TABLE D-13
SUMMARY OF DETECTED ORGANIC ANALYTICAL RESULTS FOR SURFACE WATER POND SAMPLES
CASMALIA RESOURCES SUPERFUND SITE REMEDIAL INVESTIGATION

		A-Series Pond		Pond 13		Pond 18		Pond A-5		RCF Pond	
Parameter	**Units**	**11/3/2004**	**4/8/2005**	**10/28/2004**	**4/7/2005**	**11/4/2004**	**4/12/2005**	**11/3/2004**	**4/8/2005**	**10/28/2004**	**4/7/2005**
(E)-1-Chloro-1-propene	µg/l	NT	NT	NT	NT	NT	NT	NT	1.4 /NJ	NT	NT
1,1 Dichloroethane	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.44 /J	ND(0.50) /U	1.3	ND(0.50) /U	ND(0.50) /U
1,1 Dichloroethene	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.43 /J	ND(0.50) /U	ND(0.50) /U
1,1-Dichloro-1-fluoroethane	µg/l	NT	1.3 /NJ	NT	NT	NT	NT	NT	NT	NT	NT
1-Chloro-1-propene	µg/l	NT	NT	NT	NT	NT	NT	NT	1.5 /NJ	NT	NT
Acetaldehyde	µg/l	NT	NT	NT	NT	1.5 /N	NT	NT	NT	NT	NT
Acetone	µg/l	NT	NT	NT	NT	NT	NT	NT	18. /B	NT	NT
Benzene	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.15 /J	ND(0.50) /U	ND(0.50) /U
Carbon disulfide	µg/l	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	0.41 /J	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U
Chloroform	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.40 /J	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U
Cis 1,2 Dichloroethene	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.24 /J	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U
Dimethyl sulfide	µg/l	0.67 /N	NT	2.9 /N	0.84 /NJ	1.4 /N	NT	NT	NT	0.79 /N	NT
Freon 113	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	3.1	ND(0.50) /U	ND(0.50) /U
Methyl Chloride	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	0.23 /J	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U
Methylene Chloride	µg/l	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	1.5	ND(9.1) U*	0.48 /J	ND(1.0) /U	ND(1.0) /U	ND(1.0) /U	**7.0**
Methyl-tert-butyl ether	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	**13.**	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U
Propanal	µg/l	ND(20.) /U	ND(20.) /U	ND(20.) /U	ND(20.) /U	14. /J	ND(20.) /U	12. /J	ND(20.) /U	ND(20.) /U	ND(20.) /U
Tetrahydrofuran	µg/l	ND(20.) /U	ND(20.) /U	ND(20.) /U	ND(20.) /U	ND(20.) /U	**3.8 /J**	ND(20.) /U	ND(20.) /U	ND(20.) /U	ND(20.) /U
Trichloroethene	µg/l	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	ND(0.50) /U	**1.2**	ND(0.50) /U	**1.3**	ND(0.50) /U	ND(0.50) /U
1,11-Dodecadiene	µg/l	NT	NT	NT	NT	NT	NT	19. /DN	NT	NT	NT
1,1-oxybis_2-Methoxy_ethane	µg/l	9.5 /N	NT	27. /N	NT	NT	NT	15. /DN	NT	NT	NT
1,2,3-Trimethylbenzene	µg/l	9.3 /N	NT	NT	NT	25.6 /N	NT	NT	NT	11. /N	NT
1,2,4 Trimethylbenzene	µg/l	NT	NT	**17. /N**	NT	NT	NT	NT	NT	NT	NT
1,3,5 Trimethylbenzene	µg/l	NT	NT	5.8 /N	NT	NT	NT	NT	NT	NT	NT

Footnotes:
µg/l - micrograms per liter
mg/l - miligrams per liter
pg/l - picograms per liter
ND - not detected
NT - not tested
N - The anlysis indicates the presence of an anlyte for which there is presumptive evidence to make a tentative identification
Bold values indicate exceedances of one or more screening levels.
Qualifiers are listed as validation qualifier / lab qualifier where applicable (e.g.B/R)

Laboratory Assigned Qualifiers

B - Compound is also detected in the laboratory method blank.
U - Compound was analyzed for but not detected.
D - Compound is identified in an analysis at a secondary dilution factor.
J - Result is detected below the reporting limit or is an estimated concentration.

