

CHAIN OF CUSTODY

Combination Prices only apply if Combo request is circled on COC.

LABMARK		NATA 13542, AQIS N0356		Client Details		Safety Precaution: laboratory sample bottles may contain preservation acid / chemicals; refer to SAFETY label on bottle.	
Dispatch samples to: Unit1/ 8 Leighton Place Asquith NSW 2077 or 116 Moray Street South Melbourne VIC 3205		Tel (SYD): 612-9476-6533 Fax (SYD): 612-9476-8219 Tel (MEL): 613-9686-8344 Fax (MEL): 613-9686-7344 (DB): 0409449684, (PW): 0439390209 ros.schacht@labmark.com.au paul.woodward@labmark.com.au		Company & Address: <u>DLA</u>		Tel: <u>94761765</u>	
		Project Manager: <u>JAY COBURN</u>		Sampler:		Fx:	
		Project Name: <u>LOFFS - PHASE 2</u>		Date Required: <u>29.5.09 @ 12pm</u>			
		Project Type (eg. Service Station):		Project No: <u>DL800</u>		Lab. Quote No: <u>Q0675.ES</u>	

Global Specifications I require (default is Not required if Not ticked):

1. Urgent TAT required? (please circle: 1 day 2 days 3 days days)
2. Do you require sediment present in waters to be included in organic/ inorganic extractions?
3. Do you require additional QA/QC reported where sample batches submitted are < 10 samples? (Fee Applies)
4. Do you require additional EQA or batch specific LCS/ MB results every 20 samples? (Fee Applies)
5. Do you require DIFFERENT standard EQL's from those stated in the current LabMark price catalogue?
6. Do you wish chromatograms to be supplied? (Additional fee applies).
7. Electronic data transfer (circle: fax .xls .csv .pdf). Please specify.

Note1: Additional water sample must be submitted for lab. duplicate & spike analysis.

Note2: Contact lab if consolidating multiple analyses into a single sample container.

Lab. Number	Sample ID	Sample Depth	Sampling Date	Matrix				Container Type (Nat. = unpreserved, G=glass, P=plastic)										Analysis Request																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																													
				soil	water	air	filters	other	Soil (G) Nat. Orange	0.5-1L (G) Nat. Orange	43ml VOA (G) Nat. Orange	43ml VOA (G) HCl Maroon	0.1-1L (P) H2SO4 Purple	0.1-1L (G) H2SO4 Purple	0.1-1L (P) Nat. Green	0.1-0.2L (P) HNO3 Red Filtered YES/ NO	0.1-1L (P) NaOH, COIN03 Blue	Other	Combo (circle) <1> <2> <3> <4> <5> <6> <7> <8> <9> <10> <11> <12> <13> <14>	BTEX+vTPH (G-9) PT-GCMS	VHC PT-GCMS	THM PT-GCMS	MTBE PT-GCMS	VAC PT-GCMS	VOC PT-GCMS	TPH (G-38) GC/FID	PAH's GCMS	Phenols GCMS	Aromatic/Aliphatic TPH GC/FID	(circle) OC, OP, PCB GC/ED/FPD	SVOC GCMS	Phenoxy Acid Herbicides GCMS	Explosives HPLC	(circle) Metals* (dissolved / total)	TCLP (specify test - other)	ZHE TCLP (specify test - other)	(circle) pH, EC	(circle) NH ₃ , TKN, N _{org} , TN	(circle) NO ₂ , NO ₃ , NO ₂ ⁻	(circle) TP, ortho-P, TKP	(circle) Cl ⁻ , F ⁻ , SO ₄ ²⁻ (circle) soluble/total	(circle) Total Alk, Speciated Alk	(circle) Free CN, WAD, Total CN	Total Phenolics	Cations (circle) sol/total - Ca, Mg, Na, K																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																		
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*Metals (circle): As, Cd, Cr, Cu, Ni, Pb, Zn, Hg, Cr⁶⁺, Cr³⁺, Fe²⁺, Fe³⁺, Be, B, Al, V, Mn, Fe, Co, Se, Sr, Sn, Mo, Ag, Ba, Tl, Bi, Sb

Comments (Highly contaminated samples):

Lab Report No.

E042911

Security Seal Applied

Security Seal Serial #

YES/NO

Relinquished by (print): Darwin BullerSigned: D. BullerDate: 25.5.09Received By: [Signature]Date: 25/5/09 Time: 1410

Relinquished by (print):

Signed:

Date:

Received By:

Date: Time:

CHAIN OF CUSTODY

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LABMARK		NATA 13542, AQIS N0356		Client Details		Safety Precaution: laboratory sample bottles may contain preservation acid / chemicals refer to SAFETY label on bottle.	
Dispatch samples to: Unit1/ 8 Leighton Place Asquith NSW 2077 or 116 Moray Street South Melbourne VIC 3205		Tel (SYD): 612-9476-6533 Fax (SYD): 612-9476-8219 Tel (MEL): 613-9686-8344 Fax (MEL): 613-9686-7344 (DB): 0409449684, (PW): 0439390209 ros.schacht@labmark.com.au paul.woodward@labmark.com.au		Company & Address: <u>DLA</u>		Tel: <u>94761765</u>	
		Project Manager: <u>JAY COBURN</u>		Sampler: _____		Fx: _____	
		Project Name: <u>COFFS - PHASE 2</u>		Date Required: <u>29.5.09 @ 12pm</u>			
		Project Type (eg. Service Station): _____		Project No: <u>DL800</u>		Lab. Quote No: <u>Q0675.ES</u>	

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2. Do you require sediment present in waters to be included in organic/ inorganic extractions?
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Note1: Additional water sample must be submitted for lab. duplicate & spike analysis.

Note2: Contact lab if consolidating multiple analyses into a single sample container.

Lab. Number	Sample ID	Sample Depth	Sampling Date	Matrix				Container Type (Nat. = unpreserved, G=glass, P=plastic)										Other	Combo (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	BTEX+vTPH (C6-9) (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	VHC PT-GC/MS	THM PT-GC/MS	MTBE PT-GC/MS	VAC PT-GC/MS	VOC PT-GC/MS	TPH (C10-36) GC/ED (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	PAH's GC/MS	Phenols GC/MS	Aromatic/Aliphatic (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	SVOC GC/MS	Phenoxy Acid H (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	Explosives HPLC (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	Metals* (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	TCPLP (specify test) (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	ZHE TCPLP (specify test) (circle) <1>X> <10> <9> <8> <7> <6> <5> <4> <3> <2> <1>	(circle) pH, EC	(circle) NH ₃ , TKN, N	(circle) NO ₂ , NO ₃ , N	(circle) TP, ortho-P _i	(circle) Cl ⁻ , F ⁻ , SO ₄ ²⁻	(circle) Total Alk, Sp	(circle) Free CN, W/V	Total Phenolics	Cations (circle) Sol/H																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																																
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Be, B, Al, V, Mn, Fe, Co, Se, Sr, Sn, Mo, Ag, Ba, Ti, Bi, Sb

Comments (Highly contaminated samples):

Lab Report No.

