Supplementary Material

Occurrence, Distribution, and Sources of Aliphatic and Cyclic Hydrocarbons in Sediments from Two Different Lagoons along the Red Sea Coast of Saudi Arabia

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Table S1. Concentrations (ng/g), chemical parameters and proportions of various chemical groups in surface sediments from Al-Qahma and Al-Wajh lagoons, Red Sea coast of Saudi Arabia.

Al-Qahma Lagoon																			
			Station #																
			1	2	3	4	5	7	8	12	14	17	18	20	21	22	23	24	25	27
TEOM (ng/g)			**7729**	**4054**	**6735**	**7272**	**11711**	**4523**	**5310**	**7891**	**9019**	**7181**	**3335**	**4151**	**886**	**6570**	**6670**	**5310**	**6098**	**4336**
Compound (ng/g)	**Composition**	**M.W.**																		
n-Alkanes																				
Pentadecane	$C_{15}H_{32}$	212	2.4	0.0	1.8	0.4	1.5	0.6	0.8	1.2	0.1	1.0	1.3	0.0	0.0	0.6	0.6	0.3	0.5	0.7
Hexadecane	$C_{16}H_{34}$	226	16.8	11.6	27.2	1.2	4.5	3.3	1.5	2.5	1.7	4.9	19.7	0.8	0.6	2.5	4.0	2.9	0.8	6.0
Heptadecane	$C_{17}H_{36}$	240	54.9	34.9	79.5	13.1	48.0	26.7	17.5	11.8	23.5	28.0	1.9	6.2	2.7	9.2	16.0	18.6	6.1	26.0
Pristane	$C_{19}H_{40\,(Pr)}$	268	1.5	2.5	2.7	0.4	1.6	1.0	0.7	0.5	0.9	1.0	25.0	0.3	0.5	0.2	0.5	0.6	0.4	0.8
Octadecane	$C_{18}H_{38}$	256	49.4	35.7	89.3	4.4	16.2	14.0	5.7	6.9	17.7	22.4	3.8	8.0	3.9	8.0	8.3	19.5	7.3	26.1
Phytane	$C_{20}H_{42(Ph)'}$	282	16.4	11.2	32.1	0.3	1.1	2.3	0.6	1.4	2.7	12.5	11.2	1.5	0.6	1.3	3.9	2.9	1.0	2.5
Nonadecane	$C_{19}H_{40}$	268	9.0	2.1	111.5	0.2	0.9	2.2	1.5	4.5	11.1	3.0	66.6	4.8	0.9	9.0	2.6	5.4	0.6	0.2
Eicosane	$C_{20}H_{42}$	282	27.2	22.2	61.3	5.8	21.1	13.7	7.9	12.6	20.5	28.6	37.7	10.8	9.5	17.2	13.3	25.4	17.3	18.5
Heneicosane	$C_{21}H_{44}$	296	14.2	12.9	40.3	2.0	7.2	11.6	4.7	5.0	9.4	12.2	50.8	6.8	3.8	7.6	3.5	12.2	8.5	13.6
Docosane	$C_{22}H_{46}$	310	14.3	11.4	46.2	3.1	11.3	11.2	5.9	7.7	10.4	15.1	57.7	9.4	7.3	13.0	3.2	17.2	8.6	17.3
Tricosane	$C_{23}H_{48}$	324	13.6	9.8	60.2	3.3	12.0	9.0	6.6	5.9	12.1	35.9	67.8	10.7	4.6	13.1	2.6	15.4	6.9	26.5
Tetracosane	$C_{24}H_{50}$	338	14.2	7.1	37.8	3.3	12.0	7.0	7.3	6.4	12.6	10.4	83.4	10.2	3.9	16.5	2.0	14.9	6.7	19.1
Pentacosane	$C_{25}H_{52}$	352	16.0	7.0	74.6	3.7	13.5	4.9	8.6	4.8	14.5	46.2	76.5	10.5	1.9	15.2	8.0	15.5	8.2	36.3
Hexacosane	$C_{26}H_{54}$	366	15.6	4.6	22.8	3.3	12.2	3.5	8.5	2.9	13.5	7.5	74.7	10.6	2.1	16.2	1.4	15.9	4.9	16.4
Heptacosane	$C_{27}H_{56}$	380	22.6	9.3	75.8	4.2	15.4	4.9	7.8	4.2	13.9	43.6	53.8	10.4	1.4	13.2	2.6	15.4	4.0	39.5
Octacosane	$C_{28}H_{58}$	394	11.6	3.1	13.8	2.4	8.8	2.5	5.4	1.9	8.0	4.1	41.9	8.1	1.5	10.8	1.2	11.3	2.2	11.8