MACTEC Validation Assigned Qualifiers

J - Data are qualified as estimated. It is not possible to assess the direction of the potential bias. False positives or false negatives are unlikely to have been reported.
J- -Data are qualified as estimated, with a low bias likely to occur. False positives or false negatives are unlikely to have been reported.
J+ - Data are qualified as estimated, with a high bias likely to occur. False positives or false negatives are unlikely to have been reported.
U - Data are qualified as nondetected, because the analyte was observed in an associated laboratory or field blank.
J* - Analytical results for this compound are qualified as estimated due to miscellaneous lab errors.
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CASMALIA RESOURCES SUPERFUND SITE REMEDIAL INVESTIGATION

		A-Series Pond		Pond 13		Pond 18		Pond A-5		RCF Pond	
Parameter	**Units**	**11/3/2004**	**4/8/2005**	**10/28/2004**	**4/7/2005**	**11/4/2004**	**4/12/2005**	**11/3/2004**	**4/8/2005**	**10/28/2004**	**4/7/2005**
1-Ethyl-2-methylbenzene	µg/l	NT	NT	8.3 /N	NT	6.0 /N	NT	NT	NT	NT	NT
2-Chlorocyclohexanol	µg/l	NT	NT	NT	NT	NT	NT	NT	NT	7.5 /N	NT
bis(2-Ethylhexyl) phthalate	µg/l	ND(5.0) /U	ND(5.0) /UB	ND(5.0) /U	**5.6 /B**	ND(5.0) /U	ND(25.) /UDB	ND(5.6) /UD	**51. /DB**	ND(5.0) /U	**5.0 /B**
n-Hexadecanoic acid	µg/l	NT	NT	8.5 /N	NT	NT	NT	13. /DN	NT	11. /N	NT
Tetradecanoic acid	µg/l	NT	NT	NT	NT	NT	NT	8.2 /DN	NT	NT	NT
Z-11-Hexadecanoic Acid	µg/l	NT	NT	NT	NT	NT	NT	15. /DN	NT	NT	NT
Acenaphthylene	µg/l	ND(0.10) /U	ND(0.10) /U	ND(0.10) UJ/U	ND(0.10) /U	ND(0.10) /U	ND(0.10) /U	ND(0.50) /UD	ND(0.10) /U	0.01 J/J	ND(0.10) /U
Benzo(a)anthracene	µg/l	ND(0.01) U/J	0.011 /J	ND(0.012) UJ/J	0.0099 /J	ND(0.011) U*/J	0.01 /J	ND(0.05) U/JD	0.0099 /J	ND(0.0098) UJ/J	0.0096 /J
Benzo(a)pyrene	µg/l	ND(0.10) /U	ND(0.10) /U	**0.013 J/J**	ND(0.10) /U	ND(0.10) /U	ND(0.10) /U	ND(0.50) /UD	ND(0.10) /U	**0.013 J/J**	ND(0.10) /U
Benzo(ghi)perylene	µg/l	ND(0.014) U/J	ND(0.10) /U	ND(0.10) UJ/U	0.037 /J	ND(0.013) U*/J	0.037 /J	ND(0.50) /UD	ND(0.10) /U	ND(0.10) UJ/U	0.035 /J
bis(2-Chloroethyl) ether	µg/l	**0.02 /J**	ND(0.10) /U	ND(0.10) UJ/U	ND(0.10) /U	ND(0.10) /U	ND(0.10) /U	ND(0.50) /UD	ND(0.10) /U	ND(0.10) UJ/U	**0.018 /J**
Naphthalene	µg/l	0.013 /J	ND(0.10) /U	0.013 J/J	0.014 /J	ND(0.015) U*/J	ND(0.10) /U	ND(0.50) /UD	ND(0.10) /U	0.016 J/J	ND(0.10) /U