E042911

Security Seal Applied

Security Seal Serial #

YES/NO

Relinquished by (print): Damea B. B. B.Signed: D. B. B.Date: 25-5-09Received By: [Signature]Date: 25/5/09 Time: 1410

Relinquished by (print):

Signed:

Date:

Received By:

Date: Time:

[illegible]



EnviroLab Services Pty Ltd
ABN 37 112 535 645
12 Ashley St Chatswood NSW 2067
ph 02 9910 6200 fax 02 9910 6201
enquiries@envirolabservices.com.au
www.envirolabservices.com.au

CERTIFICATE OF ANALYSIS 29217

Client:

David Lane Associates
2B, 30 Leighton Pl
Hornsby
NSW 2077

Attention: Jay Coburn

Sample log in details:

Your Reference:	<u>DL1800, Coffs Phase 2</u>
No. of samples:	3 Soils
Date samples received:	27/05/09
Date completed instructions received:	27/05/09

Analysis Details:

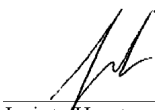
Please refer to the following pages for results, methodology summary and quality control data.
Samples were analysed as received from the client. Results relate specifically to the samples as received.
Results are reported on a dry weight basis for solids and on an as received basis for other matrices.
Please refer to the last page of this report for any comments relating to the results.

Report Details:

Date results requested by:	29/05/09
Date of Preliminary Report:	Not Issued
Issue Date:	29/05/09

NATA accreditation number 2901. This document shall not be reproduced except in full.
This document is issued in accordance with NATA's accreditation requirements.
Accredited for compliance with ISO/IEC 17025.
Tests not covered by NATA are denoted with *.

Results Approved By:


Jacinta Hurst
Operations Manager

EnviroLab Reference: 29217
Revision No: R 00



vTPH & BTEX in Soil				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	29/05/2009	29/05/2009	29/05/2009
vTPH C ₆ - C ₉	mg/kg	<25	<25	<25
Benzene	mg/kg	<0.5	<0.5	<0.5
Toluene	mg/kg	<0.5	<0.5	<0.5
Ethylbenzene	mg/kg	<1.0	<1.0	<1.0
m+p-xylene	mg/kg	<2.0	<2.0	<2.0
o-Xylene	mg/kg	<1.0	<1.0	<1.0
Surrogate aaa-Trifluorotoluene	%	112	115	112

sTPH in Soil (C10-C36)				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
TPH C ₁₀ - C ₁₄	mg/kg	<50	<50	<50
TPH C ₁₅ - C ₂₈	mg/kg	<100	<100	<100
TPH C ₂₉ - C ₃₆	mg/kg	<100	<100	<100
Surrogate o-Terphenyl	%	91	97	93

PAHs in Soil Our Reference: Your Reference Date Sampled Type of sample	UNITS ----- -----	29217-1 C-11-1B 19/05/2009 Soil	29217-2 C-48-1B 20/05/2009 Soil	29217-3 C-55-1B 20/05/2009 Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
Naphthalene	mg/kg	<0.1	<0.1	<0.1
Acenaphthylene	mg/kg	<0.1	<0.1	<0.1
Acenaphthene	mg/kg	<0.1	<0.1	<0.1
Fluorene	mg/kg	<0.1	<0.1	<0.1
Phenanthrene	mg/kg	<0.1	<0.1	<0.1
Anthracene	mg/kg	<0.1	<0.1	<0.1
Fluoranthene	mg/kg	<0.1	<0.1	<0.1
Pyrene	mg/kg	<0.1	<0.1	<0.1
Benzo(a)anthracene	mg/kg	<0.1	<0.1	<0.1
Chrysene	mg/kg	<0.1	<0.1	<0.1
Benzo(b+k)fluoranthene	mg/kg	<0.2	<0.2	<0.2
Benzo(a)pyrene	mg/kg	<0.05	<0.05	<0.05
Indeno(1,2,3-c,d)pyrene	mg/kg	<0.1	<0.1	<0.1
Dibenzo(a,h)anthracene	mg/kg	<0.1	<0.1	<0.1
Benzo(g,h,i)perylene	mg/kg	<0.1	<0.1	<0.1
Surrogate p- Terphenyl-d ₁₄	%	115	116	97

Organochlorine Pesticides in soil				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
HCB	mg/kg	<0.1	<0.1	<0.1
alpha-BHC	mg/kg	<0.1	<0.1	<0.1
gamma-BHC	mg/kg	<0.1	<0.1	<0.1
beta-BHC	mg/kg	<0.1	<0.1	<0.1
Heptachlor	mg/kg	<0.1	<0.1	<0.1
delta-BHC	mg/kg	<0.1	<0.1	<0.1
Aldrin	mg/kg	<0.1	<0.1	<0.1
Heptachlor Epoxide	mg/kg	<0.1	<0.1	<0.1
gamma-Chlordane	mg/kg	<0.1	<0.1	<0.1
alpha-chlordane	mg/kg	<0.1	<0.1	<0.1
Endosulfan I	mg/kg	<0.1	<0.1	<0.1
pp-DDE	mg/kg	<0.1	<0.1	<0.1
Dieldrin	mg/kg	<0.1	<0.1	<0.1
Endrin	mg/kg	<0.1	<0.1	<0.1
pp-DDD	mg/kg	<0.1	<0.1	<0.1
Endosulfan II	mg/kg	<0.1	<0.1	<0.1
pp-DDT	mg/kg	<0.1	<0.1	<0.1
Endrin Aldehyde	mg/kg	<0.1	<0.1	<0.1
Endosulfan Sulphate	mg/kg	<0.1	<0.1	<0.1
Methoxychlor	mg/kg	<0.1	<0.1	<0.1
Surrogate TCLMX	%	74	72	75

Organophosphorus Pesticides				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
Diazinon	mg/kg	<0.1	<0.1	<0.1
Dimethoate	mg/kg	<0.1	<0.1	<0.1
Chlorpyrifos-methyl	mg/kg	<0.1	<0.1	<0.1
Ronnel	mg/kg	<0.1	<0.1	<0.1
Chlorpyrifos	mg/kg	<0.1	<0.1	<0.1
Fenitrothion	mg/kg	<0.1	<0.1	<0.1
Bromophos-ethyl	mg/kg	<0.1	<0.1	<0.1
Ethion	mg/kg	<0.1	<0.1	<0.1
Surrogate TCLMX	%	74	72	75

PCBs in Soil Our Reference: Your Reference Date Sampled Type of sample	UNITS ----- -----	29217-1 C-11-1B 19/05/2009 Soil	29217-2 C-48-1B 20/05/2009 Soil	29217-3 C-55-1B 20/05/2009 Soil
Date extracted	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
Arochlor 1016	mg/kg	<0.1	<0.1	<0.1
Arochlor 1232	mg/kg	<0.1	<0.1	<0.1
Arochlor 1242	mg/kg	<0.1	<0.1	<0.1
Arochlor 1248	mg/kg	<0.1	<0.1	<0.1
Arochlor 1254	mg/kg	<0.1	<0.1	<0.1
Arochlor 1260	mg/kg	<0.1	<0.1	<0.1
Surrogate TCLMX	%	74	72	75

