.1	6.2		1	06/01/05
n-Butyltin	2.0	0.13	1.3	1.2	8.0	J	1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Tri-n-butyltin	2.0	0.054	7.1	10	33.9		1	06/01/05
Di-n-butyltin	2.0	0.084	2.8	3.1	10.2		1	06/01/05
n-Butyltin	2.0	0.13	1.2	2.3	62.9	JP	1	06/01/05

COLUMBIA ANALYTICAL SERVICES, INC.

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 05/25/2005

**Butyltins (as cation)**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508072-16  
**Extraction Method:** METHOD  
**Analysis Method:** GC-FPD

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
n-Butyltin	2.0	0.13	0.36	0.35	2.8	J	1	05/31/05

**Organochlorine Pesticides  
EPA Method 8081**

Organic Analysis:  
Organochlorine Pesticides

Summary Package

Sample and QC Results



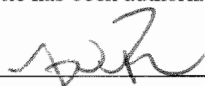
Client: Windward Environmental  
 Project: LDW/04-08-06-22

Service Request: K2503388

**Cover Page - Organic Analysis Data Package  
 Organochlorine Pesticides**

Sample Name	Lab Code	Date Collected	Date Received
LDW-T4-M-SF-FL-comp-1	K2503388-001	08/03/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/2004	12/09/2004
LDW-T3-B-PS-WB-comp-1	K2503388-007	08/03/2004	12/01/2004
LDW-T3-E-PS-WB-comp-1	K2503388-008	08/03/2004	12/01/2004
LDW-T1-M-ES-WB-comp-2	K2503388-013	08/05/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3	K2503388-019	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3DL	K2503388-019	08/03/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/2004	12/01/2004
LDW-T4-M-SF-FL-comp-1	KWG0508101-1	08/03/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1DM	KWG0508101-10	08/30/2004	12/09/2004
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-11	08/03/2004	12/01/2004
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-12	08/03/2004	12/01/2004
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-13	08/03/2004	12/01/2004
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-14	08/03/2004	12/01/2004
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-15	08/03/2004	12/01/2004
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-16	08/03/2004	12/01/2004
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-17	08/03/2004	12/01/2004
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-18	08/03/2004	12/01/2004
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-19	08/05/2004	12/01/2004
LDW-T1-M-ES-WB-comp-2DM	KWG0508101-20	08/05/2004	12/01/2004
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-21	08/05/2004	12/01/2004
LDW-T1-M-ES-WB-comp-2DM	KWG0508101-22	08/05/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-23	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3DM	KWG0508101-24	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-25	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-3DM	KWG0508101-26	08/03/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-27	08/30/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2DM	KWG0508101-28	08/30/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-29	08/30/2004	12/01/2004
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-3	08/03/2004	12/09/2004
LDW-T4-M-ES-WB-comp-2DM	KWG0508101-30	08/30/2004	12/01/2004
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-4	08/03/2004	12/09/2004
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-5	08/03/2004	12/09/2004
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-6	08/03/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-7	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1DM	KWG0508101-8	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-9	08/30/2004	12/09/2004

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the case narrative. Release of the data contained in this hardcopy data package and in the computer-readable data submitted on floppy diskette has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature:   
 Date: 6/9/05

Name: Todd Payne  
 Title: \_\_\_\_\_

## Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

## Organochlorine Pesticides

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**File ID:** J:\GC23\DATA\053105\0531F011.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
118-74-1	Hexachlorobenzene	0.48	U	2.0	0.48	
319-84-6	alpha-BHC	0.64	U	2.0	0.64	
319-85-7	beta-BHC	3.0		2.0	0.62	
58-89-9	gamma-BHC (Lindane)	1.3	JP	2.0	0.34	
319-86-8	delta-BHC	0.42	U	2.0	0.42	
76-44-8	Heptachlor	3.1	Ui	3.1	3.1	
309-00-2	Aldrin	0.30	U	2.0	0.30	
1024-57-3	Heptachlor Epoxide	2.6	Ui	2.6	2.6	
5103-74-2	gamma-Chlordane†	6.2	Ui	6.2	6.2	
959-98-8	Endosulfan I	0.34	U	2.0	0.34	
5103-71-9	alpha-Chlordane	2.0	Ui	2.0	2.0	
60-57-1	Dieldrin	2.0	Ui	2.0	2.0	
72-55-9	4,4'-DDE	9.1		2.0	0.20	
72-20-8	Endrin	1.7	JP	2.0	0.15	
33213-65-9	Endosulfan II	2.0	Ui	2.0	2.0	
72-54-8	4,4'-DDD	4.3		2.0	0.32	
7421-93-4	Endrin Aldehyde	1.6	JP	2.0	0.34	
1031-07-8	Endosulfan Sulfate	0.38	U	2.0	0.38	
50-29-3	4,4'-DDT	15		2.0	0.40	
53494-70-5	Endrin Ketone	0.80	U	2.0	0.80	
72-43-5	Methoxychlor	1.4	Ui	2.0	1.4	
8001-35-2	Toxaphene	160	Ui	160	160	
3424-82-6	2,4'-DDE	2.2		2.0	0.30	
53-19-0	2,4'-DDD	2.0	Ui	2.0	2.0	
789-02-6	2,4'-DDT	26	P	2.0	0.24	
2385-85-5	Mirex	0.48	U	2.0	0.48	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**File ID:** J:\GC23\DATA\053105\0531F011.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	76	30-150	05/31/05	Acceptable
Decachlorobiphenyl	86	30-150	05/31/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**File ID:** J:\GC23\DATA\053105\0531F017.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
319-84-6	alpha-BHC	0.64	U	2.0	0.64	
118-74-1	Hexachlorobenzene	0.48	U	2.0	0.48	
319-85-7	beta-BHC	4.2	Ui	4.2	4.2	
<b>58-89-9</b>	<b>gamma-BHC (Lindane)</b>	<b>4.9</b>	<b>P</b>	2.0	0.34	
319-86-8	delta-BHC	2.0	Ui	2.0	2.0	
76-44-8	Heptachlor	0.62	U	2.0	0.62	
<b>309-00-2</b>	<b>Aldrin</b>	<b>1.2</b>	<b>JP</b>	2.0	0.30	
1024-57-3	Heptachlor Epoxide	2.0	Ui	2.0	2.0	
<b>5103-74-2</b>	<b>gamma-Chlordane†</b>	<b>1.3</b>	<b>JP</b>	2.0	0.34	
959-98-8	Endosulfan I	0.89	Ui	2.0	0.89	
5103-71-9	alpha-Chlordane	0.73	Ui	2.0	0.73	
<b>60-57-1</b>	<b>Dieldrin</b>	<b>3.2</b>		2.0	0.15	
<b>72-55-9</b>	<b>4,4'-DDE</b>	<b>2.4</b>	<b>P</b>	2.0	0.20	
72-20-8	Endrin	0.15	U	2.0	0.15	
33213-65-9	Endosulfan II	0.48	U	2.0	0.48	
72-54-8	4,4'-DDD	1.5	Ui	2.0	1.5	
7421-93-4	Endrin Aldehyde	0.39	Ui	2.0	0.39	
1031-07-8	Endosulfan Sulfate	0.38	U	2.0	0.38	
<b>50-29-3</b>	<b>4,4'-DDT</b>	<b>5.4</b>		2.0	0.40	
53494-70-5	Endrin Ketone	0.80	U	2.0	0.80	
72-43-5	Methoxychlor	0.71	Ui	2.0	0.71	
8001-35-2	Toxaphene	85	Ui	100	85	
3424-82-6	2,4'-DDE	1.8	Ui	2.0	1.8	
53-19-0	2,4'-DDD	2.0	Ui	2.0	2.0	
<b>789-02-6</b>	<b>2,4'-DDT</b>	<b>6.6</b>		2.0	0.24	
2385-85-5	Mirex	0.48	U	2.0	0.48	

**Comments:**

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**File ID:** J:\GC23\DATA\053105\0531F017.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	73	30-150	06/01/05	Acceptable
Decachlorobiphenyl	87	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-B-PS-WB-comp-1  
**Lab Code:** K2503388-007  
**File ID:** J:\GC23\DATA\053105\0531F029.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
118-74-1	<b>Hexachlorobenzene</b>	2.1	P	2.0	0.48	
319-84-6	alpha-BHC	2.0	Ui	2.0	2.0	
319-85-7	beta-BHC	0.62	U	2.0	0.62	
58-89-9	gamma-BHC (Lindane)	0.34	U	2.0	0.34	
319-86-8	delta-BHC	0.42	U	2.0	0.42	
76-44-8	Heptachlor	2.0	Ui	2.0	2.0	
309-00-2	Aldrin	2.0	Ui	2.0	2.0	
1024-57-3	Heptachlor Epoxide	3.3	Ui	3.3	3.3	
<b>5103-74-2</b>	<b>gamma-Chlordane†</b>	<b>17</b>		2.0	0.34	
<b>959-98-8</b>	<b>Endosulfan I</b>	<b>1.3</b>	J	2.0	0.34	
5103-71-9	alpha-Chlordane	1.4	Ui	2.0	1.4	
60-57-1	Dieldrin	0.15	U	2.0	0.15	
72-55-9	4,4'-DDE	3.6	Ui	3.6	3.6	
<b>72-20-8</b>	<b>Endrin</b>	<b>2.9</b>	P	2.0	0.15	
33213-65-9	Endosulfan II	3.7	Ui	3.7	3.7	
<b>72-54-8</b>	<b>4,4'-DDD</b>	<b>4.3</b>		2.0	0.32	
7421-93-4	Endrin Aldehyde	4.5	Ui	4.5	4.5	
<b>1031-07-8</b>	<b>Endosulfan Sulfate</b>	<b>0.62</b>	JP	2.0	0.38	
<b>50-29-3</b>	<b>4,4'-DDT</b>	<b>47</b>	P	2.0	0.40	
53494-70-5	Endrin Ketone	3.5	Ui	3.5	3.5	
72-43-5	Methoxychlor	2.3	Ui	2.3	2.3	
8001-35-2	Toxaphene	390	Ui	390	390	
3424-82-6	2,4'-DDE	2.0	Ui	2.0	2.0	
53-19-0	2,4'-DDD	7.6	Ui	7.6	7.6	
<b>789-02-6</b>	<b>2,4'-DDT</b>	<b>59</b>		2.0	0.24	
2385-85-5	Mirex	0.48	U	2.0	0.48	

**Comments:**

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-B-PS-WB-comp-1  
**Lab Code:** K2503388-007  
**File ID:** J:\GC23\DATA\053105\0531F029.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	76	30-150	06/01/05	Acceptable
Decachlorobiphenyl	82	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-E-PS-WB-comp-1  
**Lab Code:** K2503388-008  
**File ID:** J:\GC23\DATA\053105\0531F034.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.51 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
118-74-1	Hexachlorobenzene	1.6	J	2.2	0.51	
319-84-6	alpha-BHC	0.91	JP	2.2	0.68	
319-85-7	beta-BHC	0.66	U	2.2	0.66	
58-89-9	gamma-BHC (Lindane)	0.36	U	2.2	0.36	
319-86-8	delta-BHC	0.45	U	2.2	0.45	
76-44-8	Heptachlor	2.2	Ui	2.2	2.2	
309-00-2	Aldrin	2.2	Ui	2.2	2.2	
1024-57-3	Heptachlor Epoxide	10	P	2.2	0.72	
5103-74-2	gamma-Chlordane†	3.6	Ui	3.6	3.6	
959-98-8	Endosulfan I	1.1	Ui	2.2	1.1	
5103-71-9	alpha-Chlordane	1.2	Ui	2.2	1.2	
60-57-1	Dieldrin	0.16	U	2.2	0.16	
72-55-9	4,4'-DDE	9.8	P	2.2	0.22	
72-20-8	Endrin	1.4	Ui	2.2	1.4	
33213-65-9	Endosulfan II	4.5	P	2.2	0.51	
72-54-8	4,4'-DDD	3.9	P	2.2	0.34	
7421-93-4	Endrin Aldehyde	3.3	Ui	3.3	3.3	
1031-07-8	Endosulfan Sulfate	0.91	J	2.2	0.40	
50-29-3	4,4'-DDT	52	Ui	52	52	
53494-70-5	Endrin Ketone	5.3	Ui	5.3	5.3	
72-43-5	Methoxychlor	3.2	Ui	3.2	3.2	
8001-35-2	Toxaphene	410	Ui	410	410	
3424-82-6	2,4'-DDE	3.5	Ui	3.5	3.5	
53-19-0	2,4'-DDD	22	P	2.2	0.68	
789-02-6	2,4'-DDT	70	P	2.2	0.26	
2385-85-5	Mirex	0.51	U	2.2	0.51	

Comments:



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-E-PS-WB-comp-1  
**Lab Code:** K2503388-008  
**File ID:** J:\GC23\DATA\053105\0531F034.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.51 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	89	30-150	06/01/05	Acceptable
Decachlorobiphenyl	95	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/05/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-ES-WB-comp-2  
**Lab Code:** K2503388-013  
**File ID:** J:\GC23\DATA\053105\0531F046.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
319-84-6	alpha-BHC	1.4	Ui	2.3	1.4	
<b>118-74-1</b>	<b>Hexachlorobenzene</b>	<b>0.95</b>	J	2.3	0.54	
319-85-7	beta-BHC	2.9	P	2.3	0.69	
<b>58-89-9</b>	<b>gamma-BHC (Lindane)</b>	<b>0.95</b>	JP	2.3	0.38	
319-86-8	delta-BHC	2.3	Ui	2.3	2.3	
76-44-8	Heptachlor	2.3	Ui	2.3	2.3	
309-00-2	Aldrin	2.3	Ui	2.3	2.3	
<b>1024-57-3</b>	<b>Heptachlor Epoxide</b>	<b>19</b>		2.3	0.76	
<b>5103-74-2</b>	<b>gamma-Chlordane†</b>	<b>25</b>		2.3	0.38	
<b>959-98-8</b>	<b>Endosulfan I</b>	<b>1.8</b>	J	2.3	0.38	
<b>5103-71-9</b>	<b>alpha-Chlordane</b>	<b>3.7</b>		2.3	0.25	
60-57-1	Dieldrin	2.3	Ui	2.3	2.3	
<b>72-55-9</b>	<b>4,4'-DDE</b>	<b>12</b>	P	2.3	0.23	
<b>72-20-8</b>	<b>Endrin</b>	<b>3.8</b>	P	2.3	0.17	
33213-65-9	Endosulfan II	4.2	Ui	4.2	4.2	
<b>72-54-8</b>	<b>4,4'-DDD</b>	<b>11</b>		2.3	0.36	
7421-93-4	Endrin Aldehyde	3.1	Ui	3.1	3.1	
1031-07-8	Endosulfan Sulfate	0.43	U	2.3	0.43	
<b>50-29-3</b>	<b>4,4'-DDT</b>	<b>52</b>		2.3	0.45	
53494-70-5	Endrin Ketone	3.8	Ui	3.8	3.8	
72-43-5	Methoxychlor	4.6	Ui	4.6	4.6	
8001-35-2	Toxaphene	780	Ui	780	780	
3424-82-6	2,4'-DDE	6.7	Ui	6.7	6.7	
53-19-0	2,4'-DDD	10	Ui	10	10	
<b>789-02-6</b>	<b>2,4'-DDT</b>	<b>61</b>		2.3	0.27	
2385-85-5	Mirex	0.63	Ui	2.3	0.63	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/05/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-ES-WB-comp-2  
**Lab Code:** K2503388-013  
**File ID:** J:\GC23\DATA\053105\0531F046.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	78	30-150	06/01/05	Acceptable
Decachlorobiphenyl	83	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3  
**Lab Code:** K2503388-019  
**File ID:** J:\GC23\DATA\053105\0531F051.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.01 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
118-74-1	Hexachlorobenzene	2.0	J	2.3	0.54	
319-84-6	alpha-BHC	2.3	Ui	2.3	2.3	
319-85-7	beta-BHC	4.0	Ui	4.0	4.0	
58-89-9	gamma-BHC (Lindane)	2.3	Ui	2.3	2.3	
319-86-8	delta-BHC	2.2	Ui	2.3	2.2	
76-44-8	Heptachlor	0.69	U	2.3	0.69	
309-00-2	Aldrin	8.5	P	2.3	0.34	
1024-57-3	Heptachlor Epoxide	8.6	P	2.3	0.76	
5103-74-2	gamma-Chlordane†	37		2.3	0.38	
959-98-8	Endosulfan I	3.8	Ui	3.8	3.8	
5103-71-9	alpha-Chlordane	4.7	Ui	4.7	4.7	
60-57-1	Dieldrin	0.17	U	2.3	0.17	
72-55-9	4,4'-DDE	18	P	2.3	0.23	
72-20-8	Endrin	3.5	Ui	3.5	3.5	
33213-65-9	Endosulfan II	4.1	Ui	4.1	4.1	
72-54-8	4,4'-DDD	16		2.3	0.36	
7421-93-4	Endrin Aldehyde	4.4	Ui	4.4	4.4	
1031-07-8	Endosulfan Sulfate	0.43	U	2.3	0.43	
50-29-3	4,4'-DDT	98	E	2.3	0.45	
53494-70-5	Endrin Ketone	5.2	Ui	5.2	5.2	
72-43-5	Methoxychlor	8.7	Ui	8.7	8.7	
8001-35-2	Toxaphene	980	Ui	980	980	
3424-82-6	2,4'-DDE	3.8	Ui	3.8	3.8	
53-19-0	2,4'-DDD	14	Ui	14	14	
789-02-6	2,4'-DDT	88		2.3	0.27	
2385-85-5	Mirex	0.54	U	2.3	0.54	

**Comments:**

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3  
**Lab Code:** K2503388-019  
**File ID:** J:\GC23\DATA\053105\0531F051.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.01 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	50	30-150	06/01/05	Acceptable
Decachlorobiphenyl	76	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/02/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3DL  
**Lab Code:** K2503388-019  
**File ID:** J:\GC23\DATA\053105\0531F070.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.01 g  
**% Solids:** NA  
**Dilution Factor:** 10

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result Q	MRL	MDL	Note
118-74-1	Hexachlorobenzene	5.4 U	23	5.4	
319-84-6	alpha-BHC	7.2 U	23	7.2	
319-85-7	beta-BHC	13 JD	23	6.9	
58-89-9	gamma-BHC (Lindane)	8.1 JD	23	3.8	
319-86-8	delta-BHC	5.6 JD	23	4.7	
76-44-8	Heptachlor	13 JD	23	6.9	
309-00-2	Aldrin	22 JPD	23	3.4	
1024-57-3	Heptachlor Epoxide	30 PD	23	7.6	
5103-74-2	gamma-Chlordane†	110 D	23	3.8	
959-98-8	Endosulfan I	12 JD	23	3.8	
5103-71-9	alpha-Chlordane	28 D	23	2.5	
60-57-1	Dieldrin	46 D	23	1.7	
72-55-9	4,4'-DDE	54 PD	23	2.3	
72-20-8	Endrin	10 JD	23	1.7	
33213-65-9	Endosulfan II	12 JD	23	5.4	
72-54-8	4,4'-DDD	31 D	23	3.6	
7421-93-4	Endrin Aldehyde	14 JD	23	3.8	
1031-07-8	Endosulfan Sulfate	4.3 U	23	4.3	
50-29-3	4,4'-DDT	180 D	23	4.5	
53494-70-5	Endrin Ketone	12 JD	23	8.9	
72-43-5	Methoxychlor	16 JD	23	7.2	
8001-35-2	Toxaphene	2000 D	1200	320	
3424-82-6	2,4'-DDE	20 JD	23	3.4	
53-19-0	2,4'-DDD	40 D	23	7.2	
789-02-6	2,4'-DDT	220 D	23	2.7	
2385-85-5	Mirex	5.4 U	23	5.4	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/02/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3DL  
**Lab Code:** K2503388-019  
**File ID:** J:\GC23\DATA\053105\0531F070.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 9.01 g  
**% Solids:** NA  
**Dilution Factor:** 10

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	159	30-150	06/02/05	Outside Control Limits
Decachlorobiphenyl	180	30-150	06/02/05	Outside Control Limits

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**File ID:** J:\GC23\DATA\053105\0531F063.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
319-84-6	alpha-BHC	3.3	Ui	3.3	3.3	
<b>118-74-1</b>	<b>Hexachlorobenzene</b>	<b>1.4</b>	JP	2.0	0.48	
319-85-7	beta-BHC	0.62	U	2.0	0.62	
58-89-9	gamma-BHC (Lindane)	4.8	Ui	4.8	4.8	
319-86-8	delta-BHC	0.42	U	2.0	0.42	
76-44-8	Heptachlor	0.62	U	2.0	0.62	
309-00-2	Aldrin	4.4	Ui	4.4	4.4	
<b>1024-57-3</b>	<b>Heptachlor Epoxide</b>	<b>5.5</b>	P	2.0	0.68	
5103-74-2	gamma-Chlordane†	17	Ui	17	17	
959-98-8	Endosulfan I	0.34	U	2.0	0.34	
5103-71-9	alpha-Chlordane	2.9	Ui	2.9	2.9	
60-57-1	Dieldrin	1.1	Ui	2.0	1.1	
<b>72-55-9</b>	<b>4,4'-DDE</b>	<b>23</b>		2.0	0.20	
72-20-8	Endrin	1.8	Ui	2.0	1.8	
33213-65-9	Endosulfan II	2.0	Ui	2.0	2.0	
<b>72-54-8</b>	<b>4,4'-DDD</b>	<b>8.1</b>		2.0	0.32	
7421-93-4	Endrin Aldehyde	2.0	Ui	2.0	2.0	
1031-07-8	Endosulfan Sulfate	0.38	U	2.0	0.38	
50-29-3	4,4'-DDT	35	Ui	35	35	
53494-70-5	Endrin Ketone	3.4	Ui	3.4	3.4	
72-43-5	Methoxychlor	2.0	Ui	2.0	2.0	
8001-35-2	Toxaphene	640	Ui	640	640	
<b>3424-82-6</b>	<b>2,4'-DDE</b>	<b>27</b>		2.0	0.30	
53-19-0	2,4'-DDD	7.3	Ui	7.3	7.3	
<b>789-02-6</b>	<b>2,4'-DDT</b>	<b>45</b>		2.0	0.24	
2385-85-5	Mirex	0.48	U	2.0	0.48	

**Comments:** \_\_\_\_\_



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**File ID:** J:\GC23\DATA\053105\0531F063.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 10.02 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	69	30-150	06/01/05	Acceptable
Decachlorobiphenyl	77	30-150	06/01/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Organochlorine Pesticides**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508101-33  
**File ID:** J:\GC23\DATA\053105\0531F008.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 20.03 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
319-84-6	alpha-BHC	0.32	U	1.0	0.32	
118-74-1	Hexachlorobenzene	0.24	U	1.0	0.24	
319-85-7	beta-BHC	0.31	U	1.0	0.31	
58-89-9	gamma-BHC (Lindane)	0.17	U	1.0	0.17	
319-86-8	delta-BHC	0.21	U	1.0	0.21	
76-44-8	Heptachlor	0.31	U	1.0	0.31	
309-00-2	Aldrin	0.15	U	1.0	0.15	
1024-57-3	Heptachlor Epoxide	0.34	U	1.0	0.34	
5103-74-2	gamma-Chlordane†	0.17	U	1.0	0.17	
959-98-8	Endosulfan I	0.17	U	1.0	0.17	
5103-71-9	alpha-Chlordane	0.11	U	1.0	0.11	
60-57-1	Dieldrin	0.075	U	1.0	0.075	
72-55-9	4,4'-DDE	0.10	U	1.0	0.10	
72-20-8	Endrin	0.075	U	1.0	0.075	
33213-65-9	Endosulfan II	0.24	U	1.0	0.24	
72-54-8	4,4'-DDD	0.16	U	1.0	0.16	
7421-93-4	Endrin Aldehyde	0.17	U	1.0	0.17	
1031-07-8	Endosulfan Sulfate	0.19	U	1.0	0.19	
50-29-3	4,4'-DDT	0.20	U	1.0	0.20	
53494-70-5	Endrin Ketone	0.40	U	1.0	0.40	
72-43-5	Methoxychlor	0.32	U	1.0	0.32	
8001-35-2	Toxaphene	14	U	50	14	
3424-82-6	2,4'-DDE	0.15	U	1.0	0.15	
53-19-0	2,4'-DDD	0.32	U	1.0	0.32	
789-02-6	2,4'-DDT	0.12	U	1.0	0.12	
2385-85-5	Mirex	0.24	U	1.0	0.24	

**Comments:**

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Organochlorine Pesticides**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508101-33  
**File ID:** J:\GC23\DATA\053105\0531F008.D  
**Instrument ID:** GC23

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Calibration ID:** CAL4382

**Sample Amount:** 20.03 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB XLB  
**Column2:** DB-35MS

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Tetrachloro-m-xylene	80	30-150	05/31/05	Acceptable
Decachlorobiphenyl	89	30-150	05/31/05	Acceptable

† Analyte Comments

gamma-Chlordane For this analyte (CAS Registry No. 5103-74-2), USEPA has corrected the name to be beta-Chlordane, also known as trans-Chlordane.