N-Nitrosodiethylamine	µg/l	ND(0.10) /U	ND(0.10) /U	ND(0.10) UJ/U	ND(0.10) /U	ND(0.10) UJ*/U	**0.071 /J**	ND(0.50) /UD	ND(0.10) /U	ND(0.10) UJ/U	ND(0.10) /U
N-Nitrosodimethylamine	µg/l	ND(0.02) /U	ND(0.02) /U	ND(0.02) /U	ND(0.022) /UD	ND(0.02) /U	**0.18**	ND(0.02) /U	ND(0.02) /U	ND(0.02) /U	ND(0.02) /U
N-Nitrosodinpropylamine	µg/l	ND(0.10) /U	**0.064 /J**	ND(0.11) UJ/B	**0.037 /JB**	ND(0.10) /U	ND(0.10) /U	**0.49 /JD**	**0.05 /J**	ND(0.14) UJ/B	**0.039 /JB**
n-Nitrosopyrrolidine	µg/l	**0.36**	**0.14**	**0.55 J**	**0.17**	ND(0.10) /U	ND(0.10) /U	**1.5 /D**	**0.21**	**0.035 J/J**	ND(0.10) /U
OCDD	pg/l	ND(22.9) UJ	ND(4.91) /U	**29.1 J/J**	ND(7.83) /U	ND(37.6) U*/J	ND(10.3) /U	**72.4 J**	ND(4.54) /U	**25.1 J/J**	ND(6.41) /U
pH	ph	7.39	8.79	8.86	8.56	8.88	7.96	7.99	9.02	8.43	8.12
Total Dissolved Solids (TDS)	mg/l	21,000. /D	12,000. /D	43,000. /D	11,000. /D	20,000. /D	7,100. /D	39,000. /D	14,000. /D	24,000. /D	7,600. /D
Bromide	mg/l	280. /D	NT	550. /D	110. /D	160. /D	24. /D	37. /D	140. /D	260. /D	59. /D
Chloride	mg/l	6,300. /D	3,900. /D	21,000. /D	4,400. /D	6,600. /D	1,100. /D	12,000. /D	4,800. /D	9,000. /D	2,500. /D
Fluoride	mg/l	2.4 /JD	2.1 /D	2.7 /JD	ND(1.0) /UD	ND(2.5) /UD	ND(0.50) /UD	5.1 /D	2.3 /D	ND(5.0) /UD	1.2 /D
Nitrate (as NO3)	mg/l	ND(22.) /UD	ND(8.8) /UD	ND(44.) /UD	ND(8.8) /UD	4.0 /JD	17. /D	ND(22.) /UD	ND(8.8) /UD	ND(44.) /UD	ND(4.4) /UD
Nitrate as N	mg/l	ND(5.0) /UD	ND(2.0) /UD	ND(10.) /UD	ND(2.0) /UD	0.90 /JD	3.8 /D	ND(5.0) /UD	ND(2.0) /UD	ND(10.) /UD	ND(1.0) /UD
Sulfate	mg/l	6,600. /D	4,300. /D	12,000. /D	3,100. /D	6,600. /D	1,400. /D	13,000. /D	5,500. /D	7,500. /D	2,500. /D
Bicarbonate Alkalinity as CaCO3	mg/l	150. /D	37.	ND(10.) /UD	110. /D	34. /D	150. /D	260. /D	15.	91. /D	90. /D
Carbonate Alkalinity as CaCO3	mg/l	ND(5.0) /UD	78.	240. /D	93. /D	130. /D	ND(5.0) /UD	ND(10.) /UD	110.	110. /D	21. /D
1,2 Dibromoethane (EDB)	µg/l	**0.012**	ND(0.01) /U	ND(0.01) /U	**0.0068 /J**	ND(0.01) /U	ND(0.01) /U	ND(0.01) /U	0.0028 /JP	ND(0.01) /U	0.0054 /J
Diesel Range Organics (C12 - C24)	µg/l	390.	160. /J	430. J	240.	ND(240.) U*	170. /J	380.	290.	300. J	NT
TPH-Motor Oil	µg/l	210. /J	91. /J	91. J/J	110. /J	630.	230. /J	180. /J	180. /J	140. J/J	NT

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