Acid Extractable metals in soil				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date digested	-	28/05/2009	28/05/2009	28/05/2009
Date analysed	-	28/05/2009	28/05/2009	28/05/2009
Arsenic	mg/kg	20	11	<4
Cadmium	mg/kg	<0.5	<0.5	<0.5
Chromium	mg/kg	8	6	5
Copper	mg/kg	7	9	6
Lead	mg/kg	22	13	6
Mercury	mg/kg	<0.1	<0.1	<0.1
Nickel	mg/kg	3	3	3
Zinc	mg/kg	46	17	10

Moisture				
Our Reference:	UNITS	29217-1	29217-2	29217-3
Your Reference	-----	C-11-1B	C-48-1B	C-55-1B
Date Sampled	-----	19/05/2009	20/05/2009	20/05/2009
Type of sample		Soil	Soil	Soil
Date prepared	-	28/5/09	28/5/09	28/5/09
Date analysed	-	28/5/09	28/5/09	28/5/09
Moisture	%	19	12	9.4

Method ID	Methodology Summary
GC.16	Soil samples are extracted with methanol and spiked into water prior to analysing by purge and trap GC-MS. Water samples are analysed directly by purge and trap GC-MS.
GC.3	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-FID.
GC.12 subset	Soil samples are extracted with Dichloromethane/Acetone and waters with Dichloromethane and analysed by GC-MS.
GC-5	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
GC.8	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC with dual ECD's.
GC-6	Soil samples are extracted with dichloromethane/acetone and waters with dichloromethane and analysed by GC-ECD.
Metals.20 ICP-AES	Determination of various metals by ICP-AES.
Metals.21 CV-AAS	Determination of Mercury by Cold Vapour AAS.
LAB.8	Moisture content determined by heating at 105 deg C for a minimum of 4 hours.

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
vTPH & BTEX in Soil						Base II Duplicate II %RPD		
Date extracted	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
Date analysed	-			29/05/09	29217-3	29/05/2009 29/05/2009	LCS-1	29/05/09
vTPH C ₆ - C ₉	mg/kg	25	GC.16	<25	29217-3	<25 <25	LCS-1	109%
Benzene	mg/kg	0.5	GC.16	<0.5	29217-3	<0.5 <0.5	LCS-1	109%
Toluene	mg/kg	0.5	GC.16	<0.5	29217-3	<0.5 <0.5	LCS-1	116%
Ethylbenzene	mg/kg	1	GC.16	<1.0	29217-3	<1.0 <1.0	LCS-1	110%
m+p-xylene	mg/kg	2	GC.16	<2.0	29217-3	<2.0 <2.0	LCS-1	105%
o-Xylene	mg/kg	1	GC.16	<1.0	29217-3	<1.0 <1.0	LCS-1	105%
Surrogate aaa-Trifluorotoluene	%		GC.16	118	29217-3	112 113 RPD: 1	LCS-1	118%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
sTPH in Soil (C ₁₀ -C ₃₆)						Base II Duplicate II %RPD		
Date extracted	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
Date analysed	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
TPH C ₁₀ - C ₁₄	mg/kg	50	GC.3	<50	29217-3	<50 <50	LCS-1	93%
TPH C ₁₅ - C ₂₈	mg/kg	100	GC.3	<100	29217-3	<100 <100	LCS-1	101%
TPH C ₂₉ - C ₃₆	mg/kg	100	GC.3	<100	29217-3	<100 <100	LCS-1	94%
Surrogate o-Terphenyl	%		GC.3	92	29217-3	93 93 RPD: 0	LCS-1	92%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
PAHs in Soil						Base II Duplicate II %RPD		
Date extracted	-			28/5/09	29217-3	28/05/2009 28/05/2009	LCS-1	28/5/09
Date analysed	-			28/5/09	29217-3	28/05/2009 28/05/2009	LCS-1	28/5/09
Naphthalene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	123%
Acenaphthylene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Acenaphthene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Fluorene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	102%
Phenanthrene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	110%
Anthracene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Fluoranthene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	103%
Pyrene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	110%

Client Reference: DL1800, Coffs Phase 2

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
PAHs in Soil						Base II Duplicate II %RPD		
Benzo(a)anthracene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Chrysene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	LCS-1	109%
Benzo(b+k)fluoranthene	mg/kg	0.2	GC.12 subset	<0.2	29217-3	<0.2 <0.2	[NR]	[NR]
Benzo(a)pyrene	mg/kg	0.05	GC.12 subset	<0.05	29217-3	<0.05 <0.05	LCS-1	95%
Indeno(1,2,3-c,d)pyrene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Dibenzo(a,h)anthracene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Benzo(g,h,i)perylene	mg/kg	0.1	GC.12 subset	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Surrogate p-Terphenyl-d14	%		GC.12 subset	115	29217-3	97 111 RPD: 13	LCS-1	111%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Organochlorine Pesticides in soil						Base II Duplicate II %RPD		
Date extracted	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
Date analysed	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
HCB	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
alpha-BHC	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	134%
gamma-BHC	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
beta-BHC	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	138%
Heptachlor	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	139%
delta-BHC	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Aldrin	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	80%
Heptachlor Epoxide	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	132%
gamma-Chlordane	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
alpha-chlordane	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Endosulfan I	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
pp-DDE	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	134%
Dieldrin	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	77%
Endrin	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	130%
pp-DDD	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	76%
Endosulfan II	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
pp-DDT	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Endrin Aldehyde	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Endosulfan Sulphate	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	LCS-1	122%
Methoxychlor	mg/kg	0.1	GC-5	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Surrogate TCLMX	%		GC-5	73	29217-3	75 71 RPD: 5	LCS-1	69%