Nonacosane	$C_{29}H_{60}$	408	14.8	7.4	37.3	1.8	6.8	3.2	4.1	3.5	8.6	23.6	33.8	6.0	0.9	7.5	2.4	9.6	2.4	21.0
Triacontane	$C_{30}H_{62}$	422	7.2	2.1	10.1	1.0	3.5	1.5	2.3	0.9	4.0	2.6	24.5	3.2	0.3	3.7	0.5	4.9	0.5	5.5
Hentriacontane	$C_{31}H_{64}$	436	12.0	7.4	41.8	1.1	3.9	3.3	2.1	2.3	5.0	17.8	3.4	2.3	0.7	3.2	2.7	4.0	0.5	14.2
Dotriacontane	$C_{32}H_{66}$	450	3.8	1.1	4.9	0.2	0.8	0.5	0.9	0.5	1.3	1.0	2.9	0.7	0.1	0.6	0.3	1.8	0.6	2.4
Tritriacontane	$C_{33}H_{68}$	464	4.9	3.3	23.0	0.0	0.1	0.6	0.3	1.4	1.4	49.3	0.0	0.3	0.1	0.4	1.2	0.5	0.1	7.4
Tetratriacontane	$C_{34}H_{70}$	478	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Pentatriacontane	$C_{35}H_{72}$	492	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Hexatriacontane	$C_{36}H_{74}$	506	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Heptatriacontane	$C_{37}H_{76}$	520	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total			**342.4**	**206.6**	**894.0**	**55.2**	**202.4**	**127.5**	**100.6**	**88.7**	**193.0**	**370.5**	**738.5**	**121.6**	**47.2**	**169.2**	**80.8**	**214.0**	**88.3**	**311.8**

CPI(o/e)			**1.0**	**1.0**	**1.7**	**1.2**	**1.2**	**1.2**	**1.2**	**1.1**	**1.1**	**2.7**	**1.0**	**0.9**	**0.6**	**0.9**	**1.2**	**0.9**	**0.8**	**1.5**
LMW/HMW			**2.0**	**3.3**	**1.8**	**2.1**	**2.1**	**4.0**	**1.5**	**2.8**	**1.7**	**0.8**	**1.2**	**1.3**	**4.2**	**1.4**	**2.7**	**1.7**	**2.7**	**1.0**
TAR			**0.68**	**0.55**	**0.76**	**0.45**	**0.45**	**0.29**	**0.59**	**0.50**	**0.66**	**3.04**	**0.76**	**1.06**	**0.42**	**0.92**	**0.39**	**0.81**	**0.44**	**2.03**
Wax n-alkanes																				
Total			**23.9**	**18.8**	**137.7**	**2.0**	**7.3**	**5.7**	**2.0**	**6.6**	**8.9**	**122.9**	**57.9**	**1.9**	**2.1**	**14.6**	**6.2**	**4.4**	**1.5**	**54.3**
%			**7.0%**	**9.1%**	**15.4%**	**3.6%**	**3.6%**	**4.5%**	**2.0 %**	**7.4%**	**4.6 %**	**33.2%**	**7.8%**	**1.6%**	**4.4 %**	**8.7 %**	**7.7%**	**2.1 %**	**1.7%**	**17.4 %**
Algal n-Alkanes																				
Total			**47.3**	**26.3**	**174.9**	**12.9**	**47.3**	**32.5**	**20.9**	**17.8**	**34.3**	**30.6**	**108.7**	**13.3**	**5.2**	**21.2**	**16.6**	**25.3**	**11.8**	**24.4**
%			**13.8%**	**12.7%**	**19.6%**	**23.4%**	**23.4%**	**25.5%**	**20.8 %**	**20.1%**	**17.8 %**	**8.2%**	**14.7%**	**11.0%**	**11.0 %**	**12.5 %**	**20.5%**	**11.8 %**	**13.3%**	**7.8 %**
Bacterial n-Alkanes																				
Total			**49.9**	**43.4**	**177.7**	**11.4**	**41.8**	**31.0**	**15.1**	**22.0**	**39.9**	**55.9**	**61.3**	**19.7**	**14.0**	**27.7**	**25.6**	**47.8**	**25.4**	**50.7**