**Comments:** \_\_\_\_\_

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary  
Organochlorine Pesticides**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** PERCENT  
**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>	<u>Sur2</u>
LDW-T4-M-SF-FL-comp-1	K2503388-001	76	86
LDW-T1-M-DC-EM-comp-1	K2503388-003	73	87
LDW-T3-B-PS-WB-comp-1	K2503388-007	76	82
LDW-T3-E-PS-WB-comp-1	K2503388-008	89	95
LDW-T1-M-ES-WB-comp-2	K2503388-013	78	83
LDW-T2-M-ES-WB-comp-3	K2503388-019	50	76
LDW-T2-M-ES-WB-comp-3DL	K2503388-019	159 D *	180 D *
LDW-T4-M-ES-WB-comp-2	K2503388-020	69	77
LDW-T4-M-SF-FL-comp-1DUP	KWG0508101-1	89	98
Method Blank	KWG0508101-33	80	89
LDW-T1-M-DC-EM-comp-1DM	KWG0508101-10	69	83
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-11	78	81
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-12	76	84
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-13	74	83
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-14	76	85
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-15	67	78
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-16	74	84
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-17	76	88
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-18	75	85
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-19	74	76
LDW-T1-M-ES-WB-comp-2DM	KWG0508101-20	77	80
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-21	72	80
LDW-T1-M-ES-WB-comp-2DM	KWG0508101-22	75	80
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-23	49	76
LDW-T2-M-ES-WB-comp-3DM	KWG0508101-24	52	76
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-25	48	77
LDW-T2-M-ES-WB-comp-3DM	KWG0508101-26	49	77
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-27	70	77
LDW-T4-M-ES-WB-comp-2DM	KWG0508101-28	70	76
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-29	68	74
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-3	82	95
LDW-T4-M-ES-WB-comp-2DM	KWG0508101-30	67	76
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-4	87	98
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-5	81	94

**Surrogate Recovery Control Limits (%)**

---

Sur1 = Tetrachloro-m-xylene                      30-150  
 Sur2 = Decachlorobiphenyl                      30-150

---

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary  
 Organochlorine Pesticides**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** PERCENT  
**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>	<u>Sur2</u>
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-6	88	99
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-7	74	86
LDW-T1-M-DC-EM-comp-1DM	KWG0508101-8	77	90
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-9	73	87
Lab Control Sample	KWG0508101-31	68	84
Lab Control Sample	KWG0508101-32	72	84

**Surrogate Recovery Control Limits (%)**

---

Sur1 = Tetrachloro-m-xylene	30-150
Sur2 = Decachlorobiphenyl	30-150

---

Results flagged with an asterisk (\*) indicate values outside control criteria.  
 Results flagged with a pound (#) indicate the control criteria is not applicable.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T3-B-PS-WB-comp-1  
**Lab Code:** K2503388-007  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T3-B-PS-WB-comp-1MS KWG0508101-11 Matrix Spike			LDW-T3-B-PS-WB-comp-1DMS KWG0508101-12 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
		alpha-BHC	ND	31.0	39.9	78	30.7			
Hexachlorobenzene	2.1	32.1	39.9	75	33.6	40.0	79	30-150	5	50
beta-BHC	ND	23.7	39.9	59	25.0	40.0	63	30-150	5	50
gamma-BHC (Lindane)	ND	30.4	39.9	76	30.6	40.0	77	30-150	0	50
delta-BHC	ND	29.0	39.9	73	32.7	40.0	82	30-150	12	50
Heptachlor	ND	27.0	39.9	68	30.2	40.0	75	30-150	11	50
Aldrin	ND	34.8	39.9	87	37.1	40.0	93	30-150	7	50
Heptachlor Epoxide	ND	31.1	39.9	78 #	34.3	40.0	86 #	30-150	10	50
gamma-Chlordane	17	43.8	39.9	67	49.7	40.0	81	30-150	13	50
Endosulfan I	1.3	33.8	39.9	81	35.2	40.0	85	30-150	4	50
alpha-Chlordane	ND	35.5	39.9	89	40.4	40.0	101	30-150	13	50
Dieldrin	ND	31.1	39.9	78	33.9	40.0	85	30-150	8	50
4,4'-DDE	ND	56.8	39.9	142 #	56.8	40.0	142 #	30-150	0	50
Endrin	2.9	38.7	39.9	90	40.9	40.0	95	30-150	6	50
Endosulfan II	ND	35.9	39.9	90 #	39.3	40.0	98 #	30-150	9	50
4,4'-DDD	4.3	40.3	39.9	90	42.4	40.0	95	30-150	5	50
Endrin Aldehyde	ND	19.9	39.9	50 #	21.1	40.0	53 #	30-150	6	50
Endosulfan Sulfate	0.62	31.5	39.9	77	33.9	40.0	83	30-150	7	50
4,4'-DDT	47	75.4	39.9	72	84.4E	40.0	94	30-150	11	50
Endrin Ketone	ND	31.9	39.9	80 #	34.8	40.0	87 #	30-150	9	50
Methoxychlor	ND	29.2	39.9	73 #	31.5	40.0	79 #	30-150	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T3-B-PS-WB-comp-1  
**Lab Code:** K2503388-007  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T3-B-PS-WB-comp-1MS KWG0508101-13 Matrix Spike			LDW-T3-B-PS-WB-comp-1DMS KWG0508101-14 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	ND	44.1	39.9	111	42.8	39.9	107	30-150	3	50
2,4'-DDD	ND	41.5	39.9	104 #	37.1	39.9	93 #	30-150	11	50
2,4'-DDT	59	96.8E	39.9	95	91.1E	39.9	80	30-150	6	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T3-E-PS-WB-comp-1  
**Lab Code:** K2503388-008  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T3-E-PS-WB-comp-1MS			LDW-T3-E-PS-WB-comp-1DMS			%Rec Limits	RPD	RPD Limit
		KWG0508101-15			KWG0508101-16					
		Result	Expected	%Rec	Result	Expected	%Rec			
alpha-BHC	0.91	30.3	42.0	70	34.3	42.0	80	30-150	12	50
Hexachlorobenzene	1.6	31.0	42.0	70	33.6	42.0	76	30-150	8	50
beta-BHC	ND	38.1	42.0	91	41.4	42.0	99	30-150	8	50
gamma-BHC (Lindane)	ND	29.5	42.0	70	32.6	42.0	78	30-150	10	50
delta-BHC	ND	33.5	42.0	80	36.4	42.0	87	30-150	8	50
Heptachlor	ND	35.0	42.0	83	38.5	42.0	92	30-150	10	50
Aldrin	ND	33.6	42.0	80	37.5	42.0	89	30-150	11	50
Heptachlor Epoxide	10	35.4	42.0	60	39.1	42.0	68	30-150	10	50
gamma-Chlordane	ND	42.7	42.0	102 #	46.8	42.0	111 #	30-150	9	50
Endosulfan I	ND	33.3	42.0	79	36.5	42.0	87	30-150	9	50
alpha-Chlordane	ND	35.6	42.0	85	38.4	42.0	91	30-150	8	50
Dieldrin	ND	33.9	42.0	81	36.7	42.0	87	30-150	8	50
4,4'-DDE	9.8	54.5	42.0	107	58.8	42.0	117	30-150	8	50
Endrin	ND	37.2	42.0	89	41.3	42.0	98	30-150	10	50
Endosulfan II	4.5	38.3	42.0	80	43.5	42.0	93	30-150	13	50
4,4'-DDD	3.9	39.8	42.0	86	43.6	42.0	94	30-150	9	50
Endrin Aldehyde	ND	35.6	42.0	85 #	38.7	42.0	92 #	30-150	8	50
Endosulfan Sulfate	0.91	34.7	42.0	81	37.7	42.0	88	30-150	8	50
4,4'-DDT	ND	76.7	42.0	183 #	85.9E	42.0	204 #	30-150	11	50
Endrin Ketone	ND	35.2	42.0	84 #	38.9	42.0	93 #	30-150	10	50
Methoxychlor	ND	31.4	42.0	75 #	34.5	42.0	82 #	30-150	9	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T3-E-PS-WB-comp-1  
**Lab Code:** K2503388-008  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T3-E-PS-WB-comp-1MS KWG0508101-17 Matrix Spike			LDW-T3-E-PS-WB-comp-1DMS KWG0508101-18 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	ND	52.2	42.0	124 #	50.0	42.0	119 #	30-150	4	50
2,4'-DDD	22	64.7	42.0	102	60.0	42.0	91	30-150	8	50
2,4'-DDT	70	103E	42.0	79	107E	42.0	89	30-150	4	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-ES-WB-comp-2  
**Lab Code:** K2503388-013  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-2MS			LDW-T1-M-ES-WB-comp-2DMS			%Rec Limits	RPD	RPD Limit
		KWG0508101-19			KWG0508101-20					
		Result	Expected	%Rec	Result	Expected	%Rec			
alpha-BHC	ND	30.5	44.3	69	32.6	44.3	74	30-150	7	50
Hexachlorobenzene	0.95	30.6	44.3	67	32.9	44.3	72	30-150	7	50
beta-BHC	2.9	37.0	44.3	77	39.4	44.3	82	30-150	6	50
gamma-BHC (Lindane)	0.95	30.9	44.3	67	32.0	44.3	70	30-150	4	50
delta-BHC	ND	27.1	44.3	61	27.4	44.3	62	30-150	1	50
Heptachlor	ND	28.5	44.3	64	31.4	44.3	71	30-150	10	50
Aldrin	ND	37.8	44.3	85	28.9	44.3	65	30-150	27	50
Heptachlor Epoxide	19	43.1	44.3	54	38.6	44.3	44	30-150	11	50
gamma-Chlordane	25	51.0	44.3	59	49.0	44.3	55	30-150	4	50
Endosulfan I	1.8	29.0	44.3	61	29.6	44.3	63	30-150	2	50
alpha-Chlordane	3.7	31.5	44.3	63	32.9	44.3	66	30-150	4	50
Dieldrin	ND	30.5	44.3	69	30.1	44.3	68	30-150	2	50
4,4'-DDE	12	45.8	44.3	75	45.5	44.3	75	30-150	1	50
Endrin	3.8	32.7	44.3	65	35.0	44.3	70	30-150	7	50
Endosulfan II	ND	45.7	44.3	103 #	46.8	44.3	106 #	30-150	3	50
4,4'-DDD	11	45.6	44.3	78	45.2	44.3	78	30-150	1	50
Endrin Aldehyde	ND	31.6	44.3	71 #	32.6	44.3	74 #	30-150	3	50
Endosulfan Sulfate	ND	32.1	44.3	72	34.2	44.3	77	30-150	6	50
4,4'-DDT	52	81.9	44.3	67	85.6	44.3	75	30-150	4	50
Endrin Ketone	ND	33.2	44.3	75 #	34.3	44.3	77 #	30-150	3	50
Methoxychlor	ND	29.6	44.3	67 #	30.5	44.3	69 #	30-150	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-ES-WB-comp-2  
**Lab Code:** K2503388-013  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-2MS KWG0508101-21 Matrix Spike			LDW-T1-M-ES-WB-comp-2DMS KWG0508101-22 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	ND	47.9	44.4	108 #	40.2	44.3	91 #	30-150	18	50
2,4'-DDD	ND	39.6	44.4	89 #	36.4	44.3	82 #	30-150	8	50
2,4'-DDT	61	89.5E	44.4	65	90.7E	44.3	68	30-150	1	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

Client: Windward Environmental  
 Project: LDW/04-08-06-22  
 Sample Matrix: Tissue

Service Request: K2503388  
 Date Extracted: 05/20/2005  
 Date Analyzed: 06/01/2005

Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides

Sample Name: LDW-T2-M-ES-WB-comp-3  
 Lab Code: K2503388-019  
 Extraction Method: EPA 3540C  
 Analysis Method: 8081A

Units: ug/Kg  
 Basis: Wet  
 Level: Low  
 Extraction Lot: KWG0508101

Analyte Name	Sample Result	LDW-T2-M-ES-WB-comp-3MS			LDW-T2-M-ES-WB-comp-3DMS			%Rec Limits	RPD	RPD Limit
		KWG0508101-23			KWG0508101-24					
		Result	Expected	%Rec	Result	Expected	%Rec			
alpha-BHC	ND	21.5	44.3	49	27.4	44.4	62	30-150	24	50
Hexachlorobenzene	2.0	31.5	44.3	67	32.7	44.4	69	30-150	4	50
beta-BHC	ND	33.0	44.3	75 #	36.6	44.4	82 #	30-150	10	50
gamma-BHC (Lindane)	ND	34.3	44.3	77	36.6	44.4	82	30-150	7	50
delta-BHC	ND	25.3	44.3	57	28.7	44.4	65	30-150	12	50
Heptachlor	ND	26.8	44.3	60	29.1	44.4	65	30-150	8	50
Aldrin	8.5	29.2	44.3	47	32.4	44.4	54	30-150	11	50
Heptachlor Epoxide	8.6	31.7	44.3	52	36.1	44.4	62	30-150	13	50
gamma-Chlordane	37	59.2	44.3	49	67.0	44.4	67	30-150	12	50
Endosulfan I	ND	29.6	44.3	67 #	33.3	44.4	75 #	30-150	12	50
alpha-Chlordane	ND	30.3	44.3	68 #	33.1	44.4	75 #	30-150	9	50
Dieldrin	ND	27.6	44.3	62	31.0	44.4	70	30-150	12	50
4,4'-DDE	18	71.8	44.3	122	52.9	44.4	79	30-150	30	50
Endrin	ND	33.2	44.3	75 #	38.5	44.4	87 #	30-150	15	50
Endosulfan II	ND	49.4	44.3	111 #	56.1	44.4	126 #	30-150	13	50
4,4'-DDD	16	45.9	44.3	68	49.0	44.4	75	30-150	7	50
Endrin Aldehyde	ND	32.0	44.3	72 #	36.7	44.4	83 #	30-150	14	50
Endosulfan Sulfate	ND	34.0	44.3	77	31.9	44.4	72	30-150	6	50
4,4'-DDT	180	106E	44.3	-173 #	117E	44.4	-149 #	30-150	9	50
Endrin Ketone	ND	32.1	44.3	72 #	34.0	44.4	77 #	30-150	6	50
Methoxychlor	ND	28.4	44.3	64 #	30.1	44.4	68 #	30-150	6	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3  
**Lab Code:** K2503388-019  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T2-M-ES-WB-comp-3MS KWG0508101-25 Matrix Spike			LDW-T2-M-ES-WB-comp-3DMS KWG0508101-26 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	ND	34.7	44.3	78 #	37.9	44.3	85 #	30-150	9	50
2,4'-DDD	ND	37.1	44.3	84 #	38.2	44.3	86 #	30-150	3	50
2,4'-DDT	88	120E	44.3	71	120E	44.3	70	30-150	0	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T4-M-ES-WB-comp-2MS			LDW-T4-M-ES-WB-comp-2DMS			%Rec Limits	RPD	RPD Limit
		KWG0508101-27			KWG0508101-28					
		Result	Expected	%Rec	Result	Expected	%Rec			
alpha-BHC	ND	25.4	39.8	64 #	25.8	40.0	65 #	30-150	1	50
Hexachlorobenzene	1.4	29.3	39.8	70	28.9	40.0	69	30-150	1	50
beta-BHC	ND	36.4	39.8	91	46.6	40.0	117	30-150	24	50
gamma-BHC (Lindane)	ND	37.3	39.8	94 #	35.3	40.0	88 #	30-150	6	50
delta-BHC	ND	27.6	39.8	69	34.3	40.0	86	30-150	22	50
Heptachlor	ND	28.2	39.8	71	31.0	40.0	78	30-150	9	50
Aldrin	ND	27.3	39.8	68 #	31.2	40.0	78 #	30-150	13	50
Heptachlor Epoxide	5.5	28.1	39.8	57	36.6	40.0	78	30-150	26	50
gamma-Chlordane	ND	43.6	39.8	109 #	53.1	40.0	133 #	30-150	20	50
Endosulfan I	ND	26.1	39.8	65	31.3	40.0	78	30-150	18	50
alpha-Chlordane	ND	27.6	39.8	69 #	32.6	40.0	82 #	30-150	17	50
Dieldrin	ND	31.2	39.8	78	33.4	40.0	83	30-150	7	50
4,4'-DDE	23	49.4	39.8	67	60.0	40.0	93	30-150	19	50
Endrin	ND	32.6	39.8	82	37.9	40.0	95	30-150	15	50
Endosulfan II	ND	36.6	39.8	92	32.5	40.0	81	30-150	12	50
4,4'-DDD	8.1	37.1	39.8	73	41.3	40.0	83	30-150	11	50
Endrin Aldehyde	ND	13.8	39.8	35	16.9	40.0	42	30-150	21	50
Endosulfan Sulfate	ND	30.7	39.8	77	32.9	40.0	82	30-150	7	50
4,4'-DDT	ND	58.1	39.8	146 #	66.3	40.0	166 #	30-150	13	50
Endrin Ketone	ND	27.3	39.8	69 #	32.4	40.0	81 #	30-150	17	50
Methoxychlor	ND	26.4	39.8	66	28.5	40.0	71	30-150	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T4-M-ES-WB-comp-2MS KWG0508101-29 Matrix Spike			LDW-T4-M-ES-WB-comp-2DMS KWG0508101-30 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	27	49.8	39.9	57	43.5	39.9	41	30-150	14	50
2,4'-DDD	ND	34.6	39.9	87 #	33.2	39.9	83 #	30-150	4	50
2,4'-DDT	45	69.5	39.9	62	68.9	39.9	61	30-150	1	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005 - 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T4-M-SF-FL-comp-1 MS KWG0508101-3 Matrix Spike			LDW-T4-M-SF-FL-comp-1 DMS KWG0508101-4 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
alpha-BHC	ND	35.8	39.9	90	39.6	40.0	99	30-150	10	50
Hexachlorobenzene	ND	33.1	39.9	83	35.4	40.0	89	30-150	7	50
beta-BHC	3.0	38.8	39.9	90	43.8	40.0	102	30-150	12	50
gamma-BHC (Lindane)	1.3	37.3	39.9	90	41.5	40.0	101	30-150	11	50
delta-BHC	ND	40.9	39.9	102	45.3	40.0	113	30-150	10	50
Heptachlor	ND	35.1	39.9	88 #	47.4	40.0	119 #	30-150	30	50
Aldrin	ND	35.2	39.9	88	38.9	40.0	97	30-150	10	50
Heptachlor Epoxide	ND	40.8	39.9	102 #	36.8	40.0	92 #	30-150	10	50
gamma-Chlordane	ND	42.7	39.9	107 #	47.2	40.0	118 #	30-150	10	50
Endosulfan I	ND	36.4	39.9	91	40.1	40.0	100	30-150	10	50
alpha-Chlordane	ND	38.8	39.9	97	43.2	40.0	108	30-150	11	50
Dieldrin	ND	35.9	39.9	90	39.7	40.0	99	30-150	10	50
4,4'-DDE	9.1	51.5	39.9	106	52.5	40.0	108	30-150	2	50
Endrin	1.7	40.0	39.9	96	44.7	40.0	108	30-150	11	50
Endosulfan II	ND	37.6	39.9	94	40.8	40.0	102	30-150	8	50
4,4'-DDD	4.3	42.4	39.9	96	41.1	40.0	92	30-150	3	50
Endrin Aldehyde	1.6	31.9	39.9	76	34.2	40.0	82	30-150	7	50
Endosulfan Sulfate	ND	37.7	39.9	95	41.2	40.0	103	30-150	9	50
4,4'-DDT	15	48.9	39.9	85	51.1	40.0	91	30-150	4	50
Endrin Ketone	ND	33.7	39.9	85	35.9	40.0	90	30-150	6	50
Methoxychlor	ND	33.5	39.9	84	36.4	40.0	91	30-150	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T4-M-SF-FL-comp-1 MS KWG0508101-5 Matrix Spike			LDW-T4-M-SF-FL-comp-1 DMS KWG0508101-6 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	2.2	49.1	40.0	117	49.8	39.9	119	30-150	1	50
2,4'-DDD	ND	42.8	40.0	107	41.4	39.9	104	30-150	3	50
2,4'-DDT	26	60.7	40.0	88	59.2	39.9	84	30-150	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-1MS KWG0508101-7 Matrix Spike			LDW-T1-M-DC-EM-comp-1DMS KWG0508101-8 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
		alpha-BHC	ND	34.9	39.9	87	35.8			
Hexachlorobenzene	ND	32.2	39.9	81	32.7	39.9	82	30-150	2	50
beta-BHC	ND	33.4	39.9	84 #	34.8	39.9	87 #	30-150	4	50
gamma-BHC (Lindane)	4.9	35.9	39.9	78	34.9	39.9	75	30-150	3	50
delta-BHC	ND	30.3	39.9	76	36.7	39.9	92	30-150	19	50
Heptachlor	ND	35.7	39.9	89	38.9	39.9	97	30-150	9	50
Aldrin	1.2	37.0	39.9	90	36.9	39.9	89	30-150	0	50
Heptachlor Epoxide	ND	38.7	39.9	97	36.0	39.9	90	30-150	7	50
gamma-Chlordane	1.3	38.6	39.9	94	40.3	39.9	98	30-150	4	50
Endosulfan I	ND	34.8	39.9	87	35.7	39.9	89	30-150	3	50
alpha-Chlordane	ND	37.2	39.9	93	38.8	39.9	97	30-150	4	50
Dieldrin	3.2	34.3	39.9	78	35.7	39.9	81	30-150	4	50
4,4'-DDE	2.4	39.6	39.9	93	47.3	39.9	112	30-150	18	50
Endrin	ND	39.7	39.9	99	41.6	39.9	104	30-150	5	50
Endosulfan II	ND	36.0	39.9	90	38.1	39.9	95	30-150	6	50
4,4'-DDD	ND	36.7	39.9	92	41.1	39.9	103	30-150	11	50
Endrin Aldehyde	ND	10.9	39.9	27 *	12.8	39.9	32	30-150	16	50
Endosulfan Sulfate	ND	35.7	39.9	89	39.1	39.9	98	30-150	9	50
4,4'-DDT	5.4	41.5	39.9	91	43.3	39.9	95	30-150	4	50
Endrin Ketone	ND	41.4	39.9	104	43.2	39.9	108	30-150	4	50
Methoxychlor	ND	33.9	39.9	85	36.1	39.9	91	30-150	6	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 06/01/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-1MS KWG0508101-9 Matrix Spike			LDW-T1-M-DC-EM-comp-1DMS KWG0508101-10 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
2,4'-DDE	ND	44.5	39.9	112	42.8	40.0	107	30-150	4	50
2,4'-DDD	ND	40.7	39.9	102	36.7	40.0	92	30-150	10	50
2,4'-DDT	6.6	49.3	39.9	107	43.9	40.0	93	30-150	12	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Duplicate Sample Summary  
 Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	MRL	MDL	Sample Result	LDW-T4-M-SF-FL-comp-1DUP KWG0508101-1 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
alpha-BHC	2.0	0.64	ND	ND	ND	-	50
Hexachlorobenzene	2.0	0.48	ND	ND	ND	-	50
beta-BHC	2.0	0.62	3.0	2.5	2.8	19 #	50
gamma-BHC (Lindane)	2.0	0.34	1.3	0.54	0.93	83 #	50
delta-BHC	2.0	0.42	ND	ND	ND	-	50
Heptachlor	3.4	3.4	ND	ND	ND	-	50
Aldrin	2.0	0.30	ND	ND	ND	-	50
Heptachlor Epoxide	2.2	2.2	ND	ND	ND	-	50
gamma-Chlordane	5.9	5.9	ND	ND	ND	-	50
Endosulfan I	2.0	0.34	ND	ND	ND	-	50
alpha-Chlordane	2.0	0.22	ND	ND	ND	-	50
Dieldrin	2.0	2.0	ND	ND	ND	-	50
4,4'-DDE	2.0	0.20	9.1	11	10	18	50
Endrin	2.0	0.15	1.7	1.5	1.6	13 #	50
Endosulfan II	2.0	2.0	ND	ND	ND	-	50
4,4'-DDD	2.0	0.32	4.3	6.2	5.2	37	50
Endrin Aldehyde	2.0	0.34	1.6	3.0	2.3	60 #	50
Endosulfan Sulfate	2.0	0.38	ND	ND	ND	-	50
4,4'-DDT	14	14	15	ND	NC	NC	50
Endrin Ketone	2.0	0.80	ND	ND	ND	-	50
Methoxychlor	2.0	0.64	ND	ND	ND	-	50
Toxaphene	180	180	ND	ND	ND	-	50
2,4'-DDE	2.0	2.0	2.2	ND	NC	NC	50
2,4'-DDD	2.0	2.0	ND	ND	ND	-	50
2,4'-DDT	2.0	0.24	26	25	25	2	50
Mirex	2.0	0.48	ND	ND	ND	-	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Lab Control Spike Summary  
 Organochlorine Pesticides**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Lab Control Sample KWG0508101-31 Lab Control Spike			%Rec Limits
	Result	Expected	%Rec	
alpha-BHC	16.5	20.0	83	30-150
Hexachlorobenzene	15.0	20.0	75	30-150
beta-BHC	14.6	20.0	73	30-150
gamma-BHC (Lindane)	16.7	20.0	84	30-150
delta-BHC	19.4	20.0	97	30-150
Heptachlor	16.9	20.0	85	30-150
Aldrin	17.7	20.0	89	30-150
Heptachlor Epoxide	18.9	20.0	95	30-150
gamma-Chlordane	18.5	20.0	92	30-150
Endosulfan I	16.8	20.0	84	30-150
alpha-Chlordane	18.6	20.0	93	30-150
Dieldrin	18.4	20.0	92	30-150
4,4'-DDE	20.2	20.0	101	30-150
Endrin	19.5	20.0	98	30-150
Endosulfan II	17.2	20.0	86	30-150
4,4'-DDD	17.0	20.0	85	30-150
Endrin Aldehyde	14.9	20.0	75	30-150
Endosulfan Sulfate	16.7	20.0	84	30-150
4,4'-DDT	20.0	20.0	100	30-150
Endrin Ketone	18.2	20.0	91	30-150
Methoxychlor	17.4	20.0	87	30-150

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005

**Lab Control Spike Summary**  
**Organochlorine Pesticides**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508101

Analyte Name	Lab Control Sample KWG0508101-32 Lab Control Spike			%Rec Limits
	Result	Expected	%Rec	
2,4'-DDE	18.1	20.0	91	30-150
2,4'-DDD	19.7	20.0	98	30-150
2,4'-DDT	19.0	20.0	95	30-150

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

Client: Winward Environmental  
 Project: LDW/04-08-06-22  
 Matrix: Tissue

Service Request: K2503388  
 Date Collected: NA  
 Date Received: NA  
 Date Extracted: 5/20/2005  
 Date Analyzed: 6/1/2005

Standard Reference Material  
 Organochlorine Pesticides

Sample Name: SRM 1945  
 Lab Code: KWG0508101-2  
 Test Notes:

Units: ug/Kg (ppb)  
 Basis: Wet

Analyte	Prep Method	Analysis Method	True Value	Result	Result Notes
Hexachlorobenzene	EPA 3540C	8081A	32.9 ± 1.7	22.4	
alpha-BHC	EPA 3540C	8081A	16.2 ± 3.4	10.5	
delta-BHC	EPA 3540C	8081A	3.30 ± 0.81	9.58	P
Heptachlor Epoxide	EPA 3540C	8081A	10.8 ± 1.3	10.1	
Mirex	EPA 3540C	8081A	28.9 ± 2.8	14.6	P
alpha-Chlordane	EPA 3540C	8081A	46.9 ± 2.8	35.6	P
2,4'-DDE	EPA 3540C	8081A	12.28 ± 0.87	10.6	P
4,4'-DDE	EPA 3540C	8081A	445 ± 37	355	D
2,4'-DDD	EPA 3540C	8081A	18.1 ± 2.8	14.6	P
4,4'-DDD	EPA 3540C	8081A	133 ± 10	95.6	P
2,4'-DDT	EPA 3540C	8081A	106 ± 14	102	
4,4'-DDT	EPA 3540C	8081A	245 ± 15	206	D
Dieldrin	EPA 3540C	8081A	37.5 ± 3.9	48.5	P
beta-BHC	EPA 3540C	8081A	8.0 ± 1.4	34.4	P

Approved By: \_\_\_\_\_

Date: \_\_\_\_\_

6/9/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 20:33

**Method Blank Summary  
 Organochlorine Pesticides**

**Sample Name:** Method Blank **File ID:** J:\GC23\DATA\053105\0531F008.D  
**Lab Code:** KWG0508101-33 **Instrument ID:** GC23  
**Extraction Method:** EPA 3540C **Level:** Low  
**Analysis Method:** 8081A **Extraction Lot:** KWG0508101

This Method Blank applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Lab Control Sample	KWG0508101-31	J:\GC23\DATA\053105\0531F009.D	05/31/05	20:59
Lab Control Sample	KWG0508101-32	J:\GC23\DATA\053105\0531F010.D	05/31/05	21:25
LDW-T4-M-SF-FL-comp-1	K2503388-001	J:\GC23\DATA\053105\0531F011.D	05/31/05	21:52
LDW-T4-M-SF-FL-comp-1DUP	KWG0508101-1	J:\GC23\DATA\053105\0531F012.D	05/31/05	22:18
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-3	J:\GC23\DATA\053105\0531F013.D	05/31/05	22:44
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-5	J:\GC23\DATA\053105\0531F014.D	05/31/05	23:11
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-6	J:\GC23\DATA\053105\0531F015.D	05/31/05	23:37
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-4	J:\GC23\DATA\053105\0531F016.D	06/01/05	00:03
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\GC23\DATA\053105\0531F017.D	06/01/05	00:30
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-7	J:\GC23\DATA\053105\0531F018.D	06/01/05	00:56
LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-8	J:\GC23\DATA\053105\0531F019.D	06/01/05	01:22
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-9	J:\GC23\DATA\053105\0531F027.D	06/01/05	04:51
LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-10	J:\GC23\DATA\053105\0531F028.D	06/01/05	05:18
LDW-T3-B-PS-WB-comp-1	K2503388-007	J:\GC23\DATA\053105\0531F029.D	06/01/05	05:44
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-11	J:\GC23\DATA\053105\0531F030.D	06/01/05	06:10
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-12	J:\GC23\DATA\053105\0531F031.D	06/01/05	06:37
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-13	J:\GC23\DATA\053105\0531F032.D	06/01/05	07:03
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-14	J:\GC23\DATA\053105\0531F033.D	06/01/05	07:29
LDW-T3-E-PS-WB-comp-1	K2503388-008	J:\GC23\DATA\053105\0531F034.D	06/01/05	07:56
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-15	J:\GC23\DATA\053105\0531F035.D	06/01/05	08:22
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-16	J:\GC23\DATA\053105\0531F036.D	06/01/05	08:48
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-17	J:\GC23\DATA\053105\0531F044.D	06/01/05	12:19
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-18	J:\GC23\DATA\053105\0531F045.D	06/01/05	12:46
LDW-T1-M-ES-WB-comp-2	K2503388-013	J:\GC23\DATA\053105\0531F046.D	06/01/05	13:38
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-19	J:\GC23\DATA\053105\0531F047.D	06/01/05	14:05
LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-20	J:\GC23\DATA\053105\0531F048.D	06/01/05	14:31
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-21	J:\GC23\DATA\053105\0531F049.D	06/01/05	14:57
LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-22	J:\GC23\DATA\053105\0531F050.D	06/01/05	15:24
LDW-T2-M-ES-WB-comp-3	K2503388-019	J:\GC23\DATA\053105\0531F051.D	06/01/05	15:50
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-23	J:\GC23\DATA\053105\0531F052.D	06/01/05	16:17
LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-24	J:\GC23\DATA\053105\0531F053.D	06/01/05	16:43
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-25	J:\GC23\DATA\053105\0531F061.D	06/01/05	20:12
LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-26	J:\GC23\DATA\053105\0531F062.D	06/01/05	20:39
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\GC23\DATA\053105\0531F063.D	06/01/05	21:05
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-27	J:\GC23\DATA\053105\0531F064.D	06/01/05	21:31
LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-28	J:\GC23\DATA\053105\0531F065.D	06/01/05	21:58



COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 20:33

**Method Blank Summary**  
**Organochlorine Pesticides**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508101-33  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**File ID:** J:\GC23\DATA\053105\0531F008.D  
**Instrument ID:** GC23  
**Level:** Low  
**Extraction Lot:** KWG0508101

This Method Blank applies to the following analyses:

LDW-T4-M-ES-WB-comp-2MS	KWG0508101-29	J:\GC23\DATA\053105\0531F066.D	06/01/05	22:24
LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-30	J:\GC23\DATA\053105\0531F067.D	06/01/05	22:50
LDW-T2-M-ES-WB-comp-3DL	K2503388-019	J:\GC23\DATA\053105\0531F070.D	06/02/05	00:09

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 20:59

**Lab Control Sample Summary  
 Organochlorine Pesticides**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0508101-31  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**File ID:** J:\GC23\DATA\053105\0531F009.D  
**Instrument ID:** GC23  
**Level:** Low  
**Extraction Lot:** KWG0508101