Envirolab Reference: 29217
Revision No: R 00



QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Organophosphorus Pesticides						Base II Duplicate II %RPD		
Date extracted	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
Date analysed	-			28/05/2009	29217-3	28/05/2009 28/05/2009	LCS-1	28/05/2009
Diazinon	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Dimethoate	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Chlorpyrifos-methyl	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Ronnel	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Chlorpyrifos	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	LCS-1	117%
Fenitrothion	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	LCS-1	134%
Bromophos-ethyl	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	[NR]	[NR]
Ethion	mg/kg	0.1	GC.8	<0.1	29217-3	<0.1 <0.1	LCS-1	105%
Surrogate TCLMX	%		GC.8	73	29217-3	75 71 RPD: 5	LCS-1	76%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
PCBs in Soil						Base II Duplicate II %RPD		
Date extracted	-			28/05/2009	[NT]	[NT]	LCS-1	28/05/2009
Date analysed	-			28/05/2009	[NT]	[NT]	LCS-1	28/05/2009
Arochlor 1016	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	[NR]	[NR]
Arochlor 1232	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	[NR]	[NR]
Arochlor 1242	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	[NR]	[NR]
Arochlor 1248	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	[NR]	[NR]
Arochlor 1254	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	LCS-1	91%
Arochlor 1260	mg/kg	0.1	GC-6	<0.1	[NT]	[NT]	[NR]	[NR]
Surrogate TCLMX	%		GC-6	73	[NT]	[NT]	LCS-1	100%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Acid Extractable metals in soil						Base II Duplicate II %RPD		
Date digested	-			28/05/09	29217-3	28/05/2009 28/05/2009	LCS-2	28/05/09
Date analysed	-			28/05/09	29217-3	28/05/2009 28/05/2009	LCS-2	28/05/09
Arsenic	mg/kg	4	Metals.20 ICP-AES	<4	29217-3	<4 <4	LCS-2	99%
Cadmium	mg/kg	0.5	Metals.20 ICP-AES	<0.5	29217-3	<0.5 <0.5	LCS-2	100%
Chromium	mg/kg	1	Metals.20 ICP-AES	<1	29217-3	5 4 RPD: 22	LCS-2	102%
Copper	mg/kg	1	Metals.20 ICP-AES	<1	29217-3	6 6 RPD: 0	LCS-2	99%
Lead	mg/kg	1	Metals.20 ICP-AES	<1	29217-3	6 6 RPD: 0	LCS-2	101%

Client Reference: DL1800, Coffs Phase 2

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate results	Spike Sm#	Spike % Recovery
Acid Extractable metals in soil						Base II Duplicate II %RPD		
Mercury	mg/kg	0.1	Metals.21 CV-AAS	<0.1	29217-3	<0.1 <0.1	LCS-2	105%
Nickel	mg/kg	1	Metals.20 ICP-AES	<1	29217-3	3 3 RPD: 0	LCS-2	103%
Zinc	mg/kg	1	Metals.20 ICP-AES	<1	29217-3	10 10 RPD: 0	LCS-2	102%

QUALITY CONTROL	UNITS	PQL	METHOD	Blank
Moisture				
Date prepared	-			28/5/09
Date analysed	-			28/5/09
Moisture	%	0.1	LAB.8	<0.10

Report Comments:

Asbestos was analysed by Approved Identifier: Not applicable for this job

INS: Insufficient sample for this test NT: Not tested PQL: Practical Quantitation Limit <: Less than >: Greater than

RPD: Relative Percent Difference NA: Test not required LCS: Laboratory Control Sample NR: Not requested

Quality Control Definitions

Blank: This is the component of the analytical signal which is not derived from the sample but from reagents, glassware etc, can be determined by processing solvents and reagents in exactly the same manner as for samples.

Duplicate: This is the complete duplicate analysis of a sample from the process batch. If possible, the sample selected should be one where the analyte concentration is easily measurable.

Matrix Spike: A portion of the sample is spiked with a known concentration of target analyte. The purpose of the matrix spike is to monitor the performance of the analytical method used and to determine whether matrix interferences exist.

LCS (Laboratory Control Sample): This comprises either a standard reference material or a control matrix (such as a blank sand or water) fortified with analytes representative of the analyte class. It is simply a check sample.

Surrogate Spike: Surrogates are known additions to each sample, blank, matrix spike and LCS in a batch, of compounds which are similar to the analyte of interest, however are not expected to be found in real samples.

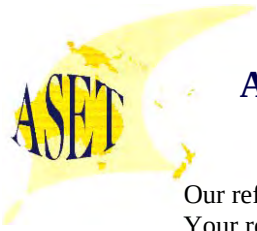
Laboratory Acceptance Criteria:

Duplicate sample and matrix spike recoveries may not be reported on smaller jobs, however, were analysed at a frequency to meet or exceed NEPM requirements. All samples are tested in batches of 20. The duplicate sample RPD and matrix spike recoveries for the sample batch were within laboratory acceptance criteria.

Duplicates: <5xPQL - any RPD is acceptable; >5xPQL - 0-50% RPD is acceptable.

Matrix Spikes and LCS: Generally 70-130% for inorganics/metals; 60-140% for organics and 10-140% for

SVOC and speciated phenols is acceptable. Surrogates: 60-140% is acceptable for general organics and 10-140% for SVOC and speciated phenols.



AUSTRALIAN SAFER ENVIRONMENT & TECHNOLOGY PTY LTD

ABN 36 088 095 112

Our ref : ASET18317/ 21497 / 1 - 8
Your ref : Pelican Beach Resort Phase 2
NATA Accreditation No: 14484

26 May 2009

David Lane Associates
778, Old North Road,
Rothbury,
NSW 2335.

Attn: Mr David Lane,
Fax No: 02-4938 3811

Dear David,

Asbestos Identification

This report presents the results of eight samples, forwarded by David Lane Associates on 25 May 2009, for analysis for asbestos.

1. Introduction: Eight samples forwarded were examined and analysed for the presence of asbestos.

2. Methods : The samples were examined under a Stereo Microscope and selected fibre were analysed by Polarized Light Microscopy in conjunction with Dispersion Staining Method (**Safer Environment Method 1.**)

3. Results : **Sample No. 1. ASET18317 / 21497 / 1. Pelican Beach Resort Phase 2-C9 -1 - ASB.**
Approx dimensions 6.5 cm x 6.5 cm x 3.75 cm
The sample consisted of a mixture of soil, stones, plant matter and fragments of plaster, cement and brick.
No asbestos detected.

Sample No. 2. ASET18317 / 21497 / 2. Pelican Beach Resort Phase 2 -C9-2-ASB FRAG.
Approx dimensions 6.0 cm x 4.0 cm x 0.4 cm
The sample consisted of a fragment of a fibro plaster cement material.
Chrysotile asbestos detected.

Sample No. 3. ASET18317 / 21497 / 3. Pelican Beach Resort Phase 2 - C15 - 1 - ASB.
Approx dimensions 6.0 cm x 6.0 cm x 3.25 cm
The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster.
No asbestos detected.

Sample No. 4. ASET18317 / 21497 / 4. Pelican Beach Resort Phase 2 - C17 - 1 - ASB.
Approx dimensions 6.0 cm x 6.0 cm x 3.0 cm
The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster.
No asbestos detected.

SUITE 710 / 90 GEORGE STREET, HORNSBY NSW 2077 – P.O. BOX 1644 HORNSBY WESTFIELD NSW 1635

PHONE: (02) 99872183 FAX: (02) 99872151 EMAIL: aset@bigpond.net.au WEBSITE: www.aset.com.au

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Sample No. 5. ASET18317 / 21497 / 5. Pelican Beach Resort Phase 2 - C 18 - 1 ASB.

Approx dimensions 6.5 cm x 6.5 cm x 4.0 cm

The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster and brick like material.