%			**14.6%**	**21.0%**	**19.9%**	**20.7%**	**20.7%**	**24.3%**	**15.0 %**	**24.8%**	**20.7 %**	**15.1%**	**8.3%**	**16.2%**	**29.6 %**	**16.4 %**	**31.7%**	**22.3 %**	**28.7%**	**16.3 %**
Petroleum n-alkanes			**221.3**	**118.2**	**403.7**	**28.9**	**106.0**	**58.3**	**62.6**	**42.4**	**109.9**	**161.2**	**510.7**	**86.7**	**26.0**	**105.7**	**32.4**	**136.5**	**49.6**	**182.4**
%			**64.6%**	**57.2%**	**45.2%**	**52.4%**	**52.4%**	**45.7%**	**62.2 %**	**47.7%**	**56.9 %**	**43.5%**	**69.1%**	**71.3%**	**55.1 %**	**62.4 %**	**40.1%**	**63.8 %**	**56.2%**	**58.5 %**
Hopanes																				
Trisnorneohopane	$C_{27}H_{46}$	370	0.0	0.0	7.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.0	0.0	0.0	0.0	0.0
17a(H)-Trisnorhopane	$C_{27}H_{46}$	370	0.0	0.0	3.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.2	0.0	0.0	0.0	0.0
17a(H),21b(H)-Norhopane	$C_{29}H_{50}$	398	0.0	0.0	19.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.5	7.4	0.0	0.0	0.0	0.0
17a(H),21b(H)-Hopane	$C_{30}H_{52}$	412	0.0	0.0	21.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.2	4.9	0.0	0.0	0.0	0.0
17a(H),21b(H)-22S-Homohopane	$C_{31}H_{54}$	426	0.0	0.0	6.6	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	2.8	0.0	0.0	0.0	0.0
17a(H),21b(H)-22R-Homohopane	$C_{31}H_{54}$	426	0.0	0.0	2.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	1.8	0.0	0.0	0.0	0.0
Gammacerane	$C_{30}H_{52}$	412	0.0	0.0	2.7	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.1	0.2	0.0	0.0	0.0	0.0
17a(H),21b(H)-22S-Bishomohopane	$C_{32}H_{56}$	440	0.0	0.0	10.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.9	0.0	0.0	0.0	0.0
17a(H),21b(H)-22R-Bishomohopane	$C_{32}H_{56}$	440	0.0	0.0	8.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.5	0.0	0.0	0.0	0.0
17a(H),21b(H)-22S-Trishomohopane	$C_{33}H_{58}$	454	0.0	0.0	1.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17a(H),21b(H)-22R-Trishomohopane	$C_{33}H_{58}$	454	0.0	0.0	0.4	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17a(H),21b(H)-22S-Tetrakishomohopane	$C_{34}H_{60}$	468	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17a(H),21b(H)-22R-Tetrakishomohopane	$C_{34}H_{60}$	468	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17a(H),21b(H)-22S-Pentakishomohopane	$C_{35}H_{62}$	482	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
17a(H),21b(H)-22R-Pentakishomohopane	$C_{35}H_{62}$	482	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total			**0.0**	**0.0**	**82.8**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**1.0**	**19.7**	**0.0**	**0.0**	**0.0**	**0.0**