This Lab Control Sample applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Method Blank	KWG0508101-33	J:\GC23\DATA\053105\0531F008.D	05/31/05	20:33
LDW-T4-M-SF-FL-comp-1	K2503388-001	J:\GC23\DATA\053105\0531F011.D	05/31/05	21:52
LDW-T4-M-SF-FL-comp-1DUP	KWG0508101-1	J:\GC23\DATA\053105\0531F012.D	05/31/05	22:18
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-3	J:\GC23\DATA\053105\0531F013.D	05/31/05	22:44
LDW-T4-M-SF-FL-comp-1MS	KWG0508101-5	J:\GC23\DATA\053105\0531F014.D	05/31/05	23:11
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-6	J:\GC23\DATA\053105\0531F015.D	05/31/05	23:37
LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-4	J:\GC23\DATA\053105\0531F016.D	06/01/05	00:03
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\GC23\DATA\053105\0531F017.D	06/01/05	00:30
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-7	J:\GC23\DATA\053105\0531F018.D	06/01/05	00:56
LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-8	J:\GC23\DATA\053105\0531F019.D	06/01/05	01:22
LDW-T1-M-DC-EM-comp-1MS	KWG0508101-9	J:\GC23\DATA\053105\0531F027.D	06/01/05	04:51
LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-10	J:\GC23\DATA\053105\0531F028.D	06/01/05	05:18
LDW-T3-B-PS-WB-comp-1	K2503388-007	J:\GC23\DATA\053105\0531F029.D	06/01/05	05:44
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-11	J:\GC23\DATA\053105\0531F030.D	06/01/05	06:10
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-12	J:\GC23\DATA\053105\0531F031.D	06/01/05	06:37
LDW-T3-B-PS-WB-comp-1MS	KWG0508101-13	J:\GC23\DATA\053105\0531F032.D	06/01/05	07:03
LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-14	J:\GC23\DATA\053105\0531F033.D	06/01/05	07:29
LDW-T3-E-PS-WB-comp-1	K2503388-008	J:\GC23\DATA\053105\0531F034.D	06/01/05	07:56
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-15	J:\GC23\DATA\053105\0531F035.D	06/01/05	08:22
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-16	J:\GC23\DATA\053105\0531F036.D	06/01/05	08:48
LDW-T3-E-PS-WB-comp-1MS	KWG0508101-17	J:\GC23\DATA\053105\0531F044.D	06/01/05	12:19
LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-18	J:\GC23\DATA\053105\0531F045.D	06/01/05	12:46
LDW-T1-M-ES-WB-comp-2	K2503388-013	J:\GC23\DATA\053105\0531F046.D	06/01/05	13:38
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-19	J:\GC23\DATA\053105\0531F047.D	06/01/05	14:05
LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-20	J:\GC23\DATA\053105\0531F048.D	06/01/05	14:31
LDW-T1-M-ES-WB-comp-2MS	KWG0508101-21	J:\GC23\DATA\053105\0531F049.D	06/01/05	14:57
LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-22	J:\GC23\DATA\053105\0531F050.D	06/01/05	15:24
LDW-T2-M-ES-WB-comp-3	K2503388-019	J:\GC23\DATA\053105\0531F051.D	06/01/05	15:50
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-23	J:\GC23\DATA\053105\0531F052.D	06/01/05	16:17
LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-24	J:\GC23\DATA\053105\0531F053.D	06/01/05	16:43
LDW-T2-M-ES-WB-comp-3MS	KWG0508101-25	J:\GC23\DATA\053105\0531F061.D	06/01/05	20:12
LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-26	J:\GC23\DATA\053105\0531F062.D	06/01/05	20:39
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\GC23\DATA\053105\0531F063.D	06/01/05	21:05
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-27	J:\GC23\DATA\053105\0531F064.D	06/01/05	21:31
LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-28	J:\GC23\DATA\053105\0531F065.D	06/01/05	21:58
LDW-T4-M-ES-WB-comp-2MS	KWG0508101-29	J:\GC23\DATA\053105\0531F066.D	06/01/05	22:24

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 20:59

**Lab Control Sample Summary**  
**Organochlorine Pesticides**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0508101-31

**File ID:** J:\GC23\DATA\053105\0531F009.D  
**Instrument ID:** GC23

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Level:** Low  
**Extraction Lot:** KWG0508101

This Lab Control Sample applies to the following analyses:

LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-30	J:\GC23\DATA\053105\0531F067.D	06/01/05	22:50
LDW-T2-M-ES-WB-comp-3DL	K2503388-019	J:\GC23\DATA\053105\0531F070.D	06/02/05	00:09

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005  
**Date Analyzed:** 05/31/2005  
**Time Analyzed:** 21:25

**Lab Control Sample Summary**  
**Organochlorine Pesticides**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0508101-32  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**File ID:** J:\GC23\DATA\053105\0531F010.D  
**Instrument ID:** GC23  
**Level:** Low  
**Extraction Lot:** KWG0508101

This Lab Control Sample applies to the following analyses:

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Organochlorine Pesticides**

**Analysis Method:** 8081A

**Analysis Lot:** KWG0508844  
**Instrument ID:** GC23  
**Column:** DB XLB

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0531F002.D	Instrument Blank	KWG0508844-1	5/31/2005	17:54		5/31/2005	18:14
0531F003.D	Performance Evaluation Mixture	KWG0508844-2	5/31/2005	18:21		5/31/2005	18:40
0531F004.D	Continuing Calibration Verification	KWG0508844-3	5/31/2005	18:47		5/31/2005	19:06
0531F005.D	Continuing Calibration Verification	KWG0508844-3	5/31/2005	19:13		5/31/2005	19:32
0531F006.D	Continuing Calibration Verification	KWG0508844-3	5/31/2005	19:40		5/31/2005	19:59
0531F007.D	Continuing Calibration Verification	KWG0508844-3	5/31/2005	20:06		5/31/2005	20:25
0531F008.D	Method Blank	KWG0508101-33	5/31/2005	20:33		5/31/2005	20:52
0531F009.D	Lab Control Sample	KWG0508101-31	5/31/2005	20:59		5/31/2005	21:18
0531F010.D	Lab Control Sample	KWG0508101-32	5/31/2005	21:25		5/31/2005	21:44
0531F011.D	LDW-T4-M-SF-FL-comp-1	K2503388-001	5/31/2005	21:52		5/31/2005	22:11
0531F012.D	LDW-T4-M-SF-FL-comp-1DUP	KWG0508101-1	5/31/2005	22:18		5/31/2005	22:37
0531F013.D	LDW-T4-M-SF-FL-comp-1MS	KWG0508101-3	5/31/2005	22:44		5/31/2005	23:04
0531F014.D	LDW-T4-M-SF-FL-comp-1MS	KWG0508101-5	5/31/2005	23:11		5/31/2005	23:30
0531F015.D	LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-6	5/31/2005	23:37		5/31/2005	23:56
0531F016.D	LDW-T4-M-SF-FL-comp-1DMS	KWG0508101-4	6/1/2005	00:03		6/1/2005	00:22
0531F017.D	LDW-T1-M-DC-EM-comp-1	K2503388-003	6/1/2005	00:30		6/1/2005	00:49
0531F018.D	LDW-T1-M-DC-EM-comp-1MS	KWG0508101-7	6/1/2005	00:56		6/1/2005	01:16
0531F019.D	LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-8	6/1/2005	01:22		6/1/2005	01:41
0531F021.D	Instrument Blank	KWG0508844-4	6/1/2005	02:13		6/1/2005	02:32
0531F022.D	Performance Evaluation Mixture	KWG0508844-5	6/1/2005	02:40		6/1/2005	03:00
0531F023.D	Continuing Calibration Verification	KWG0508844-6	6/1/2005	03:06		6/1/2005	03:25
0531F024.D	Continuing Calibration Verification	KWG0508844-6	6/1/2005	03:32		6/1/2005	03:52
0531F025.D	Continuing Calibration Verification	KWG0508844-6	6/1/2005	03:59		6/1/2005	04:18
0531F026.D	Continuing Calibration Verification	KWG0508844-6	6/1/2005	04:25		6/1/2005	04:44
0531F027.D	LDW-T1-M-DC-EM-comp-1MS	KWG0508101-9	6/1/2005	04:51		6/1/2005	05:10
0531F028.D	LDW-T1-M-DC-EM-comp-1DMS	KWG0508101-10	6/1/2005	05:18		6/1/2005	05:37
0531F029.D	LDW-T3-B-PS-WB-comp-1	K2503388-007	6/1/2005	05:44		6/1/2005	06:04
0531F030.D	LDW-T3-B-PS-WB-comp-1MS	KWG0508101-11	6/1/2005	06:10		6/1/2005	06:29
0531F031.D	LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-12	6/1/2005	06:37		6/1/2005	06:56
0531F032.D	LDW-T3-B-PS-WB-comp-1MS	KWG0508101-13	6/1/2005	07:03		6/1/2005	07:22
0531F033.D	LDW-T3-B-PS-WB-comp-1DMS	KWG0508101-14	6/1/2005	07:29		6/1/2005	07:48
0531F034.D	LDW-T3-E-PS-WB-comp-1	K2503388-008	6/1/2005	07:56		6/1/2005	08:16
0531F035.D	LDW-T3-E-PS-WB-comp-1MS	KWG0508101-15	6/1/2005	08:22		6/1/2005	08:41
0531F036.D	LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-16	6/1/2005	08:48		6/1/2005	09:07

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
Organochlorine Pesticides**

**Analysis Method:** 8081A

**Analysis Lot:** KWG0508844  
**Instrument ID:** GC23  
**Column:** DB XLB

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0531F038.D	Instrument Blank	KWG0508844-7	6/1/2005	09:40		6/1/2005	09:59
0531F039.D	Performance Evaluation Mixture	KWG0508844-8	6/1/2005	10:07		6/1/2005	10:26
0531F040.D	Continuing Calibration Verification	KWG0508844-9	6/1/2005	10:33		6/1/2005	10:52
0531F041.D	Continuing Calibration Verification	KWG0508844-9	6/1/2005	11:00		6/1/2005	11:19
0531F042.D	Continuing Calibration Verification	KWG0508844-9	6/1/2005	11:26		6/1/2005	11:45
0531F043.D	Continuing Calibration Verification	KWG0508844-9	6/1/2005	11:53		6/1/2005	12:12
0531F044.D	LDW-T3-E-PS-WB-comp-1MS	KWG0508101-17	6/1/2005	12:19		6/1/2005	12:38
0531F045.D	LDW-T3-E-PS-WB-comp-1DMS	KWG0508101-18	6/1/2005	12:46		6/1/2005	13:05
0531F046.D	LDW-T1-M-ES-WB-comp-2	K2503388-013	6/1/2005	13:38		6/1/2005	13:57
0531F047.D	LDW-T1-M-ES-WB-comp-2MS	KWG0508101-19	6/1/2005	14:05		6/1/2005	14:24
0531F048.D	LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-20	6/1/2005	14:31		6/1/2005	14:50
0531F049.D	LDW-T1-M-ES-WB-comp-2MS	KWG0508101-21	6/1/2005	14:57		6/1/2005	15:16
0531F050.D	LDW-T1-M-ES-WB-comp-2DMS	KWG0508101-22	6/1/2005	15:24		6/1/2005	15:43
0531F051.D	LDW-T2-M-ES-WB-comp-3	K2503388-019	6/1/2005	15:50		6/1/2005	16:10
0531F052.D	LDW-T2-M-ES-WB-comp-3MS	KWG0508101-23	6/1/2005	16:17		6/1/2005	16:36
0531F053.D	LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-24	6/1/2005	16:43		6/1/2005	17:02
0531F055.D	Instrument Blank	KWG0508844-10	6/1/2005	17:34		6/1/2005	17:53
0531F056.D	Performance Evaluation Mixture	KWG0508844-11	6/1/2005	18:01		6/1/2005	18:20
0531F057.D	Continuing Calibration Verification	KWG0508844-12	6/1/2005	18:27		6/1/2005	18:46
0531F058.D	Continuing Calibration Verification	KWG0508844-12	6/1/2005	18:53		6/1/2005	19:13
0531F059.D	Continuing Calibration Verification	KWG0508844-12	6/1/2005	19:20		6/1/2005	19:40
0531F060.D	Continuing Calibration Verification	KWG0508844-12	6/1/2005	19:46		6/1/2005	20:05
0531F061.D	LDW-T2-M-ES-WB-comp-3MS	KWG0508101-25	6/1/2005	20:12		6/1/2005	20:31
0531F062.D	LDW-T2-M-ES-WB-comp-3DMS	KWG0508101-26	6/1/2005	20:39		6/1/2005	20:58
0531F063.D	LDW-T4-M-ES-WB-comp-2	K2503388-020	6/1/2005	21:05		6/1/2005	21:24
0531F064.D	LDW-T4-M-ES-WB-comp-2MS	KWG0508101-27	6/1/2005	21:31		6/1/2005	21:51
0531F065.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-28	6/1/2005	21:58		6/1/2005	22:17
0531F066.D	LDW-T4-M-ES-WB-comp-2MS	KWG0508101-29	6/1/2005	22:24		6/1/2005	22:43
0531F067.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0508101-30	6/1/2005	22:50		6/1/2005	23:09
0531F068.D	ZZZZZZ	ZZZZZZ	6/1/2005	23:17		6/1/2005	23:36
0531F069.D	ZZZZZZ	ZZZZZZ	6/1/2005	23:43		6/2/2005	00:02
0531F070.D	LDW-T2-M-ES-WB-comp-3	K2503388-019	6/2/2005	00:09		6/2/2005	00:28
0531F072.D	Instrument Blank	KWG0508844-16	6/2/2005	01:00		6/2/2005	01:19
0531F073.D	Performance Evaluation Mixture	KWG0508844-17	6/2/2005	01:27		6/2/2005	01:46

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Organochlorine Pesticides**

**Analysis Method:** 8081A

**Analysis Lot:** KWG0508844  
**Instrument ID:** GC23  
**Column:** DB XLB

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0531F074.D	Continuing Calibration Verification	KWG0508844-18	6/2/2005	01:53		6/2/2005	02:12
0531F075.D	Continuing Calibration Verification	KWG0508844-18	6/2/2005	02:19		6/2/2005	02:38
0531F076.D	Continuing Calibration Verification	KWG0508844-18	6/2/2005	02:46		6/2/2005	03:06
0531F077.D	Continuing Calibration Verification	KWG0508844-18	6/2/2005	03:12		6/2/2005	03:31
0531F081.D	ZZZZZZ	ZZZZZZ	6/2/2005	04:57		6/2/2005	05:16
0531F082.D	ZZZZZZ	ZZZZZZ	6/2/2005	05:24		6/2/2005	05:43
0531F083.D	ZZZZZZ	ZZZZZZ	6/2/2005	05:50		6/2/2005	06:09
0531F084.D	ZZZZZZ	ZZZZZZ	6/2/2005	06:17		6/2/2005	06:37
0531F085.D	ZZZZZZ	ZZZZZZ	6/2/2005	06:43		6/2/2005	07:02
0531F086.D	ZZZZZZ	ZZZZZZ	6/2/2005	07:09		6/2/2005	07:29
0531F088.D	Instrument Blank	KWG0508844-19	6/2/2005	08:02		6/2/2005	08:21
0531F089.D	Performance Evaluation Mixture	KWG0508844-20	6/2/2005	08:29		6/2/2005	08:48
0531F090.D	Continuing Calibration Verification	KWG0508844-21	6/2/2005	08:55		6/2/2005	09:14
0531F091.D	Continuing Calibration Verification	KWG0508844-21	6/2/2005	09:22		6/2/2005	09:41
0531F092.D	ZZZZZZ	ZZZZZZ	6/2/2005	12:35		6/2/2005	12:54
0531F093.D	ZZZZZZ	ZZZZZZ	6/2/2005	13:01		6/2/2005	13:20
0531F095.D	Instrument Blank	KWG0508844-22	6/2/2005	13:54		6/2/2005	14:14
0531F096.D	Performance Evaluation Mixture	KWG0508844-23	6/2/2005	14:20		6/2/2005	14:39
0531F097.D	Continuing Calibration Verification	KWG0508844-24	6/2/2005	14:46		6/2/2005	15:05

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/20/2005

**Extraction Prep Log  
 Organochlorine Pesticides**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Extraction Lot:** KWG0508101  
**Level:** Low

Sample Name	Lab Code	Date Collected	Date Received	Sample Amount	Final Volume	% Solids	Note
LDW-T4-M-SF-FL-comp-1	K2503388-001	08/03/04	12/09/04	10.02g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/04	12/09/04	10.02g	4ml	NA	
LDW-T3-B-PS-WB-comp-1	K2503388-007	08/03/04	12/01/04	10.02g	4ml	NA	
LDW-T3-E-PS-WB-comp-1	K2503388-008	08/03/04	12/01/04	9.51g	4ml	NA	
LDW-T1-M-ES-WB-comp-2	K2503388-013	08/05/04	12/01/04	9.02g	4ml	NA	
LDW-T2-M-ES-WB-comp-3D	K2503388-019	08/03/04	12/01/04	9.01g	4ml	NA	
LDW-T2-M-ES-WB-comp-3	K2503388-019	08/03/04	12/01/04	9.01g	4ml	NA	
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/04	12/01/04	10.02g	4ml	NA	
LDW-T4-M-SF-FL-comp-1D	KWG0508101-1	08/03/04	12/09/04	10.01g	4ml	NA	
Method Blank	KWG0508101-33	NA	NA	20.03g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508101-10	08/30/04	12/09/04	10.01g	4ml	NA	
LDW-T3-B-PS-WB-comp-1M	KWG0508101-11	08/03/04	12/01/04	10.02g	4ml	NA	
LDW-T3-B-PS-WB-comp-1D	KWG0508101-12	08/03/04	12/01/04	10.01g	4ml	NA	
LDW-T3-B-PS-WB-comp-1M	KWG0508101-13	08/03/04	12/01/04	10.03g	4ml	NA	
LDW-T3-B-PS-WB-comp-1D	KWG0508101-14	08/03/04	12/01/04	10.03g	4ml	NA	
LDW-T3-E-PS-WB-comp-1M	KWG0508101-15	08/03/04	12/01/04	9.53g	4ml	NA	
LDW-T3-E-PS-WB-comp-1D	KWG0508101-16	08/03/04	12/01/04	9.52g	4ml	NA	
LDW-T3-E-PS-WB-comp-1M	KWG0508101-17	08/03/04	12/01/04	9.53g	4ml	NA	
LDW-T3-E-PS-WB-comp-1D	KWG0508101-18	08/03/04	12/01/04	9.53g	4ml	NA	
LDW-T1-M-ES-WB-comp-2	KWG0508101-19	08/05/04	12/01/04	9.02g	4ml	NA	
LDW-T1-M-ES-WB-comp-2D	KWG0508101-20	08/05/04	12/01/04	9.03g	4ml	NA	
LDW-T1-M-ES-WB-comp-2	KWG0508101-21	08/05/04	12/01/04	9.00g	4ml	NA	
LDW-T1-M-ES-WB-comp-2D	KWG0508101-22	08/05/04	12/01/04	9.03g	4ml	NA	
LDW-T2-M-ES-WB-comp-3	KWG0508101-23	08/03/04	12/01/04	9.03g	4ml	NA	
LDW-T2-M-ES-WB-comp-3D	KWG0508101-24	08/03/04	12/01/04	9.01g	4ml	NA	
LDW-T2-M-ES-WB-comp-3	KWG0508101-25	08/03/04	12/01/04	9.02g	4ml	NA	
LDW-T2-M-ES-WB-comp-3D	KWG0508101-26	08/03/04	12/01/04	9.02g	4ml	NA	
LDW-T4-M-ES-WB-comp-2	KWG0508101-27	08/30/04	12/01/04	10.04g	4ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0508101-28	08/30/04	12/01/04	10.01g	4ml	NA	
LDW-T4-M-ES-WB-comp-2	KWG0508101-29	08/30/04	12/01/04	10.02g	4ml	NA	
LDW-T4-M-SF-FL-comp-1M	KWG0508101-3	08/03/04	12/09/04	10.02g	4ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0508101-30	08/30/04	12/01/04	10.03g	4ml	NA	
LDW-T4-M-SF-FL-comp-1D	KWG0508101-4	08/03/04	12/09/04	10.01g	4ml	NA	
LDW-T4-M-SF-FL-comp-1M	KWG0508101-5	08/03/04	12/09/04	10.01g	4ml	NA	
LDW-T4-M-SF-FL-comp-1D	KWG0508101-6	08/03/04	12/09/04	10.02g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508101-7	08/30/04	12/09/04	10.02g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508101-8	08/30/04	12/09/04	10.02g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508101-9	08/30/04	12/09/04	10.03g	4ml	NA	
Lab Control Sample	KWG0508101-31	NA	NA	20.03g	4ml	NA	
Lab Control Sample	KWG0508101-32	NA	NA	20.02g	4ml	NA	

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis



**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-SF-FL-comp-1  
**Lab Code:** K2503388-001  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
beta-BHC	2.0	0.62	3.0	2.2	30.8		1	05/31/05
gamma-BHC (Lindane)	2.0	0.34	1.3	0.47	93.8	JP	1	05/31/05
4,4'-DDE	2.0	0.20	9.1	7.5	19.3		1	05/31/05
Endrin	2.0	0.15	1.7	0.97	54.7	JP	1	05/31/05
4,4'-DDD	2.0	0.32	4.3	2.9	38.9		1	05/31/05
Endrin Aldehyde	2.0	0.34	1.6	3.0	60.9	JP	1	05/31/05
4,4'-DDT	2.0	0.40	15	18	18.2		1	05/31/05
2,4'-DDE	2.0	0.30	2.2	1.6	31.6		1	05/31/05
2,4'-DDT	2.0	0.24	26	13	66.7	P	1	05/31/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
gamma-BHC (Lindane)	2.0	0.34	4.9	7.4	40.7	P	1	06/01/05
Aldrin	2.0	0.30	1.2	2.0	50.0	JP	1	06/01/05
gamma-Chlordane	2.0	0.34	1.3	2.2	51.4	JP	1	06/01/05
Dieldrin	2.0	0.15	3.2	3.7	14.5		1	06/01/05
4,4'-DDE	2.0	0.20	2.4	4.7	64.8	P	1	06/01/05
4,4'-DDT	2.0	0.40	5.4	7.7	35.1		1	06/01/05
2,4'-DDT	2.0	0.24	6.6	4.6	35.7		1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-B-PS-WB-comp-1  
**Lab Code:** K2503388-007  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Hexachlorobenzene	2.0	0.48	2.1	0.98	72.7	P	1	06/01/05
gamma-Chlordane	2.0	0.34	17	12	34.5		1	06/01/05
Endosulfan I	2.0	0.34	1.3	1.3	0.0	J	1	06/01/05
Endrin	2.0	0.15	2.9	1.5	63.6	P	1	06/01/05
4,4'-DDD	2.0	0.32	4.3	5.3	20.8		1	06/01/05
Endosulfan Sulfate	2.0	0.38	0.62	1.5	83.0	JP	1	06/01/05
4,4'-DDT	2.0	0.40	47	74	44.6	P	1	06/01/05
2,4'-DDT	2.0	0.24	59	44	29.1		1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T3-E-PS-WB-comp-1  
**Lab Code:** K2503388-008  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Hexachlorobenzene	2.2	0.51	1.6	1.3	20.7	J	1	06/01/05
alpha-BHC	2.2	0.68	0.91	1.7	60.5	JP	1	06/01/05
Heptachlor Epoxide	2.2	0.72	10	3.7	92.0	P	1	06/01/05
4,4'-DDE	2.2	0.22	9.8	17	53.7	P	1	06/01/05
Endosulfan II	2.2	0.51	4.5	12	90.9	P	1	06/01/05
4,4'-DDD	2.2	0.34	3.9	2.5	43.8	P	1	06/01/05
Endosulfan Sulfate	2.2	0.40	0.91	0.97	6.4	J	1	06/01/05
2,4'-DDD	2.2	0.68	22	9.0	83.9	P	1	06/01/05
2,4'-DDT	2.2	0.26	70	32	74.5	P	1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/05/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T1-M-ES-WB-comp-2  
**Lab Code:** K2503388-013  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Hexachlorobenzene	2.3	0.54	0.95	0.91	4.3	J	1	06/01/05
beta-BHC	2.3	0.69	2.9	4.9	51.3	P	1	06/01/05
gamma-BHC (Lindane)	2.3	0.38	0.95	0.51	60.3	JP	1	06/01/05
Heptachlor Epoxide	2.3	0.76	19	13	37.5		1	06/01/05
gamma-Chlordane	2.3	0.38	25	23	8.3		1	06/01/05
Endosulfan I	2.3	0.38	1.8	1.6	11.8	J	1	06/01/05
alpha-Chlordane	2.3	0.25	3.7	5.4	37.4		1	06/01/05
4,4'-DDE	2.3	0.23	12	28	80.0	P	1	06/01/05
Endrin	2.3	0.17	3.8	2.0	62.1	P	1	06/01/05
4,4'-DDD	2.3	0.36	11	10	9.5		1	06/01/05
4,4'-DDT	2.3	0.45	52	74	34.9		1	06/01/05
2,4'-DDT	2.3	0.27	61	47	25.9		1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T2-M-ES-WB-comp-3  
**Lab Code:** K2503388-019  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Hexachlorobenzene	2.3	0.54	2.0	1.5	28.6	J	1	06/01/05
Aldrin	2.3	0.34	8.5	4.8	55.6	P	1	06/01/05
Heptachlor Epoxide	2.3	0.76	8.6	24	94.5	P	1	06/01/05
gamma-Chlordane	2.3	0.38	37	28	27.7		1	06/01/05
4,4'-DDE	2.3	0.23	18	40	75.9	P	1	06/01/05
4,4'-DDD	2.3	0.36	16	16	0.0		1	06/01/05
4,4'-DDT	23	4.5	180	250	32.6	D	10	06/02/05
2,4'-DDT	2.3	0.27	88	63	33.1		1	06/01/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/20/2005

**Organochlorine Pesticides**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8081A

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Hexachlorobenzene	2.0	0.48	1.4	0.65	73.2	JP	1	06/01/05
Heptachlor Epoxide	2.0	0.68	5.5	15	92.7	P	1	06/01/05
4,4'-DDE	2.0	0.20	23	21	9.1		1	06/01/05
4,4'-DDD	2.0	0.32	8.1	7.3	10.4		1	06/01/05
2,4'-DDE	2.0	0.30	27	33	20.0		1	06/01/05
2,4'-DDT	2.0	0.24	45	33	30.8		1	06/01/05

**Polychlorinated Biphenyls  
PCB's  
EPA Method 8082**



Organic Analysis:  
Polychlorinated Biphenyls (PCBs)

Summary Package

Sample and QC Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22

Service Request: K2503388

Cover Page - Organic Analysis Data Package  
 Polychlorinated Biphenyls (PCBs)

Sample Name	Lab Code	Date Collected	Date Received
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/2004	12/09/2004
LDW-T2-A-PS-WB-comp-1	K2503388-006	08/03/2004	12/01/2004
LDW-T4-E-PS-WB-comp-1	K2503388-012	08/04/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1	K2503388-017	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-2	K2503388-018	08/03/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/2004	12/01/2004
LDW-T1-M-DC-EM-comp-1MS	KWG0508421-1	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1DM	KWG0508421-10	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2MS	KWG0508421-11	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2DM	KWG0508421-12	08/30/2004	12/09/2004
LDW-T2-A-PS-WB-comp-1MS	KWG0508421-13	08/03/2004	12/01/2004
LDW-T2-A-PS-WB-comp-1DMS	KWG0508421-14	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-2	KWG0508421-17	08/03/2004	12/01/2004
LDW-T4-E-PS-WB-comp-1DMS	KWG0508421-2	08/04/2004	12/01/2004
LDW-T4-E-PS-WB-comp-1MS	KWG0508421-3	08/04/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1DM	KWG0508421-4	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-1MS	KWG0508421-5	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-2DM	KWG0508421-6	08/03/2004	12/01/2004
LDW-T2-M-ES-WB-comp-2MS	KWG0508421-7	08/03/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2DM	KWG0508421-8	08/30/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2MS	KWG0508421-9	08/30/2004	12/01/2004

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the case narrative. Release of the data contained in this hardcopy data package and in the computer-readable data submitted on floppy diskette has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature: Janet L. Heister

Name: Janet L. Heister

Date: 6-11-05

Title: Scientist

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**File ID:** J:\GC09\DATA\060405.B\0604F023.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.14 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	5.3	U	13	5.3	
11104-28-2	Aroclor 1221	3.0	U	25	3.0	
11141-16-5	Aroclor 1232	3.7	U	13	3.7	
53469-21-9	Aroclor 1242	1.8	U	13	1.8	
<b>12672-29-6</b>	<b>Aroclor 1248</b>	<b>30</b>		13	3.2	
<b>11097-69-1</b>	<b>Aroclor 1254</b>	<b>92</b>		13	1.1	
<b>11096-82-5</b>	<b>Aroclor 1260</b>	<b>86</b>		13	3.9	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	88	38-150	06/04/05	Acceptable