No asbestos detected.

Sample No. 6. ASET18317 / 21497 / 6. Pelican Beach Resort Phase 2 - C21 - 1 - ASB.

Approx dimensions 6.0 cm x 6.0 cm x 3.5 cm

The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster and brick.

No asbestos detected.

Sample No. 7. ASET18317 / 21497 / 7. Pelican Beach Resort Phase 2 - C22 - 1 - ASB.

Approx dimensions 6.5 cm x 6.5 cm x 3.5 cm

The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster and brick.

No asbestos detected.

Sample No. 8. ASET18317 / 21497 / 8. Pelican Beach Resort Phase 2 - C23 - 1 - ASB.

Approx dimensions 6.5 cm x 6.5 cm x 4.0 cm

The sample consisted of a mixture of clayish soil, stones, plant matter and fragments of plaster and brick.

No asbestos detected.

Analysed and reported by,

A handwritten signature in black ink, appearing to read "Mahen De Silva", with a stylized flourish at the end.

**Mahen De Silva . BSc. MSc. Grad Dip (Occ Hyg)
Occupational Hygienist / Approved Signatory.
Approved Identifier.**



**This document is issued in accordance with
NATA's Accreditation requirements. Accredited
for compliance with ISO/IEC 17025.**

8 March 2006

TEST REPORT

David Lane Associates

3 Isabella Street
CAMPERDOWN
NSW 2050

Your Reference: CH-SAPPHIRE
Report Number: 43518

Attention: Brendan Stuart

Dear Brendan

The following samples were received from you on the date indicated.

Samples:	Qty.	9 Soils, 1 Water
Date of Receipt of Samples:		06/03/06
Date of Receipt of Instructions:		06/03/06
Date Preliminary Report Faxed:		Not Issued

These samples were analysed in accordance with your written instructions.

The results and associated quality control are contained in the following pages of this report.

Unless otherwise stated, solid samples are expressed on a dry weight basis (moisture has been supplied for your information).

Should you have any queries regarding this report please contact the undersigned.

NOTE : This is an INTERIM REPORT. Preliminary results supplied as advance advice awaiting final QA clearance

INITIALS: **Comments**

Date :

Time :

No of Pages Sent :

Edward Ibrahim

Ed Yours faithfully

Ap SGS ENVIRONMENTAL SERVICES

BTEX in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-6 BH3-0.3 soil	43518-8 BH4-0.5 soil
Benzene	mg/kg				
Toluene	mg/kg				
Ethylbenzene	mg/kg				
Total Xylenes	mg/kg				
BTEX Surrogate (%)	%				

Total Recoverable Hydrocarbons in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-6 BH3-0.3 soil	43518-8 BH4-0.5 soil
TRH C ₆ - C ₉ P&T	mg/kg				
TRH C ₁₀ - C ₁₄	mg/kg				
TRH C ₁₅ - C ₂₈	mg/kg				
TRH C ₂₉ - C ₃₆	mg/kg				

PAHs in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-2 BH1-0.5 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-5 BH2-1.0 soil
Naphthalene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Acenaphthylene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Acenaphthene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Fluorene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Phenanthrene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Anthracene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Fluoranthene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Pyrene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Benzo[a]anthracene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Chrysene	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Benzo[b,k]fluoranthene	mg/kg	<0.2	<0.2	<0.2	<0.2	<0.2
Benzo[a]pyrene	mg/kg	<0.050	<0.050	<0.050	<0.050	<0.050
Indeno[123-cd]pyrene	mg/kg	<0.10	<0.10	<0.10	<0.10	<0.10
Dibenzo[ah]anthracene	mg/kg	<0.10	<0.10	<0.10	<0.10	<0.10
Benzo[ghi]perylene	mg/kg	<0.10	<0.10	<0.10	<0.10	<0.10
Surrogate	%	115	114	119	96	111

PAHs in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-6 BH3-0.3 soil	43518-7 BH3-1.0 soil	43518-8 BH4-0.5 soil	43518-9 HS-1 soil
Naphthalene	mg/kg	<0.1	<0.1	<0.1	<0.1
Acenaphthylene	mg/kg	<0.1	<0.1	<0.1	<0.1
Acenaphthene	mg/kg	<0.1	<0.1	<0.1	<0.1
Fluorene	mg/kg	<0.1	<0.1	<0.1	<0.1
Phenanthrene	mg/kg	<0.1	<0.1	<0.1	<0.1
Anthracene	mg/kg	<0.1	<0.1	<0.1	<0.1
Fluoranthene	mg/kg	<0.1	<0.1	<0.1	<0.1
Pyrene	mg/kg	<0.1	<0.1	<0.1	<0.1
Benzo[a]anthracene	mg/kg	<0.1	<0.1	<0.1	<0.1
Chrysene	mg/kg	<0.1	<0.1	<0.1	<0.1
Benzo[b,k]fluoranthene	mg/kg	<0.2	<0.2	<0.2	<0.2
Benzo[a]pyrene	mg/kg	<0.050	<0.050	<0.050	<0.050
Indeno[123-cd]pyrene	mg/kg	<0.10	<0.10	<0.10	<0.10
Dibenzo[ah]anthracene	mg/kg	<0.10	<0.10	<0.10	<0.10
Benzo[ghi]perylene	mg/kg	<0.10	<0.10	<0.10	<0.10
Surrogate	%	113	110	92	110

OC Pesticides in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-7 BH3-1.0 soil	43518-9 HS-1 soil
HCB	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>alpha</i> -BHC	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>gamma</i> -BHC(Lindane)	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Heptachlor	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Aldrin	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>beta</i> -BHC	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>delta</i> -BHC	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Heptachlor Epoxide	mg/kg	0.8	<0.1	<0.1	<0.1	<0.1
<i>o,p'</i> -DDE	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>alpha</i> -Endosulfan	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>trans</i> -Chlordane	mg/kg	0.5	<0.1	<0.1	<0.1	<0.1
<i>cis</i> -Chlordane	mg/kg	0.1	<0.1	<0.1	<0.1	<0.1
<i>trans</i> -Nonachlor	mg/kg	0.1	<0.1	<0.1	<0.1	<0.1
<i>p,p'</i> -DDE	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Dieldrin	mg/kg	0.2	<0.1	<0.1	<0.1	<0.1
Endrin	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>o,p'</i> -DDD	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>o,p'</i> -DDT	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>beta</i> -Endosulfan	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>p,p'</i> -DDD	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>p,p'</i> -DDT	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Endosulfan Sulphate	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Endrin Aldehyde	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Methoxychlor	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Endrin Ketone	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
<i>Surrogate</i>	%	105	93	95	94	104

OP Pesticides in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-7 BH3-1.0 soil	43518-9 HS-1 soil
Chlorpyrifos	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Fenitrothion	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Bromofos Ethyl	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Ethion	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
OP_Surrogate 1	%	105	93	95	94	104