C_{31} S/(R+S)			ND	ND	0.75	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.70	0.61	ND	ND	ND	ND

C_{32} S/(R+S)			ND	ND	0.56	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.00	0.65	ND	ND	ND	ND
Steranes																				
13b,17a-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
13b,17a-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
13a,17b-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
13a,17b-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20S-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20R-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20S-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20R-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20S-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20R-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20S-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20R-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20S-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20R-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14b,17b-20S-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
14a,17ba-20R-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0
Total			**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**	**0.0**
PAHs																				
Phenanthrene	$C_{14}H_{10}$	178	0.4	0.3	0.3	0.0	0.1	0.0	0.1	0.2	0.8	0.4	0.0	0.2	0.0	0.2	0.3	1.1	0.3	0.6
Anthracene	$C_{14}H_{10}$	178	2.0	1.9	1.1	0.7	1.1	0.4	3.9	5.9	11.0	5.1	4.0	8.2	1.0	8.0	6.0	10.2	10.5	6.4
Benzo[k]fluoranthene	$C_{20}H_{12}$	252	0.0	28.0	29.0	17.5	29.3	17.2	0.0	0.0	20.7	15.8	6.3	26.6	1.6	16.4	21.3	13.8	14.0	29.5
Benzo[b]fluoranthene	$C_{20}H_{12}$	252	0.0	23.2	22.6	10.5	19.7	13.4	0.0	10.3	14.6	11.3	4.6	19.7	1.3	11.2	15.4	9.6	10.2	22.1
Total			**2.4**	**53.3**	**52.9**	**28.7**	**50.2**	**31.1**	**4.0**	**16.4**	**47.1**	**32.6**	**15.0**	**54.7**	**3.8**	**35.8**	**43.1**	**34.7**	**35.0**	**58.5**
Ant/(Ant+Phe)			0.8	0.9	0.8	1.0	0.9	1.0	1.0	1.0	0.9	0.9	1.0	1.0	1.0	1.0	1.0	0.9	1.0	0.9
Methyl n-Alkanoates																				
Methyl hexadecanoate	$C_{17}H_{34}O_2$	270	107.4	72.2	102.4	64.0	113.6	58.8	41.4	60.8	94.7	98.4	32.7	46.1	30.6	59.8	70.0	95.6	48.2	77.2
Methyl octadecenoate	$C_{19}H_{38}O_2$	298	12.7	6.2	8.8	11.0	15.6	4.6	8.0	13.6	14.5	10.5	5.4	3.5	7.5	8.0	9.4	9.8	10.7	5.4
Total			**120.1**	**78.4**	**111.2**	**74.9**	**129.2**	**63.4**	**49.4**	**74.4**	**109.2**	**108.9**	**38.1**	**49.6**	**38.0**	**67.8**	**79.4**	**105.4**	**58.9**	**82.6**
Total FA																				