**Comments:** \_\_\_\_\_

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**File ID:** J:\GC09\DATA\060405.B\0604F026.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.04 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	5.4	U	13	5.4	
11104-28-2	Aroclor 1221	3.0	U	25	3.0	
11141-16-5	Aroclor 1232	3.8	U	13	3.8	
53469-21-9	Aroclor 1242	1.8	U	13	1.8	
<b>12672-29-6</b>	<b>Aroclor 1248</b>	<b>24</b>		13	3.3	
<b>11097-69-1</b>	<b>Aroclor 1254</b>	<b>59</b>		13	1.1	
<b>11096-82-5</b>	<b>Aroclor 1260</b>	<b>63</b>		13	3.9	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	91	38-150	06/04/05	Acceptable

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-A-PS-WB-comp-1  
**Lab Code:** K2503388-006  
**File ID:** J:\GC09\DATA\060405.B\0604F029.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.04 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	5.4	U	13	5.4	
11104-28-2	Aroclor 1221	3.0	U	25	3.0	
11141-16-5	Aroclor 1232	3.8	U	13	3.8	
53469-21-9	Aroclor 1242	1.8	U	13	1.8	
12672-29-6	<b>Aroclor 1248</b>	<b>130</b>		13	3.3	
11097-69-1	<b>Aroclor 1254</b>	<b>250</b>		13	1.1	
11096-82-5	<b>Aroclor 1260</b>	<b>270</b>		13	3.9	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	87	38-150	06/04/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/05/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T4-E-PS-WB-comp-1  
**Lab Code:** K2503388-012  
**File ID:** J:\GC09\DATA\060405.B\0604F035.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.20 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	5.3	U	13	5.3	
11104-28-2	Aroclor 1221	3.0	U	25	3.0	
11141-16-5	Aroclor 1232	3.7	U	13	3.7	
53469-21-9	Aroclor 1242	1.8	U	13	1.8	
12672-29-6	<b>Aroclor 1248</b>	<b>130</b>		13	3.2	
11097-69-1	<b>Aroclor 1254</b>	<b>220</b>		13	1.0	
11096-82-5	<b>Aroclor 1260</b>	<b>270</b>		13	3.8	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	89	38-150	06/05/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/06/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**File ID:** J:\GC09\DATA\060605.B\0606F014.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.10 g  
**% Solids:** NA  
**Dilution Factor:** 10

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	54	U	130	54	
11104-28-2	Aroclor 1221	30	U	250	30	
11141-16-5	Aroclor 1232	38	U	130	38	
53469-21-9	Aroclor 1242	18	U	130	18	
12672-29-6	<b>Aroclor 1248</b>	<b>1000</b>	PD	130	33	
11097-69-1	<b>Aroclor 1254</b>	<b>1400</b>	D	130	11	
11096-82-5	<b>Aroclor 1260</b>	<b>1400</b>	D	130	39	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	146	38-150	06/06/05	Acceptable

**Comments:** \_\_\_\_\_

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/06/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018  
**File ID:** J:\GC09\DATA\060605.B\0606F017.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.11 g  
**% Solids:** NA  
**Dilution Factor:** 10

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	54	U	130	54	
11104-28-2	Aroclor 1221	30	U	250	30	
11141-16-5	Aroclor 1232	37	U	130	37	
53469-21-9	Aroclor 1242	18	U	130	18	
12672-29-6	<b>Aroclor 1248</b>	<b>590</b>	<b>D</b>	130	33	
11097-69-1	<b>Aroclor 1254</b>	<b>1200</b>	<b>D</b>	130	11	
11096-82-5	<b>Aroclor 1260</b>	<b>1200</b>	<b>D</b>	130	39	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	79	38-150	06/06/05	Acceptable

Comments:



Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/05/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**File ID:** J:\GC09\DATA\060405.B\0604F048.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 4.79 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	9.0	U	21	9.0	
11104-28-2	Aroclor 1221	5.1	U	42	5.1	
11141-16-5	Aroclor 1232	6.3	U	21	6.3	
53469-21-9	Aroclor 1242	3.0	U	21	3.0	
<b>12672-29-6</b>	<b>Aroclor 1248</b>	<b>360</b>	<b>P</b>	21	5.5	
<b>11097-69-1</b>	<b>Aroclor 1254</b>	<b>620</b>		21	1.8	
<b>11096-82-5</b>	<b>Aroclor 1260</b>	<b>740</b>		21	6.5	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	82	38-150	06/05/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** Method Blank  
**Lab Code:** KWG0508421-16  
**File ID:** J:\GC09\DATA\060405.B\0604F021.D  
**Instrument ID:** GC09.i

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Calibration ID:** CAL4500

**Sample Amount:** 8.00 g  
**% Solids:** NA  
**Dilution Factor:** 1

**Column1:** DB-35MS  
**Column2:** DB-XLB

CAS No.	Analyte Name	Result	Q	MRL	MDL	Note
12674-11-2	Aroclor 1016	5.4	U	13	5.4	
11104-28-2	Aroclor 1221	3.0	U	25	3.0	
11141-16-5	Aroclor 1232	3.8	U	13	3.8	
53469-21-9	Aroclor 1242	1.8	U	13	1.8	
12672-29-6	Aroclor 1248	3.3	U	13	3.3	
11097-69-1	Aroclor 1254	1.1	U	13	1.1	
11096-82-5	Aroclor 1260	3.9	U	13	3.9	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Decachlorobiphenyl	16	38-150	06/04/05	Outside Control Limits

**Comments:** \_\_\_\_\_

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary  
 Polychlorinated Biphenyls (PCBs)**

**Extraction Method:** EPA 3540C

**Units:** PERCENT

**Analysis Method:** 8082

**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>
LDW-T1-M-DC-EM-comp-1	K2503388-003	88
LDW-T1-M-DC-EM-comp-2	K2503388-004	91
LDW-T2-A-PS-WB-comp-1	K2503388-006	87
LDW-T4-E-PS-WB-comp-1	K2503388-012	89
LDW-T2-M-ES-WB-comp-1	K2503388-017	146 D
LDW-T2-M-ES-WB-comp-2	K2503388-018	79 D
LDW-T4-M-ES-WB-comp-2	K2503388-020	82
LDW-T2-M-ES-WB-comp-2DUP	KWG0508421-17	90 D
Method Blank	KWG0508421-16	16 *
LDW-T1-M-DC-EM-comp-1MS	KWG0508421-1	81
LDW-T1-M-DC-EM-comp-1DM	KWG0508421-10	86
LDW-T1-M-DC-EM-comp-2MS	KWG0508421-11	87
LDW-T1-M-DC-EM-comp-2DM	KWG0508421-12	89
LDW-T2-A-PS-WB-comp-1MS	KWG0508421-13	89
LDW-T2-A-PS-WB-comp-1DMS	KWG0508421-14	91
LDW-T4-E-PS-WB-comp-1DMS	KWG0508421-2	78
LDW-T4-E-PS-WB-comp-1MS	KWG0508421-3	79
LDW-T2-M-ES-WB-comp-1DM	KWG0508421-4	94 D
LDW-T2-M-ES-WB-comp-1MS	KWG0508421-5	90 D
LDW-T2-M-ES-WB-comp-2DM	KWG0508421-6	95 D
LDW-T2-M-ES-WB-comp-2MS	KWG0508421-7	113 D
LDW-T4-M-ES-WB-comp-2DM	KWG0508421-8	78
LDW-T4-M-ES-WB-comp-2MS	KWG0508421-9	82
Lab Control Sample	KWG0508421-15	83

**Surrogate Recovery Control Limits (%)**

---

Sur1 = Decachlorobiphenyl 38-150

---

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-1MS KWG0508421-1 Matrix Spike			LDW-T1-M-DC-EM-comp-1DMS KWG0508421-10 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	442	487	91	449	491	91	38-150	1	50
Aroclor 1260	86	484	487	82	524	491	89	38-150	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.  
 Results flagged with a pound (#) indicate the control criteria is not applicable.  
 Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-2MS KWG0508421-11 Matrix Spike			LDW-T1-M-DC-EM-comp-2DMS KWG0508421-12 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	473	491	96	476	497	96	38-150	1	50
Aroclor 1260	63	508	491	91	526	497	93	38-150	4	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-A-PS-WB-comp-1  
**Lab Code:** K2503388-006  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T2-A-PS-WB-comp-1MS KWG0508421-13 Matrix Spike			LDW-T2-A-PS-WB-comp-1DMS KWG0508421-14 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	523	494	106	535	496	108	38-150	2	50
Aroclor 1260	270	722	494	91	739	496	94	38-150	2	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/05/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T4-E-PS-WB-comp-1  
**Lab Code:** K2503388-012  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T4-E-PS-WB-comp-IMS KWG0508421-3 Matrix Spike			LDW-T4-E-PS-WB-comp-1DMS KWG0508421-2 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	453	493	92	456	498	92	38-150	1	50
Aroclor 1260	270	638	493	75	630	498	72	38-150	1	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/06/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T2-M-ES-WB-comp-1MS KWG0508421-5 Matrix Spike			LDW-T2-M-ES-WB-comp-1DMS KWG0508421-4 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	959	498	193 *	933	492	190 *	38-150	3	50
Aroclor 1260	1400	1940	498	99	1950	492	102	38-150	0	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/07/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T2-M-ES-WB-comp-2MS KWG0508421-7 Matrix Spike			LDW-T2-M-ES-WB-comp-2DMS KWG0508421-6 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	1120	499	224 *	926	493	188 *	38-150	19	50
Aroclor 1260	1200	2140	499	183 *	1810	493	116	38-150	17	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/05/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	Sample Result	LDW-T4-M-ES-WB-comp-2MS KWG0508421-9 Matrix Spike			LDW-T4-M-ES-WB-comp-2DMS KWG0508421-8 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Aroclor 1016	ND	883	830	106	868	842	103	38-150	2	50
Aroclor 1260	740	1320	830	70	1290	842	66	38-150	2	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/07/2005

**Duplicate Sample Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Analyte Name	MRL	MDL	Sample Result	LDW-T2-M-ES-WB-comp-2DUP KWG0508421-17 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
Aroclor 1016	130	54	ND	ND	ND	-	50
Aroclor 1221	250	30	ND	ND	ND	-	50
Aroclor 1232	130	38	ND	ND	ND	-	50
Aroclor 1242	130	18	ND	ND	ND	-	50
Aroclor 1248	130	33	590	640	620	8	50
Aroclor 1254	130	11	1200	1200	1200	3	50
Aroclor 1260	130	39	1200	1400	1300	11	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005

**Lab Control Spike Summary  
 Polychlorinated Biphenyls (PCBs)**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0508421

Lab Control Sample  
 KWG0508421-15  
 Lab Control Spike

Analyte Name	Lab Control Spike			%Rec Limits
	Result	Expected	%Rec	
Aroclor 1016	392	493	80	38-150
Aroclor 1260	426	493	87	38-150

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005  
**Time Analyzed:** 17:38

**Method Blank Summary**  
**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** Method Blank **File ID:** J:\GC09\DATA\060405.B\0604F021.D  
**Lab Code:** KWG0508421-16 **Instrument ID:** GC09.i  
**Extraction Method:** EPA 3540C **Level:** Low  
**Analysis Method:** 8082 **Extraction Lot:** KWG0508421

This Method Blank applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Lab Control Sample	KWG0508421-15	J:\GC09\DATA\060405.B\0604F022.D	06/04/05	18:04
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\GC09\DATA\060405.B\0604F023.D	06/04/05	18:30
LDW-T1-M-DC-EM-comp-1MS	KWG0508421-1	J:\GC09\DATA\060405.B\0604F024.D	06/04/05	18:56
LDW-T1-M-DC-EM-comp-1DMS	KWG0508421-10	J:\GC09\DATA\060405.B\0604F025.D	06/04/05	19:23
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\GC09\DATA\060405.B\0604F026.D	06/04/05	19:49
LDW-T1-M-DC-EM-comp-2MS	KWG0508421-11	J:\GC09\DATA\060405.B\0604F027.D	06/04/05	20:15
LDW-T1-M-DC-EM-comp-2DMS	KWG0508421-12	J:\GC09\DATA\060405.B\0604F028.D	06/04/05	20:42
LDW-T2-A-PS-WB-comp-1	K2503388-006	J:\GC09\DATA\060405.B\0604F029.D	06/04/05	21:08
LDW-T2-A-PS-WB-comp-1MS	KWG0508421-13	J:\GC09\DATA\060405.B\0604F030.D	06/04/05	21:34
LDW-T2-A-PS-WB-comp-1DMS	KWG0508421-14	J:\GC09\DATA\060405.B\0604F031.D	06/04/05	22:00
LDW-T4-E-PS-WB-comp-1	K2503388-012	J:\GC09\DATA\060405.B\0604F035.D	06/05/05	00:20
LDW-T4-E-PS-WB-comp-1DMS	KWG0508421-2	J:\GC09\DATA\060405.B\0604F036.D	06/05/05	00:46
LDW-T4-E-PS-WB-comp-1MS	KWG0508421-3	J:\GC09\DATA\060405.B\0604F037.D	06/05/05	01:12
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\GC09\DATA\060405.B\0604F048.D	06/05/05	06:36
LDW-T4-M-ES-WB-comp-2DMS	KWG0508421-8	J:\GC09\DATA\060405.B\0604F049.D	06/05/05	07:02
LDW-T4-M-ES-WB-comp-2MS	KWG0508421-9	J:\GC09\DATA\060405.B\0604F050.D	06/05/05	07:29
LDW-T2-M-ES-WB-comp-1	K2503388-017	J:\GC09\DATA\060605.B\0606F014.D	06/06/05	22:16
LDW-T2-M-ES-WB-comp-1DMS	KWG0508421-4	J:\GC09\DATA\060605.B\0606F015.D	06/06/05	22:42
LDW-T2-M-ES-WB-comp-1MS	KWG0508421-5	J:\GC09\DATA\060605.B\0606F016.D	06/06/05	23:09
LDW-T2-M-ES-WB-comp-2	K2503388-018	J:\GC09\DATA\060605.B\0606F017.D	06/06/05	23:36
LDW-T2-M-ES-WB-comp-2DUP	KWG0508421-17	J:\GC09\DATA\060605.B\0606F018.D	06/07/05	00:02
LDW-T2-M-ES-WB-comp-2DMS	KWG0508421-6	J:\GC09\DATA\060605.B\0606F019.D	06/07/05	00:29
LDW-T2-M-ES-WB-comp-2MS	KWG0508421-7	J:\GC09\DATA\060605.B\0606F020.D	06/07/05	00:55

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005  
**Date Analyzed:** 06/04/2005  
**Time Analyzed:** 18:04

**Lab Control Sample Summary  
 Polychlorinated Biphenyls (PCBs)**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0508421-15

**File ID:** J:\GC09\DATA\060405.B\0604F022.D  
**Instrument ID:** GC09.i

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Level:** Low  
**Extraction Lot:** KWG0508421

This Lab Control Sample applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Method Blank	KWG0508421-16	J:\GC09\DATA\060405.B\0604F021.D	06/04/05	17:38
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\GC09\DATA\060405.B\0604F023.D	06/04/05	18:30
LDW-T1-M-DC-EM-comp-1MS	KWG0508421-1	J:\GC09\DATA\060405.B\0604F024.D	06/04/05	18:56
LDW-T1-M-DC-EM-comp-1DMS	KWG0508421-10	J:\GC09\DATA\060405.B\0604F025.D	06/04/05	19:23
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\GC09\DATA\060405.B\0604F026.D	06/04/05	19:49
LDW-T1-M-DC-EM-comp-2MS	KWG0508421-11	J:\GC09\DATA\060405.B\0604F027.D	06/04/05	20:15
LDW-T1-M-DC-EM-comp-2DMS	KWG0508421-12	J:\GC09\DATA\060405.B\0604F028.D	06/04/05	20:42
LDW-T2-A-PS-WB-comp-1	K2503388-006	J:\GC09\DATA\060405.B\0604F029.D	06/04/05	21:08
LDW-T2-A-PS-WB-comp-1MS	KWG0508421-13	J:\GC09\DATA\060405.B\0604F030.D	06/04/05	21:34
LDW-T2-A-PS-WB-comp-1DMS	KWG0508421-14	J:\GC09\DATA\060405.B\0604F031.D	06/04/05	22:00
LDW-T4-E-PS-WB-comp-1	K2503388-012	J:\GC09\DATA\060405.B\0604F035.D	06/05/05	00:20
LDW-T4-E-PS-WB-comp-1DMS	KWG0508421-2	J:\GC09\DATA\060405.B\0604F036.D	06/05/05	00:46
LDW-T4-E-PS-WB-comp-1MS	KWG0508421-3	J:\GC09\DATA\060405.B\0604F037.D	06/05/05	01:12
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\GC09\DATA\060405.B\0604F048.D	06/05/05	06:36
LDW-T4-M-ES-WB-comp-2DMS	KWG0508421-8	J:\GC09\DATA\060405.B\0604F049.D	06/05/05	07:02
LDW-T4-M-ES-WB-comp-2MS	KWG0508421-9	J:\GC09\DATA\060405.B\0604F050.D	06/05/05	07:29
LDW-T2-M-ES-WB-comp-1	K2503388-017	J:\GC09\DATA\060605.B\0606F014.D	06/06/05	22:16
LDW-T2-M-ES-WB-comp-1DMS	KWG0508421-4	J:\GC09\DATA\060605.B\0606F015.D	06/06/05	22:42
LDW-T2-M-ES-WB-comp-1MS	KWG0508421-5	J:\GC09\DATA\060605.B\0606F016.D	06/06/05	23:09
LDW-T2-M-ES-WB-comp-2	K2503388-018	J:\GC09\DATA\060605.B\0606F017.D	06/06/05	23:36
LDW-T2-M-ES-WB-comp-2DUP	KWG0508421-17	J:\GC09\DATA\060605.B\0606F018.D	06/07/05	00:02
LDW-T2-M-ES-WB-comp-2DMS	KWG0508421-6	J:\GC09\DATA\060605.B\0606F019.D	06/07/05	00:29
LDW-T2-M-ES-WB-comp-2MS	KWG0508421-7	J:\GC09\DATA\060605.B\0606F020.D	06/07/05	00:55

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Polychlorinated Biphenyls (PCBs)**

**Analysis Method:** 8082

**Analysis Lot:** KWG0509252  
**Instrument ID:** GC09.i  
**Column:** DB-35MS

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0606F003.D	Instrument Blank	KWG0509252-1	6/6/2005	17:24		6/6/2005	17:24
0606F012.D	Continuing Calibration Verification	KWG0509252-2	6/6/2005	21:23		6/6/2005	21:23
0606F014.D	LDW-T2-M-ES-WB-comp-1	K2503388-017	6/6/2005	22:16		6/6/2005	22:16
0606F015.D	LDW-T2-M-ES-WB-comp-1DMS	KWG0508421-4	6/6/2005	22:42		6/6/2005	22:42
0606F016.D	LDW-T2-M-ES-WB-comp-1MS	KWG0508421-5	6/6/2005	23:09		6/6/2005	23:09
0606F017.D	LDW-T2-M-ES-WB-comp-2	K2503388-018	6/6/2005	23:36		6/6/2005	23:36
0606F018.D	LDW-T2-M-ES-WB-comp-2DUP	KWG0508421-17	6/7/2005	00:02		6/7/2005	00:02
0606F019.D	LDW-T2-M-ES-WB-comp-2DMS	KWG0508421-6	6/7/2005	00:29		6/7/2005	00:29
0606F020.D	LDW-T2-M-ES-WB-comp-2MS	KWG0508421-7	6/7/2005	00:55		6/7/2005	00:55
0606F022.D	Instrument Blank	KWG0509252-3	6/7/2005	01:48		6/7/2005	01:48
0606F023.D	Continuing Calibration Verification	KWG0509252-4	6/7/2005	02:15		6/7/2005	02:15
0606F024.D	ZZZZZZ	ZZZZZZ	6/7/2005	02:41		6/7/2005	02:41
0606F025.D	ZZZZZZ	ZZZZZZ	6/7/2005	03:08		6/7/2005	03:08
0606F026.D	ZZZZZZ	ZZZZZZ	6/7/2005	03:34		6/7/2005	03:34
0606F027.D	ZZZZZZ	ZZZZZZ	6/7/2005	04:01		6/7/2005	04:01
0606F028.D	ZZZZZZ	ZZZZZZ	6/7/2005	04:27		6/7/2005	04:27
0606F029.D	ZZZZZZ	ZZZZZZ	6/7/2005	04:54		6/7/2005	04:54
0606F030.D	ZZZZZZ	ZZZZZZ	6/7/2005	05:20		6/7/2005	05:20
0606F032.D	ZZZZZZ	ZZZZZZ	6/7/2005	06:13		6/7/2005	06:13
0606F034.D	Instrument Blank	KWG0509252-5	6/7/2005	07:06		6/7/2005	07:06
0606F035.D	Continuing Calibration Verification	KWG0509252-6	6/7/2005	07:33		6/7/2005	07:33
0606F036.D	ZZZZZZ	ZZZZZZ	6/7/2005	07:59		6/7/2005	07:59
0606F037.D	ZZZZZZ	ZZZZZZ	6/7/2005	08:26		6/7/2005	08:26
0606F038.D	ZZZZZZ	ZZZZZZ	6/7/2005	08:52		6/7/2005	08:52
0606F045.D	Instrument Blank	KWG0509252-7	6/7/2005	12:17		6/7/2005	12:17
0606F046.D	Continuing Calibration Verification	KWG0509252-8	6/7/2005	12:43		6/7/2005	12:43
0606F047.D	ZZZZZZ	ZZZZZZ	6/7/2005	13:09		6/7/2005	13:09
0606F048.D	ZZZZZZ	ZZZZZZ	6/7/2005	13:36		6/7/2005	13:36
0606F049.D	ZZZZZZ	ZZZZZZ	6/7/2005	14:03		6/7/2005	14:03
0606F050.D	ZZZZZZ	ZZZZZZ	6/7/2005	14:29		6/7/2005	14:29
0606F051.D	ZZZZZZ	ZZZZZZ	6/7/2005	14:55		6/7/2005	14:55
0606F053.D	Instrument Blank	KWG0509252-9	6/7/2005	15:48		6/7/2005	15:48
0606F054.D	Continuing Calibration Verification	KWG0509252-10	6/7/2005	16:15		6/7/2005	16:15

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Polychlorinated Biphenyls (PCBs)**

**Analysis Method:** 8082

**Analysis Lot:** KWG0509498  
**Instrument ID:** GC09.i  
**Column:** DB-35MS

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0604F019.D	Instrument Blank	KWG0509498-1	6/4/2005	16:44		6/4/2005	16:44
0604F020.D	Continuing Calibration Verification	KWG0509498-2	6/4/2005	17:11		6/4/2005	17:11
0604F021.D	Method Blank	KWG0508421-16	6/4/2005	17:38		6/4/2005	17:38
0604F022.D	Lab Control Sample	KWG0508421-15	6/4/2005	18:04		6/4/2005	18:04
0604F023.D	LDW-T1-M-DC-EM-comp-1	K2503388-003	6/4/2005	18:30		6/4/2005	18:30
0604F024.D	LDW-T1-M-DC-EM-comp-1MS	KWG0508421-1	6/4/2005	18:56		6/4/2005	18:56
0604F025.D	LDW-T1-M-DC-EM-comp-1DMS	KWG0508421-10	6/4/2005	19:23		6/4/2005	19:23
0604F026.D	LDW-T1-M-DC-EM-comp-2	K2503388-004	6/4/2005	19:49		6/4/2005	19:49
0604F027.D	LDW-T1-M-DC-EM-comp-2MS	KWG0508421-11	6/4/2005	20:15		6/4/2005	20:15
0604F028.D	LDW-T1-M-DC-EM-comp-2DMS	KWG0508421-12	6/4/2005	20:42		6/4/2005	20:42
0604F029.D	LDW-T2-A-PS-WB-comp-1	K2503388-006	6/4/2005	21:08		6/4/2005	21:08
0604F030.D	LDW-T2-A-PS-WB-comp-1MS	KWG0508421-13	6/4/2005	21:34		6/4/2005	21:34
0604F031.D	LDW-T2-A-PS-WB-comp-1DMS	KWG0508421-14	6/4/2005	22:00		6/4/2005	22:00
0604F033.D	Instrument Blank	KWG0509498-3	6/4/2005	23:27		6/4/2005	23:27
0604F034.D	Continuing Calibration Verification	KWG0509498-4	6/4/2005	23:54		6/4/2005	23:54
0604F035.D	LDW-T4-E-PS-WB-comp-1	K2503388-012	6/5/2005	00:20		6/5/2005	00:20
0604F036.D	LDW-T4-E-PS-WB-comp-1DMS	KWG0508421-2	6/5/2005	00:46		6/5/2005	00:46
0604F037.D	LDW-T4-E-PS-WB-comp-1MS	KWG0508421-3	6/5/2005	01:12		6/5/2005	01:12
0604F046.D	Instrument Blank	KWG0509498-5	6/5/2005	05:43		6/5/2005	05:43
0604F047.D	Continuing Calibration Verification	KWG0509498-6	6/5/2005	06:09		6/5/2005	06:09
0604F048.D	LDW-T4-M-ES-WB-comp-2	K2503388-020	6/5/2005	06:36		6/5/2005	06:36
0604F049.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0508421-8	6/5/2005	07:02		6/5/2005	07:02
0604F050.D	LDW-T4-M-ES-WB-comp-2MS	KWG0508421-9	6/5/2005	07:29		6/5/2005	07:29
0604F052.D	Instrument Blank	KWG0509498-7	6/5/2005	08:55		6/5/2005	08:55
0604F053.D	Continuing Calibration Verification	KWG0509498-8	6/5/2005	09:22		6/5/2005	09:22

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis



**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/26/2005

**Extraction Prep Log**  
**Polychlorinated Biphenyls (PCBs)**

**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Extraction Lot:** KWG0508421  
**Level:** Low

Sample Name	Lab Code	Date Collected	Date Received	Sample Amount	Final Volume	% Solids	Note
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/04	12/09/04	8.14g	2ml	NA	
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/04	12/09/04	8.04g	2ml	NA	
LDW-T2-A-PS-WB-comp-1	K2503388-006	08/03/04	12/01/04	8.04g	2ml	NA	
LDW-T4-E-PS-WB-comp-1	K2503388-012	08/04/04	12/01/04	8.20g	2ml	NA	
LDW-T2-M-ES-WB-comp-1	K2503388-017	08/03/04	12/01/04	8.10g	2ml	NA	
LDW-T2-M-ES-WB-comp-2	K2503388-018	08/03/04	12/01/04	8.11g	2ml	NA	
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/04	12/01/04	4.79g	2ml	NA	
LDW-T2-M-ES-WB-comp-2D	KWG0508421-17	08/03/04	12/01/04	8.01g	2ml	NA	
Method Blank	KWG0508421-16	NA	NA	8.00g	2ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508421-1	08/30/04	12/09/04	8.22g	2ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0508421-10	08/30/04	12/09/04	8.15g	2ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0508421-11	08/30/04	12/09/04	8.14g	2ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0508421-12	08/30/04	12/09/04	8.05g	2ml	NA	
LDW-T2-A-PS-WB-comp-1M	KWG0508421-13	08/03/04	12/01/04	8.10g	2ml	NA	
LDW-T2-A-PS-WB-comp-1D	KWG0508421-14	08/03/04	12/01/04	8.06g	2ml	NA	
LDW-T4-E-PS-WB-comp-1D	KWG0508421-2	08/04/04	12/01/04	8.04g	2ml	NA	
LDW-T4-E-PS-WB-comp-1M	KWG0508421-3	08/04/04	12/01/04	8.12g	2ml	NA	
LDW-T2-M-ES-WB-comp-1D	KWG0508421-4	08/03/04	12/01/04	8.13g	2ml	NA	
LDW-T2-M-ES-WB-comp-1	KWG0508421-5	08/03/04	12/01/04	8.04g	2ml	NA	
LDW-T2-M-ES-WB-comp-2D	KWG0508421-6	08/03/04	12/01/04	8.11g	2ml	NA	
LDW-T2-M-ES-WB-comp-2	KWG0508421-7	08/03/04	12/01/04	8.01g	2ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0508421-8	08/30/04	12/01/04	4.75g	2ml	NA	
LDW-T4-M-ES-WB-comp-2	KWG0508421-9	08/30/04	12/01/04	4.82g	2ml	NA	
Lab Control Sample	KWG0508421-15	NA	NA	8.12g	2ml	NA	

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	13	3.2	30	26	14.3		1	06/04/05
Aroclor 1254	13	1.1	92	65	34.4		1	06/04/05
Aroclor 1260	13	3.9	86	82	4.8		1	06/04/05

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	13	3.3	24	23	4.3		1	06/04/05
Aroclor 1254	13	1.1	59	47	22.6		1	06/04/05
Aroclor 1260	13	3.9	63	51	21.1		1	06/04/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-A-PS-WB-comp-1  
**Lab Code:** K2503388-006  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	13	3.3	130	92	34.2		1	06/04/05
Aroclor 1254	13	1.1	250	210	17.4		1	06/04/05
Aroclor 1260	13	3.9	270	240	11.8		1	06/04/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T4-E-PS-WB-comp-1  
**Lab Code:** K2503388-012  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	13	3.2	130	100	26.1		1	06/05/05
Aroclor 1254	13	1.0	220	220	0.0		1	06/05/05
Aroclor 1260	13	3.8	270	250	7.7		1	06/05/05