PCBs in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-7 BH3-1.0 soil	43518-9 HS-1 soil
Arochlor 1016	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1221	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1232	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1242	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1248	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1254	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1260	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1262	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Arochlor 1268	mg/kg	<0.1	<0.1	<0.1	<0.1	<0.1
Total Positive PCB	mg/kg	<0.90	<0.90	<0.90	<0.90	<0.90
PCB_Surrogate 1	%	105	93	95	94	104

Acid Extractable Metals in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-2 BH1-0.5 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-5 BH2-1.0 soil
Arsenic	mg/kg	20	6	5	5	7
Cadmium	mg/kg	0.3	0.3	<0.1	<0.1	<0.1
Chromium	mg/kg	15	17	2.5	2.4	2.3
Copper	mg/kg	54	34	1.1	1.0	0.8
Lead	mg/kg	57	24	1	1	<1
Mercury	mg/kg	<0.05	<0.05	<0.05	<0.05	<0.05
Nickel	mg/kg	3.7	3.3	0.6	0.6	0.7
Zinc	mg/kg	170	44	4.6	4.0	2.8

Acid Extractable Metals in Soil Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-6 BH3-0.3 soil	43518-7 BH3-1.0 soil	43518-8 BH4-0.5 soil	43518-9 HS-1 soil
Arsenic	mg/kg	9	7	9	24
Cadmium	mg/kg	0.2	0.2	0.3	0.3
Chromium	mg/kg	11	6.0	14	20
Copper	mg/kg	29	15	69	42
Lead	mg/kg	14	9.2	19	41
Mercury	mg/kg	<0.05	<0.05	<0.05	<0.05
Nickel	mg/kg	6.8	6.6	11	3.7
Zinc	mg/kg	56	39	120	79

BTEX in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
Benzene	mg/L	<0.001
Toluene	mg/L	<0.001
Ethylbenzene	mg/L	<0.001
Total Xylenes	mg/L	<0.003

Tot Recoverable Hydrocarbons in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
TRH C ₆ - C ₉ P&T	mg/L	<0.040
TRH C ₁₀ - C ₁₄	mg/L	<0.1
TRH C ₁₅ - C ₂₈	mg/L	<0.2
TRH C ₂₉ - C ₃₆	mg/L	<0.2

PAHs in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
Naphthalene	µg/L	<0.5
Acenaphthylene	µg/L	<0.5
Acenaphthene	µg/L	<0.5
Fluorene	µg/L	<0.5
Phenanthrene	µg/L	<0.5
Anthracene	µg/L	<0.5
Fluoranthene	µg/L	<0.5
Pyrene	µg/L	<0.5
Benzo[a]anthracene	µg/L	<0.5
Chrysene	µg/L	<0.5
Benzo[b,k]fluoranthene	µg/L	<1.0
Benzo[a]pyrene	µg/L	<0.50
Indeno[123-cd]pyrene	µg/L	<0.50
Dibenzo[ah]anthracene	µg/L	<0.50
Benzo[ghi]perylene	µg/L	<0.50
Total +ve PAH's	µg/L	<0.5
Surrogate	%	92

OC Pesticides in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
HCB	µg/L	<0.2
<i>alpha</i> -BHC	µg/L	<0.2
<i>gamma</i> -BHC(lindane)	µg/L	<0.2
Heptachlor	µg/L	<0.2
Aldrin	µg/L	<0.2
<i>beta</i> -BHC	µg/L	<0.2
<i>delta</i> -BHC	µg/L	<0.2
Heptachlor Epoxide	µg/L	<0.2
<i>o,p'</i> -DDE	µg/L	<0.2
<i>alpha</i> -Endosulfan	µg/L	<0.2
<i>trans</i> -Chlordane	µg/L	<0.2
<i>cis</i> -Chlordane	µg/L	<0.2
<i>trans</i> -Nonachlor	µg/L	<0.2
<i>p,p'</i> -DDE	µg/L	<0.2
Dieldrin	µg/L	<0.2
Endrin	µg/L	<0.2
<i>o,p'</i> -DDD	µg/L	<0.2
<i>o,p'</i> -DDT	µg/L	<0.2
<i>beta</i> -Endosulfan	µg/L	<0.2
<i>p,p'</i> -DDD	µg/L	<0.2
<i>p,p'</i> -DDT	µg/L	<0.2
Endosulfan Sulphate	µg/L	<0.2
Endrin Aldehyde	µg/L	<0.2
Methoxychlor	µg/L	<0.2
Endrin Ketone	µg/L	<0.2
Surrogate	%	76

OP Pesticides in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
Chlorpyrifos	µg/L	<0.2
Fenitrothion	µg/L	<0.2
Bromofos Ethyl	µg/L	<0.2
Ethion	µg/L	<0.2
OP_Surrogate 1	%	76

PCBs in Water Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
Arochlor 1016	µg/L	<10
Arochlor 1221	µg/L	<10
Arochlor 1232	µg/L	<10
Arochlor 1242	µg/L	<10
Arochlor 1248	µg/L	<10
Arochlor 1254	µg/L	<10
Arochlor 1260	µg/L	<10
Arochlor 1262	µg/L	<10
Arochlor 1268	µg/L	<10
PCB_Surrogate 1	%	76

Metals in water (dissolved) Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-10 BH3-W water
Arsenic	mg/L	
Beryllium	mg/L	
Boron	mg/L	
Cadmium	mg/L	
Chromium	mg/L	
Cobalt	mg/L	
Copper	mg/L	
Lead	mg/L	
Manganese	mg/L	
Mercury	mg/L	
Nickel	mg/L	
Zinc	mg/L	

Moisture Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-1 BH1-0.1 soil	43518-2 BH1-0.5 soil	43518-3 BH2-0.3 soil	43518-4 BH2-0.3A soil	43518-5 BH2-1.0 soil
Moisture	%	29	24	5.4	5.2	6.1

Moisture Our Reference: Your Reference Sample Type	UNITS ----- -----	43518-6 BH3-0.3 soil	43518-7 BH3-1.0 soil	43518-8 BH4-0.5 soil	43518-9 HS-1 soil
Moisture	%	19	10	20	5.2

Method ID	Methodology Summary
SEO-017	BTEX/TRH C6-C9 - Determination by Purge and Trap Gas Chromatography with Flame Ionisation Detection (FID) and Photo Ionisation Detection (PID). The surrogate spike used is aaa-trifluorotoluene.
SEO-018	BTEX - Determination by purge and trap/ Gas Chromatography with MS Detection.
SEO-020	TRH - Determination of Total Recoverable Hydrocarbons by gas chromatography following extraction with DCM/Acetone for solids and DCM for liquids.
SEO-030	PAHs by GC/MS - Determination of Polynuclear Aromatic Hydrocarbons (PAH's) by Gas Chromatography / Mass Spectrometry following extraction with dichloromethane or dichloromethane/acetone. The surrogate spike used is p-Terphenyl-d14.
SEO-005	OC/OP/PCB - Determination of a suite of Organchlorine Pesticides, Chlorinated Organo-phosphorus Pesticides and Polychlorinated Biphenyls (PCB's) by sonication extraction using dichloromethane for waters or acetone / hexane for soils followed by Gas Chromatographic separation with Electron Capture Detection (GC/ECD). The surrogate spike used is 2,4,5,6-Tetrachloro-m-xylene.
SEM-010	Metals - Determination of various metals by ICP-AES following aqua regia digest.
SEM-005	Mercury - Determination of Mercury by Cold Vapour Generation Atomic Absorption Spectroscopy.
Ext-034	Analysed by MGT, Victoria.
SEP-001	Moisture content at 103-105C, compositing and preparation on a 1:5 soil suspension.

QUALITY CONTROL BTEX in Soil	UNITS	PQL	METHOD	Blank				
Benzene	mg/kg	0.5	SEO-017	<0.5				
Toluene	mg/kg	0.5	SEO-017	<0.50				
Ethylbenzene	mg/kg	0.5	SEO-017	<0.5				
Total Xylenes	mg/kg	1.5	SEO-017	<1.5				
BTEX Surrogate (%)	%	0	SEO-018	0.00				
QUALITY CONTROL Total Recoverable Hydrocarbons in Soil	UNITS	PQL	METHOD	Blank				
TRH C ₆ - C ₉ P&T	mg/kg	20	SEO-017	<20				
TRH C ₁₀ - C ₁₄	mg/kg	20	SEO-020	<20				
TRH C ₁₅ - C ₂₈	mg/kg	50	SEO-020	<50				
TRH C ₂₉ - C ₃₆	mg/kg	50	SEO-020	<50				
QUALITY CONTROL PAHs in Soil	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
Naphthalene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	72 [N/T]
Acenaphthylene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	98 [N/T]
Acenaphthene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	88 [N/T]
Fluorene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	[NT]
Phenanthrene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	95 [N/T]
Anthracene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	106 [N/T]
Fluoranthene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	101 [N/T]
Pyrene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	102 [N/T]
Benzo[a]anthracene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	[NT]
Chrysene	mg/kg	0.1	SEO-030	<0.1	43518-3	<0.1 <0.1	43518-2	[NT]
Benzo[b,k]fluoranthene	mg/kg	0.2	SEO-030	<0.2	43518-3	<0.2 <0.2	43518-2	[NT]
Benzo[a]pyrene	mg/kg	0.05	SEO-030	<0.050	43518-3	<0.050 <0.050	43518-2	109 [N/T]
Indeno[123-cd]pyrene	mg/kg	0.1	SEO-030	<0.10	43518-3	<0.10 <0.10	43518-2	[NT]
Dibenzo[ah]anthracene	mg/kg	0.1	SEO-030	<0.10	43518-3	<0.10 <0.10	43518-2	[NT]
Benzo[ghi]perylene	mg/kg	0.1	SEO-030	<0.10	43518-3	<0.10 <0.10	43518-2	[NT]
Surrogate	%	0	SEO-030	0.0	43518-3	119 120 RPD: 1	43518-2	116 [N/T]

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
OC Pesticides in Soil								
HCB	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>alpha</i> -BHC	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>gamma</i> -BHC(Lindane)	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Heptachlor	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	95 [N/T]
Aldrin	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	93 [N/T]
<i>beta</i> -BHC	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>delta</i> -BHC	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	90 [N/T]
Heptachlor Epoxide	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>o,p'</i> -DDE	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>alpha</i> -Endosulfan	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>trans</i> -Chlordane	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>cis</i> -Chlordane	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>trans</i> -Nonachlor	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>p,p'</i> -DDE	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Dieldrin	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	92 [N/T]
Endrin	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>o,p'</i> -DDD	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>o,p'</i> -DDT	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>beta</i> -Endosulfan	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>p,p'</i> -DDD	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
<i>p,p'</i> -DDT	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	86 [N/T]
Endosulfan Sulphate	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Endrin Aldehyde	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	83 [N/T]
Methoxychlor	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Endrin Ketone	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Surrogate	%	0	SEO-005	0.0	43518-4	95 92 RPD: 3	43518-7	94 [N/T]

QUALITY CONTROL OP Pesticides in Soil	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
Chlorpyrifos	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	96 [N/T]
Fenitrothion	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Bromofos Ethyl	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Ethion	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
OP_Surrogate 1	%	0	SEO-005	0.00	43518-4	95 92 RPD: 3	43518-7	94 [N/T]
QUALITY CONTROL PCBs in Soil	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
Arochlor 1016	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1221	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1232	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1242	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1248	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1254	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	105 [N/T]
Arochlor 1260	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1262	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Arochlor 1268	mg/kg	0.1	SEO-005	<0.1	43518-4	<0.1 <0.1	43518-7	[NT]
Total Positive PCB	mg/kg	0.9	SEO-005	0.90	43518-4	<0.90 <0.90	43518-7	[NT]
PCB_Surrogate 1	%	0	SEO-005	0.0	43518-4	95 92 RPD: 3	43518-7	101 [N/T]
QUALITY CONTROL Acid Extractable Metals in Soil	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
Arsenic	mg/kg	3	SEM-010	<3	43518-1	20 15 RPD: 29	Sand	106 [N/T]
Cadmium	mg/kg	0.1	SEM-010	<0.1	43518-1	0.3 0.3 RPD: 0	Sand	105 [N/T]
Chromium	mg/kg	0.5	SEM-010	<0.5	43518-1	15 11 RPD: 31	Sand	103 [N/T]
Copper	mg/kg	0.5	SEM-010	<0.5	43518-1	54 54 RPD: 0	Sand	104 [N/T]
Lead	mg/kg	1	SEM-010	<1	43518-1	57 72 RPD: 23	Sand	105 [N/T]
Mercury	mg/kg	0.05	SEM-005	<0.05	43518-1	<0.05 <0.05	Sand	101 [N/T]
Nickel	mg/kg	0.5	SEM-010	<0.5	43518-1	3.7 3.2 RPD: 14	Sand	105 [N/T]
Zinc	mg/kg	0.3	SEM-010	<0.3	43518-1	170 170 RPD: 0	Sand	105 [N/T]