**COLUMBIA ANALYTICAL SERVICES, INC.**

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-1  
**Lab Code:** K2503388-017  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	130	33	1000	620	46.9	PD	10	06/06/05
Aroclor 1254	130	11	1400	1200	15.4	D	10	06/06/05
Aroclor 1260	130	39	1400	1300	7.4	D	10	06/06/05

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/03/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005

**Polychlorinated Biphenyls (PCBs)**

**Sample Name:** LDW-T2-M-ES-WB-comp-2  
**Lab Code:** K2503388-018  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	130	33	590	540	8.8	D	10	06/06/05
Aroclor 1254	130	11	1200	1100	8.7	D	10	06/06/05
Aroclor 1260	130	39	1200	1100	8.7	D	10	06/06/05

Confirmation Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004  
**Date Extracted:** 05/26/2005

Polychlorinated Biphenyls (PCBs)

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3540C  
**Analysis Method:** 8082

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	MRL	MDL	Primary Result	Confirmation Result	%D	Q	Dilution Factor	Date Analyzed
Aroclor 1248	21	5.5	360	190	61.8	P	1	06/05/05
Aroclor 1254	21	1.8	620	510	19.5		1	06/05/05
Aroclor 1260	21	6.5	740	530	33.1		1	06/05/05



**Semi-Volatile Organic Compounds  
EPA Method 8270C**

Organic Analysis:  
Semivolatile Organic Compounds by GC/MS  
SIM

Summary Package

Sample and QC Results


Client: Windward Environmental  
 Project: LDW/04-08-06-22

Service Request: K2503388

**Cover Page - Organic Analysis Data Package  
 Semivolatile Organic Compounds by GC/MS SIM**

Sample Name	Lab Code	Date Collected	Date Received
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/2004	12/09/2004
LDW-T1-D-PS-WB-comp-1	K2503388-005	08/05/2004	12/01/2004
LDW-T4-D-PS-WB-comp-1	K2503388-011	08/04/2004	12/01/2004
LDW-T1-M-ES-WB-comp-3	K2503388-014	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-4	K2503388-015	08/02/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/2004	12/01/2004
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	08/30/2004	12/09/2004
LDW-T1-M-ES-WB-comp-3DM	KWG0507984-10	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-4DM	KWG0507984-12	08/02/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	08/30/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2DM	KWG0507984-14	08/30/2004	12/01/2004
LDW-T1-M-DC-EM-comp-1	KWG0507984-18	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-1DM	KWG0507984-2	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	08/30/2004	12/09/2004
LDW-T1-M-DC-EM-comp-2DM	KWG0507984-4	08/30/2004	12/09/2004
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	08/05/2004	12/01/2004
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	08/05/2004	12/01/2004
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	08/04/2004	12/01/2004
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	08/04/2004	12/01/2004
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	08/02/2004	12/01/2004

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the case narrative. Release of the data contained in this hardcopy data package and in the computer-readable data submitted on floppy diskette has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature: 

Name: Carl Degner

Date: 6/2/05

Title: SVM Supervisor

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22  
 Sample Matrix: Tissue

Service Request: K2503388  
 Date Collected: 08/30/2004  
 Date Received: 12/09/2004

Semivolatile Organic Compounds by GC/MS SIM

Sample Name: LDW-T1-M-DC-EM-comp-1  
 Lab Code: K2503388-003  
 Extraction Method: EPA 3541  
 Analysis Method: 8270C SIM

Units: ug/Kg  
 Basis: Wet  
 Level: Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	40	10	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	800	230	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	40	8.7	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>47</b>	<b>J</b>	100	17	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	40	12	1	05/19/05	05/24/05	KWG0507984	
<b>Benzyl Alcohol</b>	<b>37</b>	<b>J</b>	40	6.7	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	80	53	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	40	8.5	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	40	8.2	1	05/19/05	05/24/05	KWG0507984	
4-Methylphenol†	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	40	10	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	40	15	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	40	5.0	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Benzoic Acid	ND	U	800	190	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	40	9.9	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	200	5.9	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	40	8.5	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	200	72	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	5000	5000	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	80	8.8	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	40	5.9	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	200	26	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	40	5.1	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	40	7.0	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	400	8.9	1	05/19/05	05/24/05	KWG0507984	

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22  
 Sample Matrix: Tissue

Service Request: K2503388  
 Date Collected: 08/30/2004  
 Date Received: 12/09/2004

Semivolatile Organic Compounds by GC/MS SIM

Sample Name: LDW-T1-M-DC-EM-comp-1  
 Lab Code: K2503388-003  
 Extraction Method: EPA 3541  
 Analysis Method: 8270C SIM

Units: ug/Kg  
 Basis: Wet  
 Level: Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	800	23	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	400	7.5	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	80	8.5	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	40	4.5	1	05/19/05	05/24/05	KWG0507984	
Diethyl Phthalate	ND	U	80	9.4	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	200	26	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	400	15	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	40	9.5	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	40	5.5	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	40	5.9	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	400	31	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	200	33	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>17</b>	<b>J</b>	40	16	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	5000	5000	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	40	14	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	2000	780	1	05/19/05	05/24/05	KWG0507984	
<b>Bis(2-ethylhexyl) Phthalate</b>	<b>75</b>	<b>J</b>	500	53	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	40	13	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	40	8.6	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	40	30	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	40	6.7	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	40	6.6	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	40	5.7	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	40	21	1	05/19/05	05/24/05	KWG0507984	
Phenanthrene	ND	U	40	4.5	1	05/19/05	05/24/05	KWG0507984	
Anthracene	ND	U	40	6.2	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	40	9.9	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	40	5.0	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	40	6.5	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	40	7.2	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	40	7.3	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	40	8.8	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	40	8.7	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	40	6.5	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	78	20-130	05/24/05	Acceptable
Phenol-d6	79	20-130	05/24/05	Acceptable
Nitrobenzene-d5	68	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	81	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	95	20-130	05/24/05	Acceptable
Terphenyl-d14	93	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	49	13	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	980	290	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>58</b>	<b>J</b>	130	21	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	98	14	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	49	14	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	49	14	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	49	15	1	05/19/05	05/24/05	KWG0507984	
Benzyl Alcohol	ND	U	49	8.3	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	49	14	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	98	65	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
4-Methylphenol†	ND	U	98	19	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	49	13	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	49	7.1	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	49	19	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	98	16	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	49	6.2	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	98	15	1	05/19/05	05/24/05	KWG0507984	
Benzoic Acid	ND	U	980	240	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	49	13	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	250	7.3	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	250	89	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	6200	6200	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	98	11	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	98	14	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	49	7.3	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	250	32	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	49	6.3	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	49	8.6	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	490	11	1	05/19/05	05/24/05	KWG0507984	

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	980	29	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	490	9.2	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	98	11	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	49	5.6	1	05/19/05	05/24/05	KWG0507984	
Diethyl Phthalate	ND	U	98	12	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	250	32	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	490	19	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	49	12	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	49	6.8	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	49	7.3	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	490	38	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	250	41	1	05/19/05	05/24/05	KWG0507984	
Di-n-butyl Phthalate	ND	U	49	20	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	6200	6200	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	49	18	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	2500	960	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	620	65	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	49	16	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	49	37	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	49	8.3	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	49	8.1	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	49	7.0	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	49	7.1	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	49	26	1	05/19/05	05/24/05	KWG0507984	
Phenanthrene	ND	U	49	5.6	1	05/19/05	05/24/05	KWG0507984	
Anthracene	ND	U	49	7.6	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	49	13	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	49	6.2	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	49	7.1	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	49	8.0	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	49	8.9	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	49	9.0	1	05/19/05	05/24/05	KWG0507984	

**Comments:** \_\_\_\_\_



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/09/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	49	11	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	49	8.0	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	82	20-130	05/24/05	Acceptable
Phenol-d6	86	20-130	05/24/05	Acceptable
Nitrobenzene-d5	80	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	78	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	86	20-130	05/24/05	Acceptable
Terphenyl-d14	89	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/05/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-D-PS-WB-comp-1  
**Lab Code:** K2503388-005  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	1600	460	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>41</b>	<b>J</b>	200	34	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	80	24	1	05/19/05	05/24/05	KWG0507984	
Benzyl Alcohol	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	160	110	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
4-Methylphenol†	ND	U	160	30	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	80	30	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	160	26	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	80	9.9	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	160	24	1	05/19/05	05/24/05	KWG0507984	
Benzoic Acid	ND	U	1600	380	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	400	12	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	400	150	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	9900	9900	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	160	18	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	800	18	1	05/19/05	05/24/05	KWG0507984	

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22  
 Sample Matrix: Tissue

Service Request: K2503388  
 Date Collected: 08/05/2004  
 Date Received: 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

Sample Name: LDW-T1-D-PS-WB-comp-1  
 Lab Code: K2503388-005  
 Extraction Method: EPA 3541  
 Analysis Method: 8270C SIM

Units: ug/Kg  
 Basis: Wet  
 Level: Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	1600	46	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	800	15	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	160	17	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	80	8.9	1	05/19/05	05/24/05	KWG0507984	
<b>Diethyl Phthalate</b>	<b>32</b>	<b>J</b>	160	19	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	800	30	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	80	19	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	800	62	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	400	66	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>48</b>	<b>J</b>	80	32	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	9900	9900	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	80	28	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	4000	1600	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	990	110	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	80	26	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	80	60	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	80	42	1	05/19/05	05/24/05	KWG0507984	
Phenanthrene	ND	U	80	8.9	1	05/19/05	05/24/05	KWG0507984	
Anthracene	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	80	9.9	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/05/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-D-PS-WB-comp-1  
**Lab Code:** K2503388-005  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	78	20-130	05/24/05	Acceptable
Phenol-d6	82	20-130	05/24/05	Acceptable
Nitrobenzene-d5	76	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	87	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	92	20-130	05/24/05	Acceptable
Terphenyl-d14	88	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T4-D-PS-WB-comp-1  
**Lab Code:** K2503388-011  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	95	24	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	1900	550	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	95	21	1	05/19/05	05/24/05	KWG0507984	
Phenol	ND	U	240	40	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	190	26	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	95	26	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	95	26	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	95	29	1	05/19/05	05/24/05	KWG0507984	
<b>Benzyl Alcohol</b>	<b>430</b>		95	16	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	95	26	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	190	130	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	95	20	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	95	20	1	05/19/05	05/24/05	KWG0507984	
4-Methylphenol†	ND	U	190	36	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	95	24	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	95	36	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	190	31	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	95	12	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	190	29	1	05/19/05	05/24/05	KWG0507984	
<b>Benzoic Acid</b>	<b>480</b>	J	1900	450	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	95	24	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	480	14	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	95	20	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	480	170	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	12000	12000	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	190	21	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	190	26	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	480	62	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	95	12	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	95	17	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	950	21	1	05/19/05	05/24/05	KWG0507984	

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T4-D-PS-WB-comp-1  
**Lab Code:** K2503388-011  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	1900	55	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	950	18	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	190	20	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	95	11	1	05/19/05	05/24/05	KWG0507984	
<b>Diethyl Phthalate</b>	<b>33</b>	<b>J</b>	190	23	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	480	62	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	950	36	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	95	23	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	95	13	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	950	73	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	480	78	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>62</b>	<b>J</b>	95	38	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	12000	12000	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	95	33	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	4800	1900	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	1200	130	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	95	31	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	95	21	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	95	71	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	95	16	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	95	16	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	95	50	1	05/19/05	05/24/05	KWG0507984	
<b>Phenanthrene</b>	<b>25</b>	<b>J</b>	95	11	1	05/19/05	05/24/05	KWG0507984	
Anthracene	ND	U	95	15	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	95	24	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	95	12	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	95	14	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	95	16	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	95	17	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	95	18	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/04/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T4-D-PS-WB-comp-1  
**Lab Code:** K2503388-011  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	95	21	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	95	21	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	95	16	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	92	20-130	05/24/05	Acceptable
Phenol-d6	97	20-130	05/24/05	Acceptable
Nitrobenzene-d5	89	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	99	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	113	20-130	05/24/05	Acceptable
Terphenyl-d14	102	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	1600	460	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>240</b>		200	34	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	80	24	1	05/19/05	05/24/05	KWG0507984	
<b>Benzyl Alcohol</b>	<b>610</b>		80	14	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	160	110	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
<b>4-Methylphenol†</b>	<b>140</b>	J	160	30	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	80	30	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	160	26	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	80	10	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	160	24	1	05/19/05	05/24/05	KWG0507984	
<b>Benzoic Acid</b>	<b>760</b>	J	1600	380	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	400	12	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	400	150	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	10000	10000	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	160	18	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	800	18	1	05/19/05	05/24/05	KWG0507984	

Comments:



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	1600	46	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	800	15	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	160	17	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	80	9.0	1	05/19/05	05/24/05	KWG0507984	
Diethyl Phthalate	ND	U	160	19	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	800	30	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	80	19	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	800	62	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	400	66	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>36</b>	<b>J</b>	80	32	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	10000	10000	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	80	28	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	4000	1600	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	1000	110	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	80	26	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	84	20-130	05/24/05	Acceptable
Phenol-d6	90	20-130	05/24/05	Acceptable
Nitrobenzene-d5	85	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	91	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	104	20-130	05/24/05	Acceptable
Terphenyl-d14	94	20-130	05/24/05	Acceptable

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014

**Units:** ug/Kg  
**Basis:** Wet

† Analyte Comments

---

4-Methylphenol                      This analyte cannot be separated from 3-Methylphenol.

Comments: \_\_\_\_\_

---

## COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

## Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	1600	460	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>89</b>	<b>J</b>	200	34	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	80	24	1	05/19/05	05/24/05	KWG0507984	
<b>Benzyl Alcohol</b>	<b>260</b>		80	14	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	80	22	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	160	110	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
<b>4-Methylphenol†</b>	<b>52</b>	<b>J</b>	160	30	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	80	30	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	160	26	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	80	10	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	160	24	1	05/19/05	05/24/05	KWG0507984	
<b>Benzoic Acid</b>	<b>970</b>	<b>J</b>	1600	380	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	400	12	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	80	17	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	400	150	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	10000	10000	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	160	18	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	160	22	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	800	18	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	1600	46	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	800	15	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	160	17	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	80	9.0	1	05/19/05	05/24/05	KWG0507984	
<b>Diethyl Phthalate</b>	<b>22</b>	<b>J</b>	160	19	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	400	52	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	800	30	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	80	19	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	800	62	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	400	66	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>57</b>	<b>J</b>	80	32	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	10000	10000	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	80	28	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	4000	1600	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	1000	110	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	80	26	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	80	60	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	80	14	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	80	42	1	05/19/05	05/24/05	KWG0507984	
<b>Phenanthrene</b>	<b>34</b>	<b>J</b>	80	9.0	1	05/19/05	05/24/05	KWG0507984	
<b>Anthracene</b>	<b>50</b>	<b>J</b>	80	13	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	80	20	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	80	10	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	80	18	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	84	20-130	05/24/05	Acceptable
Phenol-d6	89	20-130	05/24/05	Acceptable
Nitrobenzene-d5	82	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	89	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	103	20-130	05/24/05	Acceptable
Terphenyl-d14	95	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

## COLUMBIA ANALYTICAL SERVICES, INC.

## Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004

## Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	50	13	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	1000	290	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	50	11	1	05/19/05	05/24/05	KWG0507984	
<b>Phenol</b>	<b>510</b>		130	22	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	100	14	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	50	14	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	50	14	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	50	15	1	05/19/05	05/24/05	KWG0507984	
<b>Benzyl Alcohol</b>	<b>310</b>		50	8.4	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	50	14	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	100	67	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	50	11	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	50	11	1	05/19/05	05/24/05	KWG0507984	
<b>4-Methylphenol†</b>	<b>240</b>		100	19	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	50	13	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	50	7.3	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	50	19	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	100	17	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	50	6.3	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	100	15	1	05/19/05	05/24/05	KWG0507984	
<b>Benzoic Acid</b>	<b>900</b>	J	1000	240	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	50	13	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	250	7.4	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	50	11	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	250	90	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	6300	6300	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	100	11	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	100	14	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	50	7.4	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	250	33	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	50	6.4	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	50	8.8	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	500	12	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	1000	29	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	500	9.4	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	100	11	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	50	5.7	1	05/19/05	05/24/05	KWG0507984	
<b>Diethyl Phthalate</b>	<b>15</b>	<b>J</b>	100	12	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	250	33	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	500	19	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	50	12	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	50	6.9	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	50	7.4	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	500	39	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	250	42	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>61</b>		50	20	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	6300	6300	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	50	18	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	2500	980	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	630	67	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	50	17	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	95	20-130	05/24/05	Acceptable
Phenol-d6	103	20-130	05/24/05	Acceptable
Nitrobenzene-d5	90	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	94	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	110	20-130	05/24/05	Acceptable
Terphenyl-d14	102	20-130	05/24/05	Acceptable

Comments:

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004

Semivolatile Organic Compounds by GC/MS SIM

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020

**Units:** ug/Kg  
**Basis:** Wet

† Analyte Comments

---

4-Methylphenol                      This analyte cannot be separated from 3-Methylphenol.

**Comments:** \_\_\_\_\_

---



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** Method Blank  
**Lab Code:** KWG0507984-17  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
N-Nitrosodimethylamine	ND	U	40	10	1	05/19/05	05/24/05	KWG0507984	
Aniline	ND	U	800	230	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethyl) Ether	ND	U	40	8.7	1	05/19/05	05/24/05	KWG0507984	
Phenol	ND	U	100	17	1	05/19/05	05/24/05	KWG0507984	
2-Chlorophenol	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
1,3-Dichlorobenzene	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
1,4-Dichlorobenzene	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
1,2-Dichlorobenzene	ND	U	40	12	1	05/19/05	05/24/05	KWG0507984	
Benzyl Alcohol	ND	U	40	6.7	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroisopropyl) Ether	ND	U	40	11	1	05/19/05	05/24/05	KWG0507984	
2-Methylphenol	ND	U	80	53	1	05/19/05	05/24/05	KWG0507984	
Hexachloroethane	ND	U	40	8.5	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodi-n-propylamine	ND	U	40	8.2	1	05/19/05	05/24/05	KWG0507984	
4-Methylphenol†	ND	U	80	15	1	05/19/05	05/24/05	KWG0507984	
Nitrobenzene	ND	U	40	10	1	05/19/05	05/24/05	KWG0507984	
Isophorone	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
2-Nitrophenol	ND	U	40	15	1	05/19/05	05/24/05	KWG0507984	
2,4-Dimethylphenol	ND	U	80	13	1	05/19/05	05/24/05	KWG0507984	
Bis(2-chloroethoxy)methane	ND	U	40	5.0	1	05/19/05	05/24/05	KWG0507984	
2,4-Dichlorophenol	ND	U	80	12	1	05/19/05	05/24/05	KWG0507984	
Benzoic Acid	ND	U	800	190	1	05/19/05	05/24/05	KWG0507984	
1,2,4-Trichlorobenzene	ND	U	40	9.9	1	05/19/05	05/24/05	KWG0507984	
4-Chloroaniline	ND	U	200	5.9	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobutadiene	ND	U	40	8.5	1	05/19/05	05/24/05	KWG0507984	
4-Chloro-3-methylphenol	ND	U	200	72	1	05/19/05	05/24/05	KWG0507984	
Hexachlorocyclopentadiene	ND	U	5000	5000	1	05/19/05	05/24/05	KWG0507984	
2,4,6-Trichlorophenol	ND	U	80	8.8	1	05/19/05	05/24/05	KWG0507984	
2,4,5-Trichlorophenol	ND	U	80	11	1	05/19/05	05/24/05	KWG0507984	
2-Chloronaphthalene	ND	U	40	5.9	1	05/19/05	05/24/05	KWG0507984	
2-Nitroaniline	ND	U	200	26	1	05/19/05	05/24/05	KWG0507984	
Dimethyl Phthalate	ND	U	40	5.1	1	05/19/05	05/24/05	KWG0507984	
2,6-Dinitrotoluene	ND	U	40	7.0	1	05/19/05	05/24/05	KWG0507984	
3-Nitroaniline	ND	U	400	8.9	1	05/19/05	05/24/05	KWG0507984	

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** Method Blank  
**Lab Code:** KWG0507984-17  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
2,4-Dinitrophenol	ND	U	800	23	1	05/19/05	05/24/05	KWG0507984	
4-Nitrophenol	ND	U	400	7.5	1	05/19/05	05/24/05	KWG0507984	
2,4-Dinitrotoluene	ND	U	80	8.5	1	05/19/05	05/24/05	KWG0507984	
4-Chlorophenyl Phenyl Ether	ND	U	40	4.5	1	05/19/05	05/24/05	KWG0507984	
Diethyl Phthalate	ND	U	80	9.4	1	05/19/05	05/24/05	KWG0507984	
4-Nitroaniline	ND	U	200	26	1	05/19/05	05/24/05	KWG0507984	
2-Methyl-4,6-dinitrophenol	ND	U	400	15	1	05/19/05	05/24/05	KWG0507984	
N-Nitrosodiphenylamine	ND	U	40	9.5	1	05/19/05	05/24/05	KWG0507984	
4-Bromophenyl Phenyl Ether	ND	U	40	5.5	1	05/19/05	05/24/05	KWG0507984	
Hexachlorobenzene	ND	U	40	5.9	1	05/19/05	05/24/05	KWG0507984	
Pentachlorophenol	ND	U	400	31	1	05/19/05	05/24/05	KWG0507984	
Carbazole	ND	U	200	33	1	05/19/05	05/24/05	KWG0507984	
<b>Di-n-butyl Phthalate</b>	<b>19</b>	<b>J</b>	40	16	1	05/19/05	05/24/05	KWG0507984	
Benzidine	ND	U	5000	5000	1	05/19/05	05/24/05	KWG0507984	*
Butyl Benzyl Phthalate	ND	U	40	14	1	05/19/05	05/24/05	KWG0507984	
3,3'-Dichlorobenzidine	ND	U	2000	780	1	05/19/05	05/24/05	KWG0507984	
Bis(2-ethylhexyl) Phthalate	ND	U	500	53	1	05/19/05	05/24/05	KWG0507984	
Di-n-octyl Phthalate	ND	U	40	13	1	05/19/05	05/24/05	KWG0507984	
Naphthalene	ND	U	40	8.6	1	05/19/05	05/24/05	KWG0507984	
2-Methylnaphthalene	ND	U	40	30	1	05/19/05	05/24/05	KWG0507984	
Acenaphthylene	ND	U	40	6.7	1	05/19/05	05/24/05	KWG0507984	
Acenaphthene	ND	U	40	6.6	1	05/19/05	05/24/05	KWG0507984	
Fluoranthene	ND	U	40	5.7	1	05/19/05	05/24/05	KWG0507984	
Fluorene	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
Dibenzofuran	ND	U	40	21	1	05/19/05	05/24/05	KWG0507984	
Phenanthrene	ND	U	40	4.5	1	05/19/05	05/24/05	KWG0507984	
Anthracene	ND	U	40	6.2	1	05/19/05	05/24/05	KWG0507984	
Pyrene	ND	U	40	9.9	1	05/19/05	05/24/05	KWG0507984	
Benz(a)anthracene	ND	U	40	5.0	1	05/19/05	05/24/05	KWG0507984	
Chrysene	ND	U	40	5.8	1	05/19/05	05/24/05	KWG0507984	
Benzo(b)fluoranthene	ND	U	40	6.5	1	05/19/05	05/24/05	KWG0507984	
Benzo(k)fluoranthene	ND	U	40	7.2	1	05/19/05	05/24/05	KWG0507984	
Benzo(a)pyrene	ND	U	40	7.3	1	05/19/05	05/24/05	KWG0507984	

Comments:

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA

**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** Method Blank  
**Lab Code:** KWG0507984-17  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Indeno(1,2,3-cd)pyrene	ND	U	40	8.8	1	05/19/05	05/24/05	KWG0507984	
Dibenz(a,h)anthracene	ND	U	40	8.7	1	05/19/05	05/24/05	KWG0507984	
Benzo(g,h,i)perylene	ND	U	40	6.5	1	05/19/05	05/24/05	KWG0507984	

\* See Case Narrative

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
2-Fluorophenol	69	20-130	05/24/05	Acceptable
Phenol-d6	74	20-130	05/24/05	Acceptable
Nitrobenzene-d5	69	20-130	05/24/05	Acceptable
2-Fluorobiphenyl	84	20-130	05/24/05	Acceptable
2,4,6-Tribromophenol	81	20-130	05/24/05	Acceptable
Terphenyl-d14	105	20-130	05/24/05	Acceptable

† Analyte Comments

4-Methylphenol This analyte cannot be separated from 3-Methylphenol.

Comments:

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** PERCENT  
**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>	<u>Sur2</u>	<u>Sur3</u>	<u>Sur4</u>	<u>Sur5</u>	<u>Sur6</u>
LDW-T1-M-DC-EM-comp-1	K2503388-003	78	79	68	81	95	93
LDW-T1-M-DC-EM-comp-2	K2503388-004	82	86	80	78	86	89
LDW-T1-D-PS-WB-comp-1	K2503388-005	78	82	76	87	92	88
LDW-T4-D-PS-WB-comp-1	K2503388-011	92	97	89	99	113	102
LDW-T1-M-ES-WB-comp-3	K2503388-014	84	90	85	91	104	94
LDW-T1-M-ES-WB-comp-4	K2503388-015	84	89	82	89	103	95
LDW-T4-M-ES-WB-comp-2	K2503388-020	95	103	90	94	110	102
LDW-T1-M-DC-EM-comp-1DU	KWG0507984-18	72	75	69	76	91	88
Method Blank	KWG0507984-17	69	74	69	84	81	105
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	83	91	79	81	101	104
LDW-T1-M-ES-WB-comp-3DM	KWG0507984-10	82	86	81	84	98	89
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	91	98	90	92	108	97
LDW-T1-M-ES-WB-comp-4DM	KWG0507984-12	81	84	79	86	100	90
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	89	101	86	91	108	98
LDW-T4-M-ES-WB-comp-2DM	KWG0507984-14	89	100	87	91	110	101
LDW-T1-M-DC-EM-comp-1DM	KWG0507984-2	77	82	75	81	94	96
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	75	75	70	80	90	92
LDW-T1-M-DC-EM-comp-2DM	KWG0507984-4	83	86	83	88	95	100
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	81	87	81	88	98	94
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	86	92	85	96	111	104
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	74	76	72	82	95	89
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	92	96	91	102	120	110
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	85	86	87	89	100	92
Lab Control Sample	KWG0507984-15	79	82	78	88	98	102
Duplicate Lab Control Sample	KWG0507984-16	78	81	78	90	99	99

**Surrogate Recovery Control Limits (%)**

Sur1 = 2-Fluorophenol	20-130	Sur5 = 2,4,6-Tribromophenol	20-130
Sur2 = Phenol-d6	20-130	Sur6 = Terphenyl-d14	20-130
Sur3 = Nitrobenzene-d5	20-130		
Sur4 = 2-Fluorobiphenyl	20-130		

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 05/24/2005  
**Time Analyzed:** 13:42

**Internal Standard Area and RT Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**File ID:** J:\MS14\DATA\052405\0524F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0508270-2  
**Analysis Lot:** KWG0508270

	1,4-Dichlorobenzene-d4		Naphthalene-d8		Acenaphthene-d10	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	48,260	6.67	171,946	8.23	90,900	10.39
<b>Upper Limit ==&gt;</b>	96,520	7.17	343,892	8.73	181,800	10.89
<b>Lower Limit ==&gt;</b>	24,130	6.17	85,973	7.73	45,450	9.89
<b>ICAL Result ==&gt;</b>	55,373	6.73	203,280	8.28	107,108	10.44

*Associated Analyses*

Method Blank	KWG0507984-17	44,569	6.67	149,335	8.23	82,962	10.39
Lab Control Sample	KWG0507984-15	42,177	6.67	142,742	8.23	80,925	10.39
Duplicate Lab Control Sample	KWG0507984-16	44,196	6.68	145,682	8.23	83,134	10.39
LDW-T1-M-DC-EM-comp-1	K2503388-003	41,265	6.67	135,663	8.23	78,827	10.39
LDW-T1-M-DC-EM-comp-2	K2503388-004	40,033	6.68	135,573	8.23	79,364	10.39
LDW-T1-D-PS-WB-comp-1	K2503388-005	39,447	6.68	130,371	8.23	80,704	10.39
LDW-T4-D-PS-WB-comp-1	K2503388-011	40,443	6.68	133,580	8.23	83,485	10.39
LDW-T1-M-ES-WB-comp-3	K2503388-014	41,156	6.68	139,317	8.23	81,931	10.39
LDW-T1-M-ES-WB-comp-4	K2503388-015	40,484	6.68	136,669	8.23	81,983	10.39
LDW-T4-M-ES-WB-comp-2	K2503388-020	38,459	6.68	130,967	8.23	83,571	10.39
LDW-T1-M-DC-EM-comp-1DUP	KWG0507984-18	42,699	6.68	140,947	8.23	84,424	10.39
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	41,605	6.68	143,828	8.23	79,408	10.40
LDW-T1-M-DC-EM-comp-1DMS	KWG0507984-2	42,265	6.68	138,984	8.23	79,507	10.39
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	43,381	6.68	142,547	8.23	80,849	10.39
LDW-T1-M-DC-EM-comp-2DMS	KWG0507984-4	42,309	6.68	142,878	8.23	80,233	10.39
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	39,975	6.68	134,488	8.23	80,755	10.39
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	39,809	6.68	130,711	8.23	80,082	10.39
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	41,554	6.68	133,059	8.23	83,242	10.39
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	40,935	6.68	133,640	8.23	83,011	10.39

Results flagged with an asterisk (\*) indicate values outside control criteria.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 05/24/2005  
**Time Analyzed:** 13:42

**Internal Standard Area and RT Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**File ID:** J:\MS14\DATA\052405\0524F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0508270-2  
**Analysis Lot:** KWG0508270

	Phenanthrene-d10		Chrysene-d12		Perylene-d12	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	170,881	12.18	189,011	15.80	173,756	19.81
<b>Upper Limit ==&gt;</b>	341,762	12.68	378,022	16.30	347,512	20.31
<b>Lower Limit ==&gt;</b>	85,441	11.68	94,506	15.30	86,878	19.31
<b>ICAL Result ==&gt;</b>	179,881	12.23	214,209	15.88	181,451	19.91

**Associated Analyses**

Sample Name	ID	Area	RT	Area	RT	Area	RT
Method Blank	KWG0507984-17	137,763	12.18	152,384	15.80	144,608	19.81
Lab Control Sample	KWG0507984-15	130,156	12.18	155,660	15.80	140,399	19.81
Duplicate Lab Control Sample	KWG0507984-16	134,297	12.18	160,934	15.80	144,730	19.81
LDW-T1-M-DC-EM-comp-1	K2503388-003	131,996	12.18	150,662	15.80	141,947	19.81
LDW-T1-M-DC-EM-comp-2	K2503388-004	133,738	12.18	155,355	15.81	150,224	19.82
LDW-T1-D-PS-WB-comp-1	K2503388-005	139,055	12.18	165,043	15.83	165,123	19.87
LDW-T4-D-PS-WB-comp-1	K2503388-011	142,808	12.18	167,389	15.83	170,615	19.87
LDW-T1-M-ES-WB-comp-3	K2503388-014	147,809	12.18	172,431	15.85	177,911	19.90
LDW-T1-M-ES-WB-comp-4	K2503388-015	152,102	12.19	170,044	15.85	175,744	19.90
LDW-T4-M-ES-WB-comp-2	K2503388-020	142,170	12.19	161,223	15.87	168,490	19.97
LDW-T1-M-DC-EM-comp-1DUP	KWG0507984-18	140,473	12.19	160,824	15.82	163,111	19.84
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	147,227	12.19	155,197	15.82	164,025	19.84
LDW-T1-M-DC-EM-comp-1DMS	KWG0507984-2	144,628	12.19	155,652	15.82	161,959	19.84
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	147,835	12.19	158,346	15.82	164,255	19.84
LDW-T1-M-DC-EM-comp-2DMS	KWG0507984-4	149,816	12.19	159,361	15.82	166,960	19.84
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	151,252	12.19	163,718	15.84	169,501	19.89
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	150,415	12.19	162,091	15.85	169,026	19.89
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	150,439	12.19	163,518	15.84	170,666	19.89
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	147,844	12.19	162,634	15.85	169,462	19.89

Results flagged with an asterisk (\*) indicate values outside control criteria.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 05/25/2005  
**Time Analyzed:** 13:52

**Internal Standard Area and RT Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**File ID:** J:\MS14\DATA\052505\0525F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0508433-2  
**Analysis Lot:** KWG0508433

	1,4-Dichlorobenzene-d4		Naphthalene-d8		Acenaphthene-d10	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	52,909	6.60	178,796	8.15	96,535	10.32
<b>Upper Limit ==&gt;</b>	105,818	7.10	357,592	8.65	193,070	10.82
<b>Lower Limit ==&gt;</b>	26,455	6.10	89,398	7.65	48,268	9.82
<b>ICAL Result ==&gt;</b>	55,373	6.73	203,280	8.28	107,108	10.44

*Associated Analyses*

LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	39,140	6.60	133,916	8.16	82,646	10.32
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	39,677	6.60	135,077	8.16	81,801	10.32
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	38,190	6.61	132,470	8.16	78,190	10.32
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	42,488	6.61	138,819	8.16	84,214	10.32
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	39,749	6.61	136,060	8.16	84,680	10.32
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	39,913	6.61	136,156	8.16	86,664	10.33

Results flagged with an asterisk (\*) indicate values outside control criteria.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 05/25/2005  
**Time Analyzed:** 13:52

**Internal Standard Area and RT Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**File ID:** J:\MS14\DATA\052505\0525F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0508433-2  
**Analysis Lot:** KWG0508433

	Phenanthrene-d10		Chrysene-d12		Perylene-d12	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	163,965	12.11	189,097	15.69	168,228	19.65
<b>Upper Limit ==&gt;</b>	327,930	12.61	378,194	16.19	336,456	20.15
<b>Lower Limit ==&gt;</b>	81,983	11.61	94,549	15.19	84,114	19.15
<b>ICAL Result ==&gt;</b>	179,881	12.23	214,209	15.88	181,451	19.91

*Associated Analyses*

LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	151,004	12.11	173,314	15.73	178,620	19.74
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	152,204	12.11	173,112	15.74	176,462	19.74
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	146,773	12.12	164,394	15.74	170,288	19.75
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	154,096	12.12	175,309	15.74	181,481	19.75
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	150,420	12.12	171,374	15.76	176,818	19.82
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	149,557	12.12	168,883	15.77	170,395	19.83

Results flagged with an asterisk (\*) indicate values outside control criteria.



COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 05/27/2005  
**Time Analyzed:** 07:30

**Internal Standard Area and RT Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**File ID:** J:\MS14\DATA\052605\0526F012.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0508500-2  
**Analysis Lot:** KWG0508500

Phenanthrene-d10		
	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	137,874	6.75
<b>Upper Limit ==&gt;</b>	275,748	7.25
<b>Lower Limit ==&gt;</b>	68,937	6.25
<b>ICAL Result ==&gt;</b>	126,511	6.75

*Associated Analyses*

LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	114,637	6.75
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	118,722	6.75
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	114,362	6.76
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	123,906	6.76
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	117,936	6.76
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	119,210	6.77

Results flagged with an asterisk (\*) indicate values outside control criteria.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-1MS KWG0507984-1 Matrix Spike			LDW-T1-M-DC-EM-comp-1DMS KWG0507984-2 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	47	961	998	92	878	996	83	20-130	9	50
2-Chlorophenol	ND	940	998	94	881	996	88	20-130	6	50
1,4-Dichlorobenzene	ND	547	998	55	670	996	67	20-130	20	50
N-Nitrosodi-n-propylamine	ND	841	998	84	780	996	78	20-130	7	50
1,2,4-Trichlorobenzene	ND	732	998	73	791	996	79	20-130	8	50
4-Chloro-3-methylphenol	ND	1160	998	116	1150	996	115	20-130	1	50
4-Nitrophenol	ND	1170	998	118	1040	996	105	20-130	12	50
2,4-Dinitrotoluene	ND	1150	998	115	1070	996	108	20-130	6	50
Pentachlorophenol	ND	456	998	46	345	996	35	20-130	28	50
Acenaphthene	ND	838	998	84	844	996	85	20-130	1	50
Pyrene	ND	837	998	84	804	996	81	20-130	4	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/25/2005 -  
 05/27/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-ES-WB-comp-4  
**Lab Code:** K2503388-015  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-4MS KWG0507984-11 Matrix Spike			LDW-T1-M-ES-WB-comp-4DMS KWG0507984-12 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	89	2090	2000	100	1770	2000	84	20-130	17	50
2-Chlorophenol	ND	2060	2000	103	1800	2000	90	20-130	14	50
1,4-Dichlorobenzene	ND	1720	2000	86	1550	2000	77	20-130	10	50
N-Nitrosodi-n-propylamine	ND	1860	2000	93	1580	2000	79	20-130	16	50
1,2,4-Trichlorobenzene	ND	1860	2000	93	1700	2000	85	20-130	9	50
4-Chloro-3-methylphenol	ND	2480	2000	124	2310	2000	115	20-130	7	50
4-Nitrophenol	ND	2560	2000	128	2300	2000	115	20-130	11	50
2,4-Dinitrotoluene	ND	2350	2000	118	2100	2000	105	20-130	11	50
Pentachlorophenol	ND	1740	2000	87	1460	2000	73	20-130	18	50
Acenaphthene	ND	1900	2000	95	1730	2000	86	20-130	9	50
Pyrene	ND	1610	2000	81	1490	2000	74	20-130	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/25/2005 - 05/27/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T4-M-ES-WB-comp-2MS KWG0507984-13 Matrix Spike			LDW-T4-M-ES-WB-comp-2DMS KWG0507984-14 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	510	1570	1240	85	1560	1250	84	20-130	1	50
2-Chlorophenol	ND	1240	1240	99	1230	1250	99	20-130	0	50
1,4-Dichlorobenzene	ND	1020	1240	82	1030	1250	83	20-130	1	50
N-Nitrosodi-n-propylamine	ND	1110	1240	90	1140	1250	92	20-130	3	50
1,2,4-Trichlorobenzene	ND	1140	1240	92	1130	1250	91	20-130	1	50
4-Chloro-3-methylphenol	ND	1600	1240	129	1640	1250	132 *	20-130	2	50
4-Nitrophenol	ND	1670	1240	134 *	1390	1250	112	20-130	18	50
2,4-Dinitrotoluene	ND	1370	1240	110	1360	1250	109	20-130	1	50
Pentachlorophenol	ND	1010	1240	81	1080	1250	87	20-130	7	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-2  
**Lab Code:** K2503388-004  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T1-M-DC-EM-comp-2MS KWG0507984-3 Matrix Spike			LDW-T1-M-DC-EM-comp-2DMS KWG0507984-4 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	58	932	1240	70	1040	1240	79	20-130	11	50
2-Chlorophenol	ND	1010	1240	82	1130	1240	91	20-130	11	50
1,4-Dichlorobenzene	ND	837	1240	67	891	1240	72	20-130	6	50
N-Nitrosodi-n-propylamine	ND	891	1240	72	1040	1240	84	20-130	15	50
1,2,4-Trichlorobenzene	ND	948	1240	76	1040	1240	84	20-130	9	50
4-Chloro-3-methylphenol	ND	1310	1240	106	1390	1240	112	20-130	5	50
4-Nitrophenol	ND	1110	1240	90	1160	1240	94	20-130	4	50
2,4-Dinitrotoluene	ND	1240	1240	100	1320	1240	107	20-130	7	50
Pentachlorophenol	ND	427	1240	34	347	1240	28	20-130	21	50
Acenaphthene	ND	1010	1240	81	1070	1240	86	20-130	6	50
Pyrene	ND	947	1240	76	1030	1240	83	20-130	9	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-D-PS-WB-comp-1  
**Lab Code:** K2503388-005  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T1-D-PS-WB-comp-1MS KWG0507984-5 Matrix Spike			LDW-T1-D-PS-WB-comp-1DMS KWG0507984-6 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	41	1630	1980	80	1690	1980	83	20-130	4	50
2-Chlorophenol	ND	1780	1980	90	1860	1980	94	20-130	5	50
1,4-Dichlorobenzene	ND	1530	1980	78	1520	1980	76	20-130	1	50
N-Nitrosodi-n-propylamine	ND	1600	1980	81	1710	1980	86	20-130	7	50
1,2,4-Trichlorobenzene	ND	1690	1980	86	1780	1980	90	20-130	5	50
4-Chloro-3-methylphenol	ND	2210	1980	112	2530	1980	127	20-130	14	50
4-Nitrophenol	ND	1780	1980	90	2030	1980	102	20-130	13	50
2,4-Dinitrotoluene	ND	2080	1980	105	2270	1980	114	20-130	9	50
Pentachlorophenol	ND	976	1980	49	1460	1980	74	20-130	40	50
Acenaphthene	ND	1700	1980	86	1840	1980	93	20-130	8	50
Pyrene	ND	1490	1980	75	1610	1980	81	20-130	8	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005 - 05/25/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T4-D-PS-WB-comp-1  
**Lab Code:** K2503388-011  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T4-D-PS-WB-comp-1MS KWG0507984-7 Matrix Spike			LDW-T4-D-PS-WB-comp-1DMS KWG0507984-8 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	ND	1750	2370	74	2240	2380	94	20-130	25	50
2-Chlorophenol	ND	1930	2370	81	2500	2380	105	20-130	26	50
1,4-Dichlorobenzene	ND	1570	2370	66	2030	2380	85	20-130	26	50
N-Nitrosodi-n-propylamine	ND	1730	2370	73	2260	2380	95	20-130	27	50
1,2,4-Trichlorobenzene	ND	1860	2370	79	2390	2380	101	20-130	25	50
4-Chloro-3-methylphenol	ND	2640	2370	112	3380	2380	142 *	20-130	25	50
4-Nitrophenol	ND	1970	2370	83	2580	2380	109	20-130	27	50
2,4-Dinitrotoluene	ND	2290	2370	97	2960	2380	124	20-130	25	50
Pentachlorophenol	ND	1600	2370	68	2210	2380	93	20-130	32	50
Acenaphthene	ND	1910	2370	81	2450	2380	103	20-130	24	50
Pyrene	ND	1720	2370	73	2150	2380	91	20-130	22	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/25/2005 - 05/27/2005

**Matrix Spike/Duplicate Matrix Spike Summary  
Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-3MS KWG0507984-9 Matrix Spike			LDW-T1-M-ES-WB-comp-3DMS KWG0507984-10 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Phenol	240	1890	2000	83	2160	2000	96	20-130	13	50
2-Chlorophenol	ND	1820	2000	91	1840	2000	92	20-130	1	50
1,4-Dichlorobenzene	ND	1630	2000	82	1560	2000	78	20-130	4	50
N-Nitrosodi-n-propylamine	ND	1670	2000	83	1630	2000	82	20-130	2	50
1,2,4-Trichlorobenzene	ND	1710	2000	85	1680	2000	84	20-130	2	50
4-Chloro-3-methylphenol	ND	2400	2000	120	2340	2000	117	20-130	2	50
4-Nitrophenol	ND	2380	2000	119	2320	2000	116	20-130	3	50
2,4-Dinitrotoluene	ND	2040	2000	102	2140	2000	107	20-130	5	50
Pentachlorophenol	ND	1950	2000	98	1550	2000	78	20-130	23	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Duplicate Sample Summary**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	MRL	MDL	Sample Result	LDW-T1-M-DC-EM-comp-1DUP KWG0507984-18 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
N-Nitrosodimethylamine	40	10	ND	ND	ND	-	50
Aniline	800	230	ND	ND	ND	-	50
Bis(2-chloroethyl) Ether	40	8.7	ND	ND	ND	-	50
Phenol	100	17	47	34	40	34 #	50
2-Chlorophenol	80	11	ND	ND	ND	-	50
1,3-Dichlorobenzene	40	11	ND	ND	ND	-	50
1,4-Dichlorobenzene	40	11	ND	ND	ND	-	50
1,2-Dichlorobenzene	40	12	ND	ND	ND	-	50
Benzyl Alcohol	40	6.7	37	ND	NC	NC	50
Bis(2-chloroisopropyl) Ether	40	11	ND	ND	ND	-	50
2-Methylphenol	80	53	ND	ND	ND	-	50
Hexachloroethane	40	8.5	ND	ND	ND	-	50
N-Nitrosodi-n-propylamine	40	8.2	ND	ND	ND	-	50
4-Methylphenol	80	15	ND	ND	ND	-	50
Nitrobenzene	40	10	ND	ND	ND	-	50
Isophorone	40	5.8	ND	ND	ND	-	50
2-Nitrophenol	40	15	ND	ND	ND	-	50
2,4-Dimethylphenol	80	13	ND	ND	ND	-	50
Bis(2-chloroethoxy)methane	40	5.0	ND	ND	ND	-	50
2,4-Dichlorophenol	80	12	ND	ND	ND	-	50
Benzoic Acid	800	190	ND	ND	ND	-	50
1,2,4-Trichlorobenzene	40	9.9	ND	ND	ND	-	50
4-Chloroaniline	200	5.9	ND	ND	ND	-	50
Hexachlorobutadiene	40	8.5	ND	ND	ND	-	50
4-Chloro-3-methylphenol	200	72	ND	ND	ND	-	50
Hexachlorocyclopentadiene	5000	5000	ND	ND	ND	-	50
2,4,6-Trichlorophenol	80	8.8	ND	ND	ND	-	50
2,4,5-Trichlorophenol	80	11	ND	ND	ND	-	50
2-Chloronaphthalene	40	5.9	ND	ND	ND	-	50
2-Nitroaniline	200	26	ND	ND	ND	-	50
Dimethyl Phthalate	40	5.1	ND	ND	ND	-	50
2,6-Dinitrotoluene	40	7.0	ND	ND	ND	-	50
3-Nitroaniline	400	8.9	ND	ND	ND	-	50
2,4-Dinitrophenol	800	23	ND	ND	ND	-	50
4-Nitrophenol	400	7.5	ND	ND	ND	-	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Duplicate Sample Summary**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** LDW-T1-M-DC-EM-comp-1  
**Lab Code:** K2503388-003  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	MRL	MDL	Sample Result	LDW-T1-M-DC-EM-comp-1DUP KWG0507984-18 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
2,4-Dinitrotoluene	80	8.5	ND	ND	ND	-	50
4-Chlorophenyl Phenyl Ether	40	4.5	ND	ND	ND	-	50
Diethyl Phthalate	80	9.4	ND	ND	ND	-	50
4-Nitroaniline	200	26	ND	ND	ND	-	50
2-Methyl-4,6-dinitrophenol	400	15	ND	ND	ND	-	50
N-Nitrosodiphenylamine	40	9.5	ND	ND	ND	-	50
4-Bromophenyl Phenyl Ether	40	5.5	ND	ND	ND	-	50
Hexachlorobenzene	40	5.9	ND	ND	ND	-	50
Pentachlorophenol	400	31	ND	ND	ND	-	50
Carbazole	200	33	ND	ND	ND	-	50
Di-n-butyl Phthalate	40	16	17	ND	NC	NC	50
Benidine	5000	5000	ND	ND	ND	-	50
Butyl Benzyl Phthalate	40	14	ND	ND	ND	-	50
3,3'-Dichlorobenzidine	2000	780	ND	ND	ND	-	50
Bis(2-ethylhexyl) Phthalate	500	53	75	83	79	11 #	50
Di-n-octyl Phthalate	40	13	ND	ND	ND	-	50
Naphthalene	40	8.6	ND	ND	ND	-	50
2-Methylnaphthalene	40	30	ND	ND	ND	-	50
Acenaphthylene	40	6.7	ND	ND	ND	-	50
Acenaphthene	40	6.6	ND	ND	ND	-	50
Fluoranthene	40	5.7	ND	ND	ND	-	50
Fluorene	40	5.8	ND	ND	ND	-	50
Dibenzofuran	40	21	ND	ND	ND	-	50
Phenanthrene	40	4.5	ND	ND	ND	-	50
Anthracene	40	6.2	ND	ND	ND	-	50
Pyrene	40	9.9	ND	ND	ND	-	50
Benz(a)anthracene	40	5.0	ND	ND	ND	-	50
Chrysene	40	5.8	ND	ND	ND	-	50
Benzo(b)fluoranthene	40	6.5	ND	ND	ND	-	50
Benzo(k)fluoranthene	40	7.2	ND	ND	ND	-	50
Benzo(a)pyrene	40	7.3	ND	ND	ND	-	50
Indeno(1,2,3-cd)pyrene	40	8.8	ND	ND	ND	-	50
Dibenz(a,h)anthracene	40	8.7	ND	ND	ND	-	50
Benzo(g,h,i)perylene	40	6.5	ND	ND	ND	-	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Lab Control Spike/Duplicate Lab Control Spike Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Lab Control Sample KWG0507984-15 Lab Control Spike			Duplicate Lab Control Sample KWG0507984-16 Duplicate Lab Control Spike			%Rec Limits	RPD	RPD Limit
	Result	Expected	%Rec	Result	Expected	%Rec			
N-Nitrosodimethylamine	698	1000	70	731	1000	73	20-130	5	50
Aniline	376	1000	38	418	1000	42	20-130	11	50
Bis(2-chloroethyl) Ether	786	1000	79	823	1000	82	20-130	5	50
Phenol	853	1000	85	889	1000	89	20-130	4	50
2-Chlorophenol	869	1000	87	904	1000	90	20-130	4	50
1,3-Dichlorobenzene	801	1000	80	841	1000	84	20-130	5	50
1,4-Dichlorobenzene	785	1000	78	823	1000	82	20-130	5	50
1,2-Dichlorobenzene	827	1000	83	867	1000	87	20-130	5	50
Benzyl Alcohol	716	1000	72	750	1000	75	20-130	5	50
Bis(2-chloroisopropyl) Ether	717	1000	72	752	1000	75	20-130	5	50
2-Methylphenol	813	1000	81	845	1000	84	20-130	4	50
Hexachloroethane	779	1000	78	821	1000	82	20-130	5	50
N-Nitrosodi-n-propylamine	720	1000	72	761	1000	76	20-130	6	50
4-Methylphenol	792	1000	79	828	1000	83	20-130	4	50
Nitrobenzene	747	1000	75	779	1000	78	20-130	4	50
Isophorone	869	1000	87	937	1000	94	20-130	8	50
2-Nitrophenol	878	1000	88	950	1000	95	20-130	8	50
2,4-Dimethylphenol	722	1000	72	796	1000	80	20-130	10	50
Bis(2-chloroethoxy)methane	788	1000	79	848	1000	85	20-130	7	50
2,4-Dichlorophenol	951	1000	95	1010	1000	101	20-130	6	50
Benzoic Acid	1940	3000	65	2070	3000	69	20-130	7	50
1,2,4-Trichlorobenzene	835	1000	84	902	1000	90	20-130	8	50
4-Chloroaniline	669	1000	67	735	1000	74	20-130	9	50
Hexachlorobutadiene	853	1000	85	911	1000	91	20-130	7	50
4-Chloro-3-methylphenol	990	1000	99	1070	1000	107	20-130	8	50
Hexachlorocyclopentadiene	530	1000	53	587	1000	59	20-130	10	50
2,4,6-Trichlorophenol	954	1000	95	1020	1000	102	20-130	7	50
2,4,5-Trichlorophenol	946	1000	95	1040	1000	104	20-130	9	50
2-Chloronaphthalene	830	1000	83	893	1000	89	20-130	7	50
2-Nitroaniline	804	1000	80	882	1000	88	20-130	9	50
Dimethyl Phthalate	921	1000	92	975	1000	97	20-130	6	50
2,6-Dinitrotoluene	935	1000	94	994	1000	99	20-130	6	50
3-Nitroaniline	819	1000	82	894	1000	89	20-130	9	50
2,4-Dinitrophenol	920	1000	92	951	1000	95	20-130	3	50
4-Nitrophenol	883	1000	88	914	1000	91	20-130	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005

**Lab Control Spike/Duplicate Lab Control Spike Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507984

Analyte Name	Lab Control Sample KWG0507984-15 Lab Control Spike			Duplicate Lab Control Sample KWG0507984-16 Duplicate Lab Control Spike			%Rec Limits	RPD	RPD Limit
	Result	Expected	%Rec	Result	Expected	%Rec			
2,4-Dinitrotoluene	923	1000	92	981	1000	98	20-130	6	50
4-Chlorophenyl Phenyl Ether	882	1000	88	955	1000	96	20-130	8	50
Diethyl Phthalate	906	1000	91	955	1000	96	20-130	5	50
4-Nitroaniline	877	1000	88	924	1000	92	20-130	5	50
2-Methyl-4,6-dinitrophenol	948	1000	95	986	1000	99	20-130	4	50
N-Nitrosodiphenylamine	938	1000	94	999	1000	100	20-130	6	50
4-Bromophenyl Phenyl Ether	899	1000	90	950	1000	95	20-130	6	50
Hexachlorobenzene	966	1000	97	1020	1000	102	20-130	5	50
Pentachlorophenol	815	1000	82	837	1000	84	20-130	3	50
Carbazole	962	1000	96	988	1000	99	20-130	3	50
Di-n-butyl Phthalate	975	1000	97	989	1000	99	20-130	1	50
Benzidine	29.2	1000	3 *	14.6	1000	1 *	20-130	67 *	50
Butyl Benzyl Phthalate	947	1000	95	954	1000	95	20-130	1	50
3,3'-Dichlorobenzidine	815	1000	82	908	1000	91	20-130	11	50
Bis(2-ethylhexyl) Phthalate	991	1000	99	994	1000	99	20-130	0	50
Di-n-octyl Phthalate	979	1000	98	979	1000	98	20-130	0	50
Naphthalene	820	1000	82	882	1000	88	20-130	7	50
2-Methylnaphthalene	816	1000	82	877	1000	88	20-130	7	50
Acenaphthylene	902	1000	90	974	1000	97	20-130	8	50
Acenaphthene	854	1000	85	913	1000	91	20-130	7	50
Fluoranthene	1010	1000	101	1040	1000	104	20-130	2	50
Fluorene	892	1000	89	963	1000	96	20-130	8	50
Dibenzofuran	854	1000	85	936	1000	94	20-130	9	50
Phenanthrene	873	1000	87	909	1000	91	20-130	4	50
Anthracene	901	1000	90	931	1000	93	20-130	3	50
Pyrene	874	1000	87	893	1000	89	20-130	2	50
Benz(a)anthracene	950	1000	95	960	1000	96	20-130	1	50
Chrysene	933	1000	93	949	1000	95	20-130	2	50
Benzo(b)fluoranthene	965	1000	96	987	1000	99	20-130	2	50
Benzo(k)fluoranthene	940	1000	94	954	1000	95	20-130	1	50
Benzo(a)pyrene	976	1000	98	997	1000	100	20-130	2	50
Indeno(1,2,3-cd)pyrene	1070	1000	107	1090	1000	109	20-130	2	50
Dibenz(a,h)anthracene	1040	1000	104	1060	1000	106	20-130	2	50
Benzo(g,h,i)perylene	952	1000	95	971	1000	97	20-130	2	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005  
**Time Analyzed:** 14:15

**Method Blank Summary**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** Method Blank **File ID:** J:\MS14\DATA\052405\0524F003.D  
**Lab Code:** KWG0507984-17 **Instrument ID:** MS14  
**Extraction Method:** EPA 3541 **Level:** Low  
**Analysis Method:** 8270C SIM **Extraction Lot:** KWG0507984

This Method Blank applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Lab Control Sample	KWG0507984-15	J:\MS14\DATA\052405\0524F004.D	05/24/05	14:48
Duplicate Lab Control Sample	KWG0507984-16	J:\MS14\DATA\052405\0524F005.D	05/24/05	15:21
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\MS14\DATA\052405\0524F006.D	05/24/05	15:54
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\MS14\DATA\052405\0524F007.D	05/24/05	16:27
LDW-T1-D-PS-WB-comp-1	K2503388-005	J:\MS14\DATA\052405\0524F008.D	05/24/05	16:59
LDW-T4-D-PS-WB-comp-1	K2503388-011	J:\MS14\DATA\052405\0524F009.D	05/24/05	17:32
LDW-T1-M-ES-WB-comp-3	K2503388-014	J:\MS14\DATA\052405\0524F010.D	05/24/05	18:05
LDW-T1-M-ES-WB-comp-4	K2503388-015	J:\MS14\DATA\052405\0524F011.D	05/24/05	18:38
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\MS14\DATA\052405\0524F012.D	05/24/05	19:11
LDW-T1-M-DC-EM-comp-1DUP	KWG0507984-18	J:\MS14\DATA\052405\0524F013.D	05/24/05	19:43
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	J:\MS14\DATA\052405\0524F014.D	05/24/05	20:16
LDW-T1-M-DC-EM-comp-1DMS	KWG0507984-2	J:\MS14\DATA\052405\0524F015.D	05/24/05	20:49
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	J:\MS14\DATA\052405\0524F016.D	05/24/05	21:22
LDW-T1-M-DC-EM-comp-2DMS	KWG0507984-4	J:\MS14\DATA\052405\0524F017.D	05/24/05	21:56
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	J:\MS14\DATA\052405\0524F018.D	05/24/05	22:29
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	J:\MS14\DATA\052405\0524F019.D	05/24/05	23:02
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	J:\MS14\DATA\052405\0524F020.D	05/24/05	23:35
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	J:\MS14\DATA\052405\0524F021.D	05/25/05	00:08
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	J:\MS14\DATA\052505\0525F004.D	05/25/05	14:59
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	J:\MS14\DATA\052505\0525F005.D	05/25/05	15:32
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	J:\MS14\DATA\052505\0525F006.D	05/25/05	16:05
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	J:\MS14\DATA\052505\0525F007.D	05/25/05	16:37
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	J:\MS14\DATA\052505\0525F008.D	05/25/05	17:10
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	J:\MS14\DATA\052505\0525F009.D	05/25/05	17:43
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	J:\MS14\DATA\052605\0526F014.D	05/27/05	08:02
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	J:\MS14\DATA\052605\0526F015.D	05/27/05	08:17
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	J:\MS14\DATA\052605\0526F016.D	05/27/05	08:32
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	J:\MS14\DATA\052605\0526F017.D	05/27/05	08:47
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	J:\MS14\DATA\052605\0526F018.D	05/27/05	09:02
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	J:\MS14\DATA\052605\0526F019.D	05/27/05	09:18