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
BTEX in Water								
Benzene	mg/L	0.001	SEO-017	<0.001	[NT]	[NT]	Water	102 [N/T]
Toluene	mg/L	0.001	SEO-017	<0.001	[NT]	[NT]	Water	103 [N/T]
Ethylbenzene	mg/L	0.001	SEO-017	<0.001	[NT]	[NT]	Water	103 [N/T]
Total Xylenes	mg/L	0.003	SEO-017	<0.003	[NT]	[NT]	Water	102 [N/T]
QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
Tot Recoverable Hydrocarbons in Water								
TRH C ₆ - C ₉ P&T	mg/L	0.04	SEO-017	<0.040	[NT]	[NT]	Water	91 [N/T]
TRH C ₁₀ - C ₁₄	mg/L	0.1	SEO-020	<0.1	[NT]	[NT]	Water	108 [N/T]
TRH C ₁₅ - C ₂₈	mg/L	0.2	SEO-020	<0.2	[NT]	[NT]	Water	99 [N/T]
TRH C ₂₉ - C ₃₆	mg/L	0.2	SEO-020	<0.2	[NT]	[NT]	Water	79 [N/T]
QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
PAHs in Water								
Naphthalene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	62 [N/T]
Acenaphthylene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	76 [N/T]
Acenaphthene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	71 [N/T]
Fluorene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	[NT]
Phenanthrene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	76 [N/T]
Anthracene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	85 [N/T]
Fluoranthene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	83 [N/T]
Pyrene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	84 [N/T]
Benzo[a]anthracene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	[NT]
Chrysene	µg/L	0.5	SEO-030	<0.5	[NT]	[NT]	Water	[NT]
Benzo[b,k]fluoranthene	µg/L	1.0	SEO-030	<1.0	[NT]	[NT]	Water	[NT]
Benzo[a]pyrene	µg/L	0.5	SEO-030	<0.50	[NT]	[NT]	Water	90 [N/T]
Indeno[123-cd]pyrene	µg/L	0.5	SEO-030	<0.50	[NT]	[NT]	Water	[NT]
Dibenzo[ah]anthracene	µg/L	0.5	SEO-030	<0.50	[NT]	[NT]	Water	[NT]
Benzo[ghi]perylene	µg/L	0.5	SEO-030	<0.50	[NT]	[NT]	Water	[NT]
Total +ve PAH's	µg/L	0.5		0.5	[NT]	[NT]	Water	[NT]
Surrogate	%	0	SEO-030	0.0	[NT]	[NT]	Water	77 [N/T]

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
OC Pesticides in Water								
HCB	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>alpha</i> -BHC	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>gamma</i> -BHC(lindane)	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Heptachlor	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	90 [N/T]
Aldrin	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	90 [N/T]
<i>beta</i> -BHC	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>delta</i> -BHC	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	91 [N/T]
Heptachlor Epoxide	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>o,p'</i> -DDE	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>alpha</i> -Endosulfan	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>trans</i> -Chlordane	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>cis</i> -Chlordane	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>trans</i> -Nonachlor	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>p,p'</i> -DDE	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Dieldrin	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	90 [N/T]
Endrin	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>o,p'</i> -DDD	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>o,p'</i> -DDT	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>beta</i> -Endosulfan	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>p,p'</i> -DDD	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
<i>p,p'</i> -DDT	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	82 [N/T]
Endosulfan Sulphate	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Endrin Aldehyde	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	81 [N/T]
Methoxychlor	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Endrin Ketone	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Surrogate	%	0	SEO-005	0.0	[NT]	[NT]	Water	77 [N/T]

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
OP Pesticides in Water								
Chlorpyrifos	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	92 [N/T]
Fenitrothion	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Bromofos Ethyl	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
Ethion	µg/L	0.2	SEO-005	<0.2	[NT]	[NT]	Water	[NT]
OP_Surrogate 1	%	0	SEO-005	0.00	[NT]	[NT]	Water	77 [N/T]
QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD	Spike Sm#	Matrix Spike % Recovery Duplicate + %RPD
PCBs in Water								
Arochlor 1016	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1221	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1232	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1242	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1248	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1254	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	95 [N/T]
Arochlor 1260	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1262	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
Arochlor 1268	µg/L	10	SEO-005	<10	[NT]	[NT]	Water	[NT]
PCB_Surrogate 1	%	0	SEO-005	0.0	[NT]	[NT]	Water	73 [N/T]
QUALITY CONTROL	UNITS	PQL	METHOD	Blank				
Metals in water (dissolved)								
Arsenic	mg/L	0.001	Ext-034	<0.001				
Beryllium	mg/L	0.020	Ext-034	<0.020				
Boron	mg/L	0.005	Ext-034	<0.005				
Cadmium	mg/L	0.0005	Ext-034	<0.0005				
Chromium	mg/L	0.001	Ext-034	<0.001				
Cobalt	mg/L	0.010	Ext-034	<0.010				
Copper	mg/L	0.001	Ext-034	<0.001				
Lead	mg/L	0.05	Ext-034	<0.05				
Manganese	mg/L	0.001	Ext-034	<0.001				
Mercury	mg/L	0.0001	Ext-034	<0.0001				
Nickel	mg/L	0.001	Ext-034	<0.001				
Zinc	mg/L	0.001	Ext-034	<0.001				

QUALITY CONTROL	UNITS	PQL	METHOD	Blank	Duplicate Sm#	Duplicate Base + Duplicate + %RPD
Moisture	%		SEP-001	[NT]	43518-3	5.4 5.4 RPD: 0
QUALITY CONTROL Moisture	UNITS	Dup. Sm#	Duplicate Base + Duplicate + %RPD			
Moisture	%	43518-4	5.2 5.2 RPD: 0			

Result Codes

[INS] : Insufficient Sample for this test
[NR] : Not Requested
[NT] : Not tested

[HBG] : Results not Reported due to High Background Interference
* : Not part of NATA Accreditation
[N/A] : Not Applicable

Result Comments

Date Organics extraction commenced: 07/03/06

NATA Corporate Accreditation No. 2562, Site No 4354

Note: Test results are not corrected for recovery (excluding Dioxins/Furans* and PAH in XAD and PUF).

Terms and conditions are available from www.au.sgs.com

Quality Control Protocol

Reagent Blank: Sample free reagents carried through the preparation/extraction/digestion procedure and analysed at the beginning of every sample batch analysis. For larger projects, a reagent blank is prepared and analysed with every 20 samples.

Duplicate: A separate portion of a sample being analysed which is treated the same as the other samples in the batch. A duplicate is prepared at least every 20 samples.

Matrix Spike Duplicates: Sample replicates spiked with identical concentrations of target analyte(s). The spiking occurs during the sample preparation and prior to the extraction/digestion procedure. They are used to document the precision and bias of a method in a given sample matrix. Where there is not enough sample available to prepare a spiked sample, another known soil/sand or water (or Milli-Q water) may be used. A duplicate spiked sample is prepared at least every 20 samples.

Surrogate Spike: Added to all samples requiring analysis for organics (where relevant) prior to extraction. Used to determine the extraction efficiency. They are organic compounds which are similar to the target analyte(s) in chemical composition and behaviour in the analytical process, but which are not normally found in environmental samples.

Internal Standard: Added to all samples requiring analysis for organics (where relevant) after the extraction process; the compounds serve to give a standard of retention time and response, which is invariant from run-to-run with the instruments.

Control Standards: Prepared from a source independent of the calibration standards. At least one control standard is included in each run to confirm calibration validity.

Additional QC Samples: A calibration standard and blank are run after every 20 samples of an instrumental analysis run to assess analytical drift.