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Lab Control Sample/Duplicate Lab Control Sample Summary  
 Semivolatile Organic Compounds by GC/MS SIM**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0507984-15  
**File ID:** J:\MS14\DATA\052405\0524F004.D  
**Instrument ID:** MS14  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005  
**Time Analyzed:** 14:48

**Sample Name:** Duplicate Lab Control Sample  
**Lab Code:** KWG0507984-16  
**File ID:** J:\MS14\DATA\052405\0524F005.D  
**Instrument ID:** MS14  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 05/24/2005  
**Time Analyzed:** 15:21

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Level:** Low  
**Extraction Lot:** KWG0507984

These Lab Control Samples apply to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Method Blank	KWG0507984-17	J:\MS14\DATA\052405\0524F003.D	05/24/05	14:15
LDW-T1-M-DC-EM-comp-1	K2503388-003	J:\MS14\DATA\052405\0524F006.D	05/24/05	15:54
LDW-T1-M-DC-EM-comp-2	K2503388-004	J:\MS14\DATA\052405\0524F007.D	05/24/05	16:27
LDW-T1-D-PS-WB-comp-1	K2503388-005	J:\MS14\DATA\052405\0524F008.D	05/24/05	16:59
LDW-T4-D-PS-WB-comp-1	K2503388-011	J:\MS14\DATA\052405\0524F009.D	05/24/05	17:32
LDW-T1-M-ES-WB-comp-3	K2503388-014	J:\MS14\DATA\052405\0524F010.D	05/24/05	18:05
LDW-T1-M-ES-WB-comp-4	K2503388-015	J:\MS14\DATA\052405\0524F011.D	05/24/05	18:38
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\MS14\DATA\052405\0524F012.D	05/24/05	19:11
LDW-T1-M-DC-EM-comp-1DUP	KWG0507984-18	J:\MS14\DATA\052405\0524F013.D	05/24/05	19:43
LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	J:\MS14\DATA\052405\0524F014.D	05/24/05	20:16
LDW-T1-M-DC-EM-comp-1DMS	KWG0507984-2	J:\MS14\DATA\052405\0524F015.D	05/24/05	20:49
LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	J:\MS14\DATA\052405\0524F016.D	05/24/05	21:22
LDW-T1-M-DC-EM-comp-2DMS	KWG0507984-4	J:\MS14\DATA\052405\0524F017.D	05/24/05	21:56
LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	J:\MS14\DATA\052405\0524F018.D	05/24/05	22:29
LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	J:\MS14\DATA\052405\0524F019.D	05/24/05	23:02
LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	J:\MS14\DATA\052405\0524F020.D	05/24/05	23:35
LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	J:\MS14\DATA\052405\0524F021.D	05/25/05	00:08
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	J:\MS14\DATA\052505\0525F004.D	05/25/05	14:59
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	J:\MS14\DATA\052505\0525F005.D	05/25/05	15:32
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	J:\MS14\DATA\052505\0525F006.D	05/25/05	16:05
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	J:\MS14\DATA\052505\0525F007.D	05/25/05	16:37
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	J:\MS14\DATA\052505\0525F008.D	05/25/05	17:10
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	J:\MS14\DATA\052505\0525F009.D	05/25/05	17:43
LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	J:\MS14\DATA\052605\0526F014.D	05/27/05	08:02
LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	J:\MS14\DATA\052605\0526F015.D	05/27/05	08:17
LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	J:\MS14\DATA\052605\0526F016.D	05/27/05	08:32
LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	J:\MS14\DATA\052605\0526F017.D	05/27/05	08:47
LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	J:\MS14\DATA\052605\0526F018.D	05/27/05	09:02
LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	J:\MS14\DATA\052605\0526F019.D	05/27/05	09:18

## COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Analysis Method:** 8270C SIM

**Analysis Lot:** KWG0508270  
**Instrument ID:** MS14

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0524F001.D	GC/MS Tuning - Decafluorotripheny	KWG0508270-1	5/24/2005	13:20		5/24/2005	13:35
0524F002.D	Continuing Calibration Verification	KWG0508270-2	5/24/2005	13:42		5/24/2005	14:06
0524F003.D	Method Blank	KWG0507984-17	5/24/2005	14:15		5/24/2005	14:39
0524F004.D	Lab Control Sample	KWG0507984-15	5/24/2005	14:48		5/24/2005	15:12
0524F005.D	Duplicate Lab Control Sample	KWG0507984-16	5/24/2005	15:21		5/24/2005	15:45
0524F006.D	LDW-T1-M-DC-EM-comp-1	K2503388-003	5/24/2005	15:54		5/24/2005	16:18
0524F007.D	LDW-T1-M-DC-EM-comp-2	K2503388-004	5/24/2005	16:27		5/24/2005	16:51
0524F008.D	LDW-T1-D-PS-WB-comp-1	K2503388-005	5/24/2005	16:59		5/24/2005	17:23
0524F009.D	LDW-T4-D-PS-WB-comp-1	K2503388-011	5/24/2005	17:32		5/24/2005	17:56
0524F010.D	LDW-T1-M-ES-WB-comp-3	K2503388-014	5/24/2005	18:05		5/24/2005	18:29
0524F011.D	LDW-T1-M-ES-WB-comp-4	K2503388-015	5/24/2005	18:38		5/24/2005	19:02
0524F012.D	LDW-T4-M-ES-WB-comp-2	K2503388-020	5/24/2005	19:11		5/24/2005	19:35
0524F013.D	LDW-T1-M-DC-EM-comp-1DUP	KWG0507984-18	5/24/2005	19:43		5/24/2005	20:07
0524F014.D	LDW-T1-M-DC-EM-comp-1MS	KWG0507984-1	5/24/2005	20:16		5/24/2005	20:40
0524F015.D	LDW-T1-M-DC-EM-comp-1DMS	KWG0507984-2	5/24/2005	20:49		5/24/2005	21:13
0524F016.D	LDW-T1-M-DC-EM-comp-2MS	KWG0507984-3	5/24/2005	21:22		5/24/2005	21:46
0524F017.D	LDW-T1-M-DC-EM-comp-2DMS	KWG0507984-4	5/24/2005	21:56		5/24/2005	22:20
0524F018.D	LDW-T1-D-PS-WB-comp-1MS	KWG0507984-5	5/24/2005	22:29		5/24/2005	22:53
0524F019.D	LDW-T1-D-PS-WB-comp-1DMS	KWG0507984-6	5/24/2005	23:02		5/24/2005	23:26
0524F020.D	LDW-T4-D-PS-WB-comp-1MS	KWG0507984-7	5/24/2005	23:35		5/24/2005	23:59
0524F021.D	LDW-T4-D-PS-WB-comp-1DMS	KWG0507984-8	5/25/2005	00:08		5/25/2005	00:32
0524F022.D	Instrument Blank	KWG0508270-3	5/25/2005	00:41		5/25/2005	01:05

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

## COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log**  
**Semivolatile Organic Compounds by GC/MS SIM**

**Analysis Method:** 8270C SIM

**Analysis Lot:** KWG0508433  
**Instrument ID:** MS14

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0525F001.D	GC/MS Tuning - Decafluorotripheny	KWG0508433-1	5/25/2005	13:03		5/25/2005	13:18
0525F002.D	Continuing Calibration Verification	KWG0508433-2	5/25/2005	13:52		5/25/2005	14:16
0525F003.D	Instrument Blank	KWG0508433-3	5/25/2005	14:27		5/25/2005	14:51
0525F004.D	LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	5/25/2005	14:59		5/25/2005	15:23
0525F005.D	LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	5/25/2005	15:32		5/25/2005	15:56
0525F006.D	LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	5/25/2005	16:05		5/25/2005	16:29
0525F007.D	LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	5/25/2005	16:37		5/25/2005	17:01
0525F008.D	LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	5/25/2005	17:10		5/25/2005	17:34
0525F009.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	5/25/2005	17:43		5/25/2005	18:07

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis



**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Semivolatile Organic Compounds by GC/MS SIM**

**Analysis Method:** 8270C SIM

**Analysis Lot:** KWG0508500  
**Instrument ID:** MS14

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0526F011.D	GC/MS Tuning - Decafluorotripheny	KWG0508500-1	5/27/2005	07:12		5/27/2005	07:27
0526F012.D	Continuing Calibration Verification	KWG0508500-2	5/27/2005	07:30		5/27/2005	07:42
0526F013.D	Instrument Blank	KWG0508500-3	5/27/2005	07:46		5/27/2005	07:58
0526F014.D	LDW-T1-M-ES-WB-comp-3MS	KWG0507984-9	5/27/2005	08:02		5/27/2005	08:14
0526F015.D	LDW-T1-M-ES-WB-comp-3DMS	KWG0507984-10	5/27/2005	08:17		5/27/2005	08:29
0526F016.D	LDW-T1-M-ES-WB-comp-4MS	KWG0507984-11	5/27/2005	08:32		5/27/2005	08:44
0526F017.D	LDW-T1-M-ES-WB-comp-4DMS	KWG0507984-12	5/27/2005	08:47		5/27/2005	08:59
0526F018.D	LDW-T4-M-ES-WB-comp-2MS	KWG0507984-13	5/27/2005	09:02		5/27/2005	09:14
0526F019.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0507984-14	5/27/2005	09:18		5/27/2005	09:30

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005

**Extraction Prep Log  
Semivolatile Organic Compounds by GC/MS SIM**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Extraction Lot:** KWG0507984  
**Level:** Low

Sample Name	Lab Code	Date Collected	Date Received	Sample Amount	Final Volume	% Solids	Note
LDW-T1-M-DC-EM-comp-1	K2503388-003	08/30/04	12/09/04	10.07g	4ml	NA	
LDW-T1-M-DC-EM-comp-2	K2503388-004	08/30/04	12/09/04	8.17g	4ml	NA	
LDW-T1-D-PS-WB-comp-1	K2503388-005	08/05/04	12/01/04	5.06g	4ml	NA	
LDW-T4-D-PS-WB-comp-1	K2503388-011	08/04/04	12/01/04	4.25g	4ml	NA	
LDW-T1-M-ES-WB-comp-3	K2503388-014	08/02/04	12/01/04	5.01g	4ml	NA	
LDW-T1-M-ES-WB-comp-4	K2503388-015	08/02/04	12/01/04	5.02g	4ml	NA	
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/04	12/01/04	8.03g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0507984-18	08/30/04	12/09/04	10.02g	4ml	NA	
Method Blank	KWG0507984-17	NA	NA	10.07g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0507984-1	08/30/04	12/09/04	10.02g	4ml	NA	
LDW-T1-M-ES-WB-comp-3D	KWG0507984-10	08/02/04	12/01/04	5.00g	4ml	NA	
LDW-T1-M-ES-WB-comp-4	KWG0507984-11	08/02/04	12/01/04	5.01g	4ml	NA	
LDW-T1-M-ES-WB-comp-4D	KWG0507984-12	08/02/04	12/01/04	5.00g	4ml	NA	
LDW-T4-M-ES-WB-comp-2	KWG0507984-13	08/30/04	12/01/04	8.04g	4ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0507984-14	08/30/04	12/01/04	8.03g	4ml	NA	
LDW-T1-M-DC-EM-comp-1	KWG0507984-2	08/30/04	12/09/04	10.04g	4ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0507984-3	08/30/04	12/09/04	8.06g	4ml	NA	
LDW-T1-M-DC-EM-comp-2	KWG0507984-4	08/30/04	12/09/04	8.06g	4ml	NA	
LDW-T1-D-PS-WB-comp-1M	KWG0507984-5	08/05/04	12/01/04	5.06g	4ml	NA	
LDW-T1-D-PS-WB-comp-1D	KWG0507984-6	08/05/04	12/01/04	5.04g	4ml	NA	
LDW-T4-D-PS-WB-comp-1M	KWG0507984-7	08/04/04	12/01/04	4.22g	4ml	NA	
LDW-T4-D-PS-WB-comp-1D	KWG0507984-8	08/04/04	12/01/04	4.21g	4ml	NA	
LDW-T1-M-ES-WB-comp-3	KWG0507984-9	08/02/04	12/01/04	5.01g	4ml	NA	
Lab Control Sample	KWG0507984-15	NA	NA	10.00g	4ml	NA	
Duplicate Lab Control Sample	KWG0507984-16	NA	NA	10.00g	4ml	NA	

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**Polynuclear Aromatic Hydrocarbons  
EPA Method 8270C**

Organic Analysis:  
Polynuclear Aromatic Hydrocarbons

Summary Package

Sample and QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Cover Page - Organic Analysis Data Package  
 Polynuclear Aromatic Hydrocarbons**

Sample Name	Lab Code	Date Collected	Date Received
LDW-T1-M-ES-WB-comp-3	K2503388-014	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5	K2503388-016	08/02/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/2004	12/01/2004
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	08/02/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2	KWG0507988-10	08/30/2004	12/01/2004
LDW-T1-M-ES-WB-comp-3DM	KWG0507988-2	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	08/02/2004	12/01/2004
LDW-T1-M-ES-WB-comp-5DM	KWG0507988-4	08/02/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	08/30/2004	12/01/2004
LDW-T4-M-ES-WB-comp-2DM	KWG0507988-6	08/30/2004	12/01/2004

I certify that this data package is in compliance with the terms and conditions of the contract, both technically and for completeness, for other than the conditions detailed in the case narrative. Release of the data contained in this hardcopy data package and in the computer-readable data submitted on floppy diskette has been authorized by the Laboratory Manager or the Manager's designee, as verified by the following signature.

Signature: 

Name: Carl Deyner

Date: 6/10/05

Title: SVM Supervisor

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Naphthalene	10	B	2.5	0.47	1	05/19/05	06/06/05	KWG0507988	
2-Methylnaphthalene	4.0		2.5	0.37	1	05/19/05	06/06/05	KWG0507988	
Acenaphthylene	1.7		1.3	0.23	1	05/19/05	06/06/05	KWG0507988	
Acenaphthene	6.2		1.3	0.23	1	05/19/05	06/06/05	KWG0507988	
Dibenzofuran	3.4		1.3	0.18	1	05/19/05	06/06/05	KWG0507988	
Fluorene	3.7		1.3	0.22	1	05/19/05	06/06/05	KWG0507988	
Phenanthrene	9.3		1.3	0.45	1	05/19/05	06/06/05	KWG0507988	
Anthracene	5.2		1.3	0.20	1	05/19/05	06/06/05	KWG0507988	
Fluoranthene	5.1		1.3	0.89	1	05/19/05	06/06/05	KWG0507988	
Pyrene	3.1		1.3	0.69	1	05/19/05	06/06/05	KWG0507988	
Benz(a)anthracene	ND	U	1.3	0.30	1	05/19/05	06/06/05	KWG0507988	
Chrysene	4.1		1.3	0.47	1	05/19/05	06/06/05	KWG0507988	
Benzo(b)fluoranthene	2.2		1.3	0.37	1	05/19/05	06/06/05	KWG0507988	
Benzo(k)fluoranthene	1.5		1.3	0.32	1	05/19/05	06/06/05	KWG0507988	
Benzo(a)pyrene	1.3		1.3	0.30	1	05/19/05	06/06/05	KWG0507988	
Indeno(1,2,3-cd)pyrene	0.91	J	1.3	0.40	1	05/19/05	06/06/05	KWG0507988	
Dibenz(a,h)anthracene	0.30	J	1.3	0.27	1	05/19/05	06/06/05	KWG0507988	
Benzo(g,h,i)perylene	0.84	J	1.3	0.42	1	05/19/05	06/06/05	KWG0507988	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Fluorene-d10	65	53-103	06/06/05	Acceptable
Fluoranthene-d10	93	56-109	06/06/05	Acceptable
Terphenyl-d14	92	50-124	06/06/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/02/2004  
**Date Received:** 12/01/2004

**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T1-M-ES-WB-comp-5  
**Lab Code:** K2503388-016  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Naphthalene	5.2	B	1.2	0.21	1	05/19/05	06/06/05	KWG0507988	
2-Methylnaphthalene	2.8		1.2	0.17	1	05/19/05	06/06/05	KWG0507988	
Acenaphthylene	1.4		0.56	0.11	1	05/19/05	06/06/05	KWG0507988	
Acenaphthene	4.5		0.56	0.11	1	05/19/05	06/06/05	KWG0507988	
Dibenzofuran	2.6		0.56	0.079	1	05/19/05	06/06/05	KWG0507988	
Fluorene	2.1		0.56	0.097	1	05/19/05	06/06/05	KWG0507988	
Phenanthrene	11		0.56	0.20	1	05/19/05	06/06/05	KWG0507988	
Anthracene	ND	U	0.56	0.089	1	05/19/05	06/06/05	KWG0507988	
Fluoranthene	5.9		0.56	0.40	1	05/19/05	06/06/05	KWG0507988	
Pyrene	ND	U	0.56	0.31	1	05/19/05	06/06/05	KWG0507988	
Benz(a)anthracene	ND	U	0.56	0.14	1	05/19/05	06/06/05	KWG0507988	
Chrysene	ND	U	0.56	0.21	1	05/19/05	06/06/05	KWG0507988	
Benzo(b)fluoranthene	ND	U	0.56	0.17	1	05/19/05	06/06/05	KWG0507988	
Benzo(k)fluoranthene	ND	U	0.56	0.15	1	05/19/05	06/06/05	KWG0507988	
Benzo(a)pyrene	ND	U	0.56	0.14	1	05/19/05	06/06/05	KWG0507988	
Indeno(1,2,3-cd)pyrene	1.7		0.56	0.18	1	05/19/05	06/06/05	KWG0507988	
Dibenz(a,h)anthracene	ND	U	0.56	0.13	1	05/19/05	06/06/05	KWG0507988	
Benzo(g,h,i)perylene	1.0		0.56	0.19	1	05/19/05	06/06/05	KWG0507988	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Fluorene-d10	71	53-103	06/06/05	Acceptable
Fluoranthene-d10	86	56-109	06/06/05	Acceptable
Terphenyl-d14	85	50-124	06/06/05	Acceptable

**Comments:** \_\_\_\_\_

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** 08/30/2004  
**Date Received:** 12/01/2004

**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
Naphthalene	5.6	B	1.5	0.27	1	05/19/05	06/06/05	KWG0507988	
2-Methylnaphthalene	2.1		1.5	0.22	1	05/19/05	06/06/05	KWG0507988	
Acenaphthylene	0.94		0.72	0.14	1	05/19/05	06/06/05	KWG0507988	
Acenaphthene	7.5		0.72	0.13	1	05/19/05	06/06/05	KWG0507988	
Dibenzofuran	3.7		0.72	0.11	1	05/19/05	06/06/05	KWG0507988	
Fluorene	2.6		0.72	0.13	1	05/19/05	06/06/05	KWG0507988	
Phenanthrene	3.8		0.72	0.26	1	05/19/05	06/06/05	KWG0507988	
Anthracene	2.0		0.72	0.12	1	05/19/05	06/06/05	KWG0507988	
Fluoranthene	ND	U	0.72	0.52	1	05/19/05	06/06/05	KWG0507988	
Pyrene	ND	U	0.72	0.40	1	05/19/05	06/06/05	KWG0507988	
Benz(a)anthracene	2.8		0.72	0.18	1	05/19/05	06/06/05	KWG0507988	
Chrysene	3.7		0.72	0.27	1	05/19/05	06/06/05	KWG0507988	
Benzo(b)fluoranthene	ND	U	0.72	0.22	1	05/19/05	06/06/05	KWG0507988	
Benzo(k)fluoranthene	ND	U	0.72	0.19	1	05/19/05	06/06/05	KWG0507988	
Benzo(a)pyrene	ND	U	0.72	0.18	1	05/19/05	06/06/05	KWG0507988	
Indeno(1,2,3-cd)pyrene	ND	U	0.72	0.23	1	05/19/05	06/06/05	KWG0507988	
Dibenz(a,h)anthracene	ND	U	0.72	0.16	1	05/19/05	06/06/05	KWG0507988	
Benzo(g,h,i)perylene	ND	U	0.72	0.25	1	05/19/05	06/06/05	KWG0507988	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Fluorene-d10	71	53-103	06/06/05	Acceptable
Fluoranthene-d10	88	56-109	06/06/05	Acceptable
Terphenyl-d14	90	50-124	06/06/05	Acceptable

**Comments:** \_\_\_\_\_



**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA

**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** Method Blank  
**Lab Code:** KWG0507988-9  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low

Analyte Name	Result	Q	MRL	MDL	Dilution Factor	Date Extracted	Date Analyzed	Extraction Lot	Note
<b>Naphthalene</b>	<b>2.3</b>		1.2	0.21	1	05/19/05	06/07/05	KWG0507988	
2-Methylnaphthalene	ND	U	1.2	0.17	1	05/19/05	06/07/05	KWG0507988	
Acenaphthylene	ND	U	0.56	0.11	1	05/19/05	06/07/05	KWG0507988	
Acenaphthene	ND	U	0.56	0.11	1	05/19/05	06/07/05	KWG0507988	
Dibenzofuran	ND	U	0.56	0.079	1	05/19/05	06/07/05	KWG0507988	
Fluorene	ND	U	0.56	0.097	1	05/19/05	06/07/05	KWG0507988	
Phenanthrene	ND	U	0.56	0.20	1	05/19/05	06/07/05	KWG0507988	
Anthracene	ND	U	0.56	0.089	1	05/19/05	06/07/05	KWG0507988	
Fluoranthene	ND	U	0.56	0.40	1	05/19/05	06/07/05	KWG0507988	
Pyrene	ND	U	0.56	0.31	1	05/19/05	06/07/05	KWG0507988	
Benz(a)anthracene	ND	U	0.56	0.14	1	05/19/05	06/07/05	KWG0507988	
Chrysene	ND	U	0.56	0.21	1	05/19/05	06/07/05	KWG0507988	
Benzo(b)fluoranthene	ND	U	0.56	0.17	1	05/19/05	06/07/05	KWG0507988	
Benzo(k)fluoranthene	ND	U	0.56	0.15	1	05/19/05	06/07/05	KWG0507988	
Benzo(a)pyrene	ND	U	0.56	0.14	1	05/19/05	06/07/05	KWG0507988	
Indeno(1,2,3-cd)pyrene	ND	U	0.56	0.18	1	05/19/05	06/07/05	KWG0507988	
Dibenz(a,h)anthracene	ND	U	0.56	0.13	1	05/19/05	06/07/05	KWG0507988	
Benzo(g,h,i)perylene	ND	U	0.56	0.19	1	05/19/05	06/07/05	KWG0507988	

Surrogate Name	%Rec	Control Limits	Date Analyzed	Note
Fluorene-d10	65	53-103	06/07/05	Acceptable
Fluoranthene-d10	95	56-109	06/07/05	Acceptable
Terphenyl-d14	102	50-124	06/07/05	Acceptable

**Comments:** \_\_\_\_\_

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Surrogate Recovery Summary  
 Polynuclear Aromatic Hydrocarbons**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** PERCENT  
**Level:** Low

<u>Sample Name</u>	<u>Lab Code</u>	<u>Sur1</u>	<u>Sur2</u>	<u>Sur3</u>
LDW-T1-M-ES-WB-comp-3	K2503388-014	65	93	92
LDW-T1-M-ES-WB-comp-5	K2503388-016	71	86	85
LDW-T4-M-ES-WB-comp-2	K2503388-020	71	88	90
LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	78	96	99
Method Blank	KWG0507988-9	65	95	102
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	77	92	89
LDW-T1-M-ES-WB-comp-3DM	KWG0507988-2	67	87	86
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	73 D	90 D	91 D
LDW-T1-M-ES-WB-comp-5DM	KWG0507988-4	78 D	96 D	95 D
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	85 D	90 D	92 D
LDW-T4-M-ES-WB-comp-2DM	KWG0507988-6	77 D	95 D	95 D
Lab Control Sample	KWG0507988-7	80	92	93
Duplicate Lab Control Sample	KWG0507988-8	82	95	95

**Surrogate Recovery Control Limits (%)**

---

Sur1 = Fluorene-d10	53-103
Sur2 = Fluoranthene-d10	56-109
Sur3 = Terphenyl-d14	50-124

---

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 06/06/2005  
**Time Analyzed:** 10:13

**Internal Standard Area and RT Summary  
 Polynuclear Aromatic Hydrocarbons**

**File ID:** J:\MS14\DATA\060605\0606F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0509153-2  
**Analysis Lot:** KWG0509153

	Naphthalene-d8		Acenaphthene-d10		Phenanthrene-d10	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	93,513	5.93	61,301	7.45	110,431	8.67
<b>Upper Limit ==&gt;</b>	187,026	6.43	122,602	7.95	220,862	9.17
<b>Lower Limit ==&gt;</b>	46,757	5.43	30,651	6.95	55,216	8.17
<b>ICAL Result ==&gt;</b>	109,898	5.92	68,931	7.44	122,785	8.67

*Associated Analyses*

Lab Control Sample	KWG0507988-7	93,186	5.92	59,167	7.45	105,484	8.67
Duplicate Lab Control Sample	KWG0507988-8	88,306	5.92	55,897	7.45	99,122	8.67
LDW-T1-M-ES-WB-comp-3	K2503388-014	90,622	5.93	56,839	7.45	104,330	8.67
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	91,341	5.93	58,554	7.45	104,823	8.67
LDW-T1-M-ES-WB-comp-3DMS	KWG0507988-2	88,733	5.93	56,654	7.46	101,302	8.68
LDW-T1-M-ES-WB-comp-5	K2503388-016	92,262	5.94	58,794	7.46	108,228	8.69
LDW-T4-M-ES-WB-comp-2	K2503388-020	92,059	5.95	58,636	7.48	104,184	8.70
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	100,587	5.94	64,658	7.47	116,356	8.69
LDW-T4-M-ES-WB-comp-2DMS	KWG0507988-6	90,264	5.94	57,813	7.47	101,975	8.69
LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	91,788	5.94	59,106	7.47	106,707	8.69

Results flagged with an asterisk (\*) indicate values outside control criteria.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 06/06/2005  
**Time Analyzed:** 10:13

**Internal Standard Area and RT Summary**  
**Polynuclear Aromatic Hydrocarbons**

**File ID:** J:\MS14\DATA\060605\0606F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0509153-2  
**Analysis Lot:** KWG0509153

	Chrysene-d12		Perylene-d12	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	121,966	11.52	118,556	15.37
<b>Upper Limit ==&gt;</b>	243,932	12.02	237,112	15.87
<b>Lower Limit ==&gt;</b>	60,983	11.02	59,278	14.87
<b>ICAL Result ==&gt;</b>	133,647	11.51	123,334	15.35

**Associated Analyses**

Sample Name	ID	Area	RT	Area	RT
Lab Control Sample	KWG0507988-7	118,552	11.52	114,747	15.37
Duplicate Lab Control Sample	KWG0507988-8	110,918	11.52	107,036	15.36
LDW-T1-M-ES-WB-comp-3	K2503388-014	120,272	11.54	123,598	15.42
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	121,944	11.56	126,624	15.49
LDW-T1-M-ES-WB-comp-3DMS	KWG0507988-2	117,421	11.57	121,705	15.51
LDW-T1-M-ES-WB-comp-5	K2503388-016	125,236	11.62	118,833	15.71
LDW-T4-M-ES-WB-comp-2	K2503388-020	123,135	11.67	122,834	15.75
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	134,310	11.59	135,040	15.53
LDW-T4-M-ES-WB-comp-2DMS	KWG0507988-6	118,712	11.58	119,741	15.53
LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	124,653	11.62	125,683	15.69

Results flagged with an asterisk (\*) indicate values outside control criteria.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 06/07/2005  
**Time Analyzed:** 10:05

**Internal Standard Area and RT Summary  
 Polynuclear Aromatic Hydrocarbons**

**File ID:** J:\MS14\DATA\060705\0607F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0509208-2  
**Analysis Lot:** KWG0509208

	Naphthalene-d8		Acenaphthene-d10		Phenanthrene-d10		
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>	
<b>Results =&gt;</b>	115,428	5.92	75,919	7.45	136,834	8.67	
<b>Upper Limit =&gt;</b>	230,856	6.42	151,838	7.95	273,668	9.17	
<b>Lower Limit =&gt;</b>	57,714	5.42	37,960	6.95	68,417	8.17	
<b>ICAL Result =&gt;</b>	109,898	5.92	68,931	7.44	122,785	8.67	
<i>Associated Analyses</i>							
Method Blank	KWG0507988-9	93,490	5.91	59,456	7.44	105,782	8.66
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	97,686	5.91	62,113	7.44	112,599	8.66
LDW-T1-M-ES-WB-comp-5DMS	KWG0507988-4	98,390	5.91	62,762	7.44	113,304	8.66

Results flagged with an asterisk (\*) indicate values outside control criteria.

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388  
**Date Analyzed:** 06/07/2005  
**Time Analyzed:** 10:05

**Internal Standard Area and RT Summary  
 Polynuclear Aromatic Hydrocarbons**

**File ID:** J:\MS14\DATA\060705\0607F002.D  
**Instrument ID:** MS14  
**Analysis Method:** 8270C SIM

**Lab Code:** KWG0509208-2  
**Analysis Lot:** KWG0509208

	Chrysene-d12		Perylene-d12	
	<u>Area</u>	<u>RT</u>	<u>Area</u>	<u>RT</u>
<b>Results ==&gt;</b>	153,745	11.54	154,876	15.42
<b>Upper Limit ==&gt;</b>	307,490	12.04	309,752	15.92
<b>Lower Limit ==&gt;</b>	76,873	11.04	77,438	14.92
<b>ICAL Result ==&gt;</b>	133,647	11.51	123,334	15.35

**Associated Analyses**

Method Blank	KWG0507988-9	117,411	11.50	114,597	15.34
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	130,102	11.52	132,446	15.36
LDW-T1-M-ES-WB-comp-5DMS	KWG0507988-4	132,272	11.53	132,180	15.40

Results flagged with an asterisk (\*) indicate values outside control criteria.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T1-M-ES-WB-comp-3  
**Lab Code:** K2503388-014  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507988

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-3MS			LDW-T1-M-ES-WB-comp-3DMS			%Rec Limits	RPD	RPD Limit
		KWG0507988-1			KWG0507988-2					
		Result	Expected	%Rec	Result	Expected	%Rec			
Naphthalene	10	511	616	81	370	614	59	20-130	32	50
2-Methylnaphthalene	4.0	561	616	90	419	614	68	20-130	29	50
Acenaphthylene	1.7	618	616	100	540	614	88	20-130	13	50
Acenaphthene	6.2	570	616	92	479	614	77	20-130	17	50
Dibenzofuran	3.4	586	616	95	539	614	87	20-130	8	50
Fluorene	3.7	616	616	99	562	614	91	20-130	9	50
Phenanthrene	9.3	576	616	92	530	614	85	20-130	8	50
Anthracene	5.2	636	616	102	583	614	94	20-130	9	50
Fluoranthene	5.1	631	616	102	587	614	95	20-130	7	50
Pyrene	3.1	570	616	92	527	614	85	20-130	8	50
Benz(a)anthracene	ND	643	616	104	596	614	97	20-130	8	50
Chrysene	4.1	592	616	96	550	614	89	20-130	7	50
Benzo(b)fluoranthene	2.2	614	616	99	579	614	94	20-130	6	50
Benzo(k)fluoranthene	1.5	577	616	93	500	614	81	20-130	14	50
Benzo(a)pyrene	1.3	656	616	106	608	614	99	20-130	7	50
Indeno(1,2,3-cd)pyrene	0.91	682	616	111	662	614	108	20-130	3	50
Dibenz(a,h)anthracene	0.30	652	616	106	636	614	104	20-130	2	50
Benzo(g,h,i)perylene	0.84	577	616	94	539	614	88	20-130	7	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/07/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T1-M-ES-WB-comp-5  
**Lab Code:** K2503388-016  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507988

Analyte Name	Sample Result	LDW-T1-M-ES-WB-comp-5MS KWG0507988-3 Matrix Spike			LDW-T1-M-ES-WB-comp-5DMS KWG0507988-4 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Naphthalene	5.2	209	277	74	208	277	73	20-130	1	50
2-Methylnaphthalene	2.8	228	277	82	231	277	83	20-130	1	50
Acenaphthylene	1.4	259	277	93	262	277	94	20-130	1	50
Acenaphthene	4.5	238	277	84	242	277	86	20-130	1	50
Dibenzofuran	2.6	258	277	92	260	277	93	20-130	1	50
Fluorene	2.1	267	277	96	275	277	99	20-130	3	50
Phenanthrene	11	260	277	90	266	277	92	20-130	2	50
Anthracene	ND	278	277	101	282	277	102	20-130	1	50
Fluoranthene	5.9	281	277	99	288	277	102	20-130	3	50
Pyrene	ND	249	277	90	251	277	91	20-130	1	50
Benz(a)anthracene	ND	295	277	107	304	277	110	20-130	3	50
Chrysene	ND	275	277	99	280	277	101	20-130	2	50
Benzo(b)fluoranthene	ND	280	277	101	297	277	107	20-130	6	50
Benzo(k)fluoranthene	ND	260	277	94	272	277	98	20-130	4	50
Benzo(a)pyrene	ND	295	277	107	305	277	110	20-130	3	50
Indeno(1,2,3-cd)pyrene	1.7	306	277	110	316	277	114	20-130	3	50
Dibenz(a,h)anthracene	ND	292	277	106	303	277	110	20-130	4	50
Benzo(g,h,i)perylene	1.0	257	277	93	264	277	95	20-130	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.



COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005

**Matrix Spike/Duplicate Matrix Spike Summary**  
**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507988

Analyte Name	Sample Result	LDW-T4-M-ES-WB-comp-2MS KWG0507988-5 Matrix Spike			LDW-T4-M-ES-WB-comp-2DMS KWG0507988-6 Duplicate Matrix Spike			%Rec Limits	RPD	RPD Limit
		Result	Expected	%Rec	Result	Expected	%Rec			
Naphthalene	5.6	222	355	61	286	356	79	20-130	25	50
2-Methylnaphthalene	2.1	253	355	71	316	356	88	20-130	22	50
Acenaphthylene	0.94	305	355	86	346	356	97	20-130	13	50
Acenaphthene	7.5	281	355	77	327	356	90	20-130	15	50
Dibenzofuran	3.7	315	355	88	337	356	94	20-130	7	50
Fluorene	2.6	330	355	92	347	356	97	20-130	5	50
Phenanthrene	3.8	303	355	84	330	356	92	20-130	8	50
Anthracene	2.0	335	355	94	363	356	101	20-130	8	50
Fluoranthene	ND	342	355	96	366	356	103	20-130	7	50
Pyrene	ND	297	355	84	326	356	92	20-130	9	50
Benz(a)anthracene	2.8	355	355	99	367	356	102	20-130	3	50
Chrysene	3.7	331	355	92	339	356	94	20-130	2	50
Benzo(b)fluoranthene	ND	346	355	97	325	356	91	20-130	6	50
Benzo(k)fluoranthene	ND	335	355	94	350	356	98	20-130	4	50
Benzo(a)pyrene	ND	367	355	103	379	356	107	20-130	3	50
Indeno(1,2,3-cd)pyrene	ND	377	355	106	395	356	111	20-130	5	50
Dibenz(a,h)anthracene	ND	374	355	105	401	356	113	20-130	7	50
Benzo(g,h,i)perylene	ND	321	355	90	336	356	94	20-130	5	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005

**Duplicate Sample Summary  
 Polynuclear Aromatic Hydrocarbons**

**Sample Name:** LDW-T4-M-ES-WB-comp-2  
**Lab Code:** K2503388-020  
**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507988

Analyte Name	MRL	MDL	Sample Result	LDW-T4-M-ES-WB-comp-2DUP KWG0507988-10 Duplicate Sample		Relative Percent Difference	RPD Limit
				Result	Average		
Naphthalene	1.5	0.27	5.6	5.7	5.7	2	50
2-Methylnaphthalene	1.5	0.22	2.1	2.3	2.2	13 #	50
Acenaphthylene	0.72	0.14	0.94	1.0	0.98	10 #	50
Acenaphthene	0.72	0.13	7.5	8.4	7.9	11	50
Dibenzofuran	0.72	0.11	3.7	3.9	3.8	6	50
Fluorene	0.72	0.13	2.6	2.7	2.7	3	50
Phenanthrene	0.72	0.26	3.8	3.6	3.7	7	50
Anthracene	0.72	0.12	2.0	1.6	1.8	26	50
Fluoranthene	0.72	0.52	ND	3.9	NC	NC	50
Pyrene	0.72	0.40	ND	1.7	NC	NC	50
Benz(a)anthracene	0.72	0.18	2.8	ND	NC	NC	50
Chrysene	0.72	0.27	3.7	2.8	3.3	25	50
Benzo(b)fluoranthene	0.72	0.22	ND	ND	ND	-	50
Benzo(k)fluoranthene	0.72	0.19	ND	ND	ND	-	50
Benzo(a)pyrene	0.72	0.18	ND	ND	ND	-	50
Indeno(1,2,3-cd)pyrene	0.72	0.23	ND	0.54	NC	NC	50
Dibenz(a,h)anthracene	0.72	0.16	ND	ND	ND	-	50
Benzo(g,h,i)perylene	0.72	0.25	ND	0.44	NC	NC	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Results flagged with a pound (#) indicate the control criteria is not applicable.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005

**Lab Control Spike/Duplicate Lab Control Spike Summary  
 Polynuclear Aromatic Hydrocarbons**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Units:** ug/Kg  
**Basis:** Wet  
**Level:** Low  
**Extraction Lot:** KWG0507988

Analyte Name	Lab Control Sample KWG0507988-7 Lab Control Spike			Duplicate Lab Control Sample KWG0507988-8 Duplicate Lab Control Spike			%Rec Limits	RPD	RPD Limit
	Result	Expected	%Rec	Result	Expected	%Rec			
Naphthalene	226	250	90	216	250	87	20-130	4	50
2-Methylnaphthalene	236	250	94	224	250	90	20-130	5	50
Acenaphthylene	247	250	99	239	250	95	20-130	3	50
Acenaphthene	233	250	93	223	250	89	20-130	4	50
Dibenzofuran	234	250	94	223	250	89	20-130	5	50
Fluorene	245	250	98	234	250	93	20-130	5	50
Phenanthrene	232	250	93	226	250	90	20-130	3	50
Anthracene	256	250	102	247	250	99	20-130	3	50
Fluoranthene	265	250	106	261	250	104	20-130	2	50
Pyrene	250	250	100	247	250	99	20-130	1	50
Benz(a)anthracene	274	250	110	267	250	107	20-130	2	50
Chrysene	263	250	105	256	250	102	20-130	3	50
Benzo(b)fluoranthene	286	250	114	281	250	112	20-130	2	50
Benzo(k)fluoranthene	280	250	112	272	250	109	20-130	3	50
Benzo(a)pyrene	302	250	121	295	250	118	20-130	2	50
Indeno(1,2,3-cd)pyrene	312	250	125	302	250	121	20-130	3	50
Dibenz(a,h)anthracene	302	250	121	298	250	119	20-130	1	50
Benzo(g,h,i)perylene	281	250	112	272	250	109	20-130	3	50

Results flagged with an asterisk (\*) indicate values outside control criteria.

Percent recoveries and relative percent differences (RPD) are determined by the software using values in the calculation which have not been rounded.

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**SRM Matrix:** Tissue

**Service Request:** K2503388  
**Date Collected:** NA  
**Date Received:** NA  
**Date Extracted:** 5/19/2005  
**Date Analyzed:** 6/7/2005

Standard Reference Material  
 Polynuclear Aromatic Hydrocarbons

**Sample Name:** Standard Reference Material  
**Lab Code:** KWG0507988-11  
**Test Notes:**

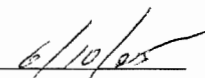
**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	True Value	Result	CAS Advisory Limits	Result Notes
Phenanthrene	EPA 3541	SIM	2.5	1.7	1.1-5.6	
Fluoranthene	EPA 3541	SIM	19	13	8.8-39	
Pyrene	EPA 3541	SIM	18	12	8.3-36	
Benz(a)anthracene	EPA 3541	SIM	3.7	3.3	1.6-8.5	
Chrysene	EPA 3541	SIM	11	7.1	4.9-23	
Benzo(b)fluoranthene	EPA 3541	SIM	5.3	4.1	2.4-11	
Benzo(k)fluoranthene	EPA 3541	SIM	4.6	2.8	2.2-9.9	
Benzo(a)pyrene	EPA 3541	SIM	1.8	1.7	0.85-3.7	
Indeno(1,2,3-cd)pyrene	EPA 3541	SIM	1.6	1.6	0.65-3.9	
Benzo(g,h,i)perylene	EPA 3541	SIM	2.5	2.2	1.1-5.5	

Approved By: \_\_\_\_\_



Date: \_\_\_\_\_



**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/07/2005  
**Time Analyzed:** 20:15

**Method Blank Summary**  
**Polynuclear Aromatic Hydrocarbons**

**Sample Name:** Method Blank **File ID:** J:\MS14\DATA\060705\0607F024.D  
**Lab Code:** KWG0507988-9 **Instrument ID:** MS14  
**Extraction Method:** EPA 3541 **Level:** Low  
**Analysis Method:** 8270C SIM **Extraction Lot:** KWG0507988

This Method Blank applies to the following analyses:

Sample Name	Lab Code	File ID	Date Analyzed	Time Analyzed
Lab Control Sample	KWG0507988-7	J:\MS14\DATA\060605\0606F004.D	06/06/05	11:09
Duplicate Lab Control Sample	KWG0507988-8	J:\MS14\DATA\060605\0606F005.D	06/06/05	11:36
LDW-T1-M-ES-WB-comp-3	K2503388-014	J:\MS14\DATA\060605\0606F006.D	06/06/05	12:04
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	J:\MS14\DATA\060605\0606F007.D	06/06/05	12:31
LDW-T1-M-ES-WB-comp-3DMS	KWG0507988-2	J:\MS14\DATA\060605\0606F008.D	06/06/05	12:59
LDW-T1-M-ES-WB-comp-5	K2503388-016	J:\MS14\DATA\060605\0606F009.D	06/06/05	13:26
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\MS14\DATA\060605\0606F012.D	06/06/05	14:48
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	J:\MS14\DATA\060605\0606F013.D	06/06/05	20:42
LDW-T4-M-ES-WB-comp-2DMS	KWG0507988-6	J:\MS14\DATA\060605\0606F014.D	06/06/05	21:09
LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	J:\MS14\DATA\060605\0606F015.D	06/06/05	21:37
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	J:\MS14\DATA\060705\0607F026.D	06/07/05	21:09
LDW-T1-M-ES-WB-comp-5DMS	KWG0507988-4	J:\MS14\DATA\060705\0607F027.D	06/07/05	21:37

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388

**Lab Control Sample/Duplicate Lab Control Sample Summary  
 Polynuclear Aromatic Hydrocarbons**

**Sample Name:** Lab Control Sample  
**Lab Code:** KWG0507988-7  
**File ID:** J:\MS14\DATA\060605\0606F004.D  
**Instrument ID:** MS14  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005  
**Time Analyzed:** 11:09

**Sample Name:** Duplicate Lab Control Sample  
**Lab Code:** KWG0507988-8  
**File ID:** J:\MS14\DATA\060605\0606F005.D  
**Instrument ID:** MS14  
**Date Extracted:** 05/19/2005  
**Date Analyzed:** 06/06/2005  
**Time Analyzed:** 11:36

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Level:** Low  
**Extraction Lot:** KWG0507988

These Lab Control Samples apply to the following analyses:

<b>Sample Name</b>	<b>Lab Code</b>	<b>File ID</b>	<b>Date Analyzed</b>	<b>Time Analyzed</b>
LDW-T1-M-ES-WB-comp-3	K2503388-014	J:\MS14\DATA\060605\0606F006.D	06/06/05	12:04
LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	J:\MS14\DATA\060605\0606F007.D	06/06/05	12:31
LDW-T1-M-ES-WB-comp-3DMS	KWG0507988-2	J:\MS14\DATA\060605\0606F008.D	06/06/05	12:59
LDW-T1-M-ES-WB-comp-5	K2503388-016	J:\MS14\DATA\060605\0606F009.D	06/06/05	13:26
LDW-T4-M-ES-WB-comp-2	K2503388-020	J:\MS14\DATA\060605\0606F012.D	06/06/05	14:48
LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	J:\MS14\DATA\060605\0606F013.D	06/06/05	20:42
LDW-T4-M-ES-WB-comp-2DMS	KWG0507988-6	J:\MS14\DATA\060605\0606F014.D	06/06/05	21:09
LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	J:\MS14\DATA\060605\0606F015.D	06/06/05	21:37
Method Blank	KWG0507988-9	J:\MS14\DATA\060705\0607F024.D	06/07/05	20:15
LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	J:\MS14\DATA\060705\0607F026.D	06/07/05	21:09
LDW-T1-M-ES-WB-comp-5DMS	KWG0507988-4	J:\MS14\DATA\060705\0607F027.D	06/07/05	21:37

## COLUMBIA ANALYTICAL SERVICES, INC.

QA/QC Results

Client: Windward Environmental  
 Project: LDW/04-08-06-22

Service Request: K2503388

Analysis Run Log  
 Polynuclear Aromatic Hydrocarbons

Analysis Method: 8270C SIM

Analysis Lot: KWG0509153  
 Instrument ID: MS14

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0606F001.D	GC/MS Tuning - Decafluorotripheny	KWG0509153-1	6/6/2005	09:53		6/6/2005	10:08
0606F002.D	Continuing Calibration Verification	KWG0509153-2	6/6/2005	10:13		6/6/2005	10:33
0606F003.D	ZZZZZZ	ZZZZZZ	6/6/2005	10:41		6/6/2005	11:01
0606F004.D	Lab Control Sample	KWG0507988-7	6/6/2005	11:09		6/6/2005	11:29
0606F005.D	Duplicate Lab Control Sample	KWG0507988-8	6/6/2005	11:36		6/6/2005	11:56
0606F006.D	LDW-T1-M-ES-WB-comp-3	K2503388-014	6/6/2005	12:04		6/6/2005	12:24
0606F007.D	LDW-T1-M-ES-WB-comp-3MS	KWG0507988-1	6/6/2005	12:31		6/6/2005	12:51
0606F008.D	LDW-T1-M-ES-WB-comp-3DMS	KWG0507988-2	6/6/2005	12:59		6/6/2005	13:19
0606F009.D	LDW-T1-M-ES-WB-comp-5	K2503388-016	6/6/2005	13:26		6/6/2005	13:46
0606F010.D	ZZZZZZ	ZZZZZZ	6/6/2005	13:53		6/6/2005	14:13
0606F011.D	ZZZZZZ	ZZZZZZ	6/6/2005	14:21		6/6/2005	14:41
0606F012.D	LDW-T4-M-ES-WB-comp-2	K2503388-020	6/6/2005	14:48		6/6/2005	15:08
0606F016.D	ZZZZZZ	ZZZZZZ	6/6/2005	15:15		6/6/2005	15:35
0606F017.D	ZZZZZZ	ZZZZZZ	6/6/2005	15:42		6/6/2005	16:02
0606F030.D	ZZZZZZ	ZZZZZZ	6/6/2005	16:09		6/6/2005	16:29
0606F031.D	ZZZZZZ	ZZZZZZ	6/6/2005	16:36		6/6/2005	16:56
0606F018.D	ZZZZZZ	ZZZZZZ	6/6/2005	17:04		6/6/2005	17:24
0606F019.D	ZZZZZZ	ZZZZZZ	6/6/2005	17:31		6/6/2005	17:51
0606F020.D	ZZZZZZ	ZZZZZZ	6/6/2005	17:58		6/6/2005	18:18
0606F021.D	ZZZZZZ	ZZZZZZ	6/6/2005	18:26		6/6/2005	18:46
0606F022.D	ZZZZZZ	ZZZZZZ	6/6/2005	18:53		6/6/2005	19:13
0606F023.D	ZZZZZZ	ZZZZZZ	6/6/2005	19:20		6/6/2005	19:40
0606F024.D	ZZZZZZ	ZZZZZZ	6/6/2005	19:48		6/6/2005	20:08
0606F025.D	ZZZZZZ	ZZZZZZ	6/6/2005	20:15		6/6/2005	20:35
0606F013.D	LDW-T4-M-ES-WB-comp-2MS	KWG0507988-5	6/6/2005	20:42		6/6/2005	21:03
0606F014.D	LDW-T4-M-ES-WB-comp-2DMS	KWG0507988-6	6/6/2005	21:09		6/6/2005	21:30
0606F015.D	LDW-T4-M-ES-WB-comp-2DUP	KWG0507988-10	6/6/2005	21:37		6/6/2005	21:57

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22

**Service Request:** K2503388

**Analysis Run Log  
 Polynuclear Aromatic Hydrocarbons**

**Analysis Method:** 8270C SIM

**Analysis Lot:** KWG0509208  
**Instrument ID:** MS14

File ID	Sample Name	Lab Code	Date Analysis Started	Start Time	Q	Date Analysis Finished	Finish Time
0607F001.D	GC/MS Tuning - Decafluorotripheny	KWG0509208-1	6/7/2005	09:45		6/7/2005	10:00
0607F002.D	Continuing Calibration Verification	KWG0509208-2	6/7/2005	10:05		6/7/2005	10:25
0607F009.D	ZZZZZZ	ZZZZZZ	6/7/2005	13:26		6/7/2005	13:46
0607F010.D	ZZZZZZ	ZZZZZZ	6/7/2005	13:54		6/7/2005	14:14
0607F011.D	ZZZZZZ	ZZZZZZ	6/7/2005	14:21		6/7/2005	14:41
0607F012.D	ZZZZZZ	ZZZZZZ	6/7/2005	14:48		6/7/2005	15:09
0607F013.D	ZZZZZZ	ZZZZZZ	6/7/2005	15:15		6/7/2005	15:35
0607F024.D	Method Blank	KWG0507988-9	6/7/2005	20:15		6/7/2005	20:35
0607F025.D	ZZZZZZ	ZZZZZZ	6/7/2005	20:42		6/7/2005	21:02
0607F026.D	LDW-T1-M-ES-WB-comp-5MS	KWG0507988-3	6/7/2005	21:09		6/7/2005	21:29
0607F027.D	LDW-T1-M-ES-WB-comp-5DMS	KWG0507988-4	6/7/2005	21:37		6/7/2005	21:57

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis



**COLUMBIA ANALYTICAL SERVICES, INC.**

QA/QC Results

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2503388  
**Date Extracted:** 05/19/2005

**Extraction Prep Log  
 Polynuclear Aromatic Hydrocarbons**

**Extraction Method:** EPA 3541  
**Analysis Method:** 8270C SIM

**Extraction Lot:** KWG0507988  
**Level:** Low

Sample Name	Lab Code	Date Collected	Date Received	Sample Amount	Final Volume	% Solids	Note
LDW-T1-M-ES-WB-comp-3	K2503388-014	08/02/04	12/01/04	4.08g	1ml	NA	
LDW-T1-M-ES-WB-comp-5	K2503388-016	08/02/04	12/01/04	9.09g	1ml	NA	
LDW-T4-M-ES-WB-comp-2	K2503388-020	08/30/04	12/01/04	7.04g	1ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0507988-10	08/30/04	12/01/04	7.04g	1ml	NA	
Method Blank	KWG0507988-9	NA	NA	9.09g	1ml	NA	
LDW-T1-M-ES-WB-comp-3	KWG0507988-1	08/02/04	12/01/04	4.06g	1ml	NA	
LDW-T1-M-ES-WB-comp-3D	KWG0507988-2	08/02/04	12/01/04	4.07g	1ml	NA	
LDW-T1-M-ES-WB-comp-5	KWG0507988-3	08/02/04	12/01/04	9.04g	1ml	NA	
LDW-T1-M-ES-WB-comp-5D	KWG0507988-4	08/02/04	12/01/04	9.04g	1ml	NA	
LDW-T4-M-ES-WB-comp-2	KWG0507988-5	08/30/04	12/01/04	7.04g	1ml	NA	
LDW-T4-M-ES-WB-comp-2D	KWG0507988-6	08/30/04	12/01/04	7.03g	1ml	NA	
Lab Control Sample	KWG0507988-7	NA	NA	10.00g	1ml	NA	
Duplicate Lab Control Sample	KWG0507988-8	NA	NA	10.00g	1ml	NA	

Results flagged with an asterisk (\*) indicate the holding time was exceeded for the analysis

**DDT**

---

**COLUMBIA ANALYTICAL SERVICES, INC.**

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/3/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T2-E-SS-WB-comp-1  
**Lab Code:** K2409451-011  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	33	*
2,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*
4,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	16	*
2,4-DDT	EPA 3540C	CAS SOP	11.7	1	12/9/04	6/21/05	ND	i,*
4,4-DDT	EPA 3540C	CAS SOP	12.6	1	12/9/04	6/21/05	ND	i,*
Lindane	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/2/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T3-D-SS-WB-comp-1  
**Lab Code:** K2409451-016  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	21	1	12/9/04	6/21/05	ND	i,*
2,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*
4,4-DDD	EPA 3540C	CAS SOP	18	1	12/9/04	6/21/05	ND	i,*
2,4-DDT	EPA 3540C	CAS SOP	22	1	12/9/04	6/21/05	ND	i,*
4,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/9/04	6/21/05	ND	*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/3/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T3-E-SS-WB-comp-1  
**Lab Code:** K2409451-017  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	24	*
2,4-DDD	EPA 3540C	CAS SOP	9.1	1	12/10/04	6/21/05	ND	i,*
4,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	8.4	*
2,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	ND	*
4,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	ND	*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/4/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T3-F-SS-WB-comp-1  
**Lab Code:** K2409451-018  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	31	*
2,4-DDD	EPA 3540C	CAS SOP	9.1	1	12/10/04	6/21/05	ND	i,*
4,4-DDD	EPA 3540C	CAS SOP	14	1	12/10/04	6/21/05	ND	i,*
2,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/10/04	6/21/05	ND	*
4,4-DDT	EPA 3540C	CAS SOP	8.7	1	12/10/04	6/21/05	ND	i,*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/3/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T2-M-ES-WB-comp-3  
**Lab Code:** K2409451-034  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	5	1	12/15/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	5	1	12/15/04	6/21/05	50	*
2,4-DDD	EPA 3540C	CAS SOP	5	1	12/15/04	6/21/05	ND	*
4,4-DDD	EPA 3540C	CAS SOP	5	1	12/15/04	6/21/05	45	*
2,4-DDT	EPA 3540C	CAS SOP	5	1	12/15/04	6/21/05	ND	*
4,4-DDT	EPA 3540C	CAS SOP	12	1	12/15/04	6/21/05	ND	i,*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

**Client:** Windward Environmental  
**Project:** LDW/04-08-06-22  
**Sample Matrix:** Tissue

**Service Request:** K2409451  
**Date Collected:** 8/31/04  
**Date Received:** 12/1/04

Pesticide Confirmation by GC/MS

**Sample Name:** LDW-T4-M-DC-HP-comp-1  
**Lab Code:** K2409451-053  
**Test Notes:**

**Units:** ug/Kg (ppb)  
**Basis:** Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/15/04	6/21/05	ND	i,*
4,4-DDE	EPA 3540C	CAS SOP	3500	1	12/15/04	6/21/05	ND	i,*
2,4-DDD	EPA 3540C	CAS SOP	110	1	12/15/04	6/21/05	ND	i,*
4,4-DDD	EPA 3540C	CAS SOP	28	1	12/15/04	6/21/05	ND	i,*
2,4-DDT	EPA 3540C	CAS SOP	95	1	12/15/04	6/21/05	ND	i,*
4,4-DDT	EPA 3540C	CAS SOP	11	1	12/15/04	6/21/05	ND	i,*

Approved By: \_\_\_\_\_ Date: \_\_\_\_\_



COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

Client: Windward Environmental  
Project: 04-08-06-22  
Sample Matrix: Tissue

Service Request: K2409809  
Date Collected: 8/30/04  
Date Received: 12/9/04

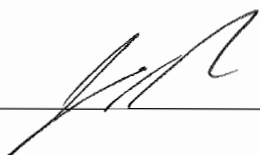
Pesticide Confirmation by GC/MS

Sample Name: LDW-T1-M-DC-HP-comp-1  
Lab Code: K2409809-027  
Test Notes:

Units: ug/Kg (ppb)  
Basis: Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	83	*
2,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	11	*
2,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*

Approved By: \_\_\_\_\_



Date: \_\_\_\_\_

6/23/05

COLUMBIA ANALYTICAL SERVICES, INC.

Analytical Report

Client: Windward Environmental  
Project: 04-08-06-22  
Sample Matrix: Tissue

Service Request: K2409809  
Date Collected: 8/3/04  
Date Received: 12/9/04

Pesticide Confirmation by GC/MS

Sample Name: LDW-T3-M-DC-HP-comp-1  
Lab Code: K2409809-031  
Test Notes:

Units: ug/Kg (ppb)  
Basis: Wet

Analyte	Prep Method	Analysis Method	MRL	Dilution Factor	Date Extracted	Date Analyzed	Result	Result Notes
2,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDE	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	62	*
2,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDD	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	14	*
2,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*
4,4-DDT	EPA 3540C	CAS SOP	7.1	1	12/20/04	6/21/05	ND	*

Approved By: \_\_\_\_\_



Date: \_\_\_\_\_

6/23/05