Nonanoic acid	$C_9H_{18}O_2$	158	67.9	27.5	5.6	37.0	17.5	2.7	36.9	65.2	30.3	4.9	4.8	1.9	0.5	4.7	34.2	20.1	56.2	3.8
Decanoic acid	$C_{10}H_{20}O_2$	172	34.9	2.4	2.7	17.9	7.7	1.2	17.0	33.1	14.9	2.0	1.9	0.8	0.0	1.7	12.5	7.7	18.1	0.6

Undecanoic acid	$C_{11}H_{22}O2$	186	20.1	0.0	1.9	8.5	3.6	0.6	9.0	20.9	8.2	0.4	0.9	0.4	0.0	0.7	5.8	3.7	4.8	0.0
Dodecanoic acid	$C_{12}H_{24}O_2$	200	45.5	23.7	3.7	15.5	7.1	1.9	18.1	45.2	18.3	1.7	1.9	1.1	0.0	1.8	13.6	8.4	10.0	1.7
Tridecanoic acid	$C_{13}H_{26}O_2$	214	21.9	77.3	4.8	8.0	3.7	1.7	10.3	25.0	10.2	1.9	1.1	0.9	0.0	1.4	6.4	4.4	7.4	3.1
Tetradecanoic acid	$C_{14}H_{28}O_2$	228	114.1	70.1	9.9	39.9	22.5	7.3	55.0	130.4	60.0	4.9	5.2	3.0	0.0	4.6	37.8	23.0	28.5	4.8
Pentadecanoic acid	$C_{15}H_{30}O_2$	242	69.1	38.2	5.0	24.9	10.1	5.0	36.0	93.6	36.7	1.8	3.3	2.2	0.0	2.5	23.5	12.4	13.8	1.5
Hexadecanoic acid	$C_{16}H_{32}O_2$	256	1127.7	388.4	189.2	524.3	297.5	95.0	593.1	1424.3	708.0	124.2	108.4	75.6	33.6	109.7	516.9	340.9	329.9	104.0
Heptadecanoic acid	$C_{17}H_{34}O_2$	270	27.1	4.7	1.5	8.6	3.0	0.4	13.5	39.0	14.0	0.4	1.3	0.6	0.0	0.7	8.7	4.5	7.3	0.3
Octadecanoic acid	$C_{18}H_{36}O_2$	284	766.6	181.6	61.0	331.9	126.8	16.1	406.4	1081.4	451.0	24.0	59.8	22.4	8.8	37.0	318.1	173.0	180.3	19.8
Nonadecanoic acid	$C_{19}H_{38}O_2$	298	7.2	11.0	4.7	0.2	0.4	3.1	0.6	3.3	0.6	0.6	0.0	0.1	0.3	0.1	0.1	0.1	0.9	0.8
Eicosanoic acid	$C_{20}H_{40}O_2$	312	8.1	14.0	0.4	2.3	0.6	0.9	4.0	11.9	4.5	0.3	0.5	0.2	0.2	0.2	2.8	1.1	0.3	0.2
Total			**2310.3**	**838.9**	**290.4**	**1018.9**	**500.4**	**135.9**	**1200.0**	**2973.2**	**1356.7**	**167.1**	**189.0**	**109.2**	**43.3**	**165.1**	**980.6**	**599.3**	**657.5**	**140.5**
CPI(e/o)			9.8	4.3	11.4	10.7	12.1	9.1	10.3	11.0	12.6	15.7	15.7	16.7	57.7	15.5	11.4	12.2	6.3	13.8
Wax FA			**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
Algal FA																				
Total			**2097.0**	**680.2**	**267.0**	**931.8**	**462.1**	**122.5**	**1093.7**	**2726.3**	**1256.7**	**157.1**	**177.7**	**103.0**	**42.6**	**155.1**	**901.7**	**554.0**	**567.1**	**131.0**
%			90.8%	81.1%	91.9%	91.4%	92.3%	90.1%	91.1%	91.7%	92.6%	94.0%	94.0%	94.3%	98.3%	93.9%	92.0%	92.4%	86.2%	93.2%
Microbial FA																				
Total			**213.32**	**158.69**	**23.40**	**87.12**	**38.31**	**13.42**	**106.30**	**246.98**	**100.00**	**10.00**	**11.33**	**6.17**	**0.74**	**10.01**	**78.86**	**45.26**	**90.41**	**9.49**
%			9.2%	18.9%	8.1%	8.6%	7.7%	9.9%	8.9%	8.3%	7.4%	6.0%	6.0%	5.7%	1.7%	6.1%	8.0%	7.6%	13.8%	6.8%
n-Alkanols																				
Methyl unodcanoate	$C_{12}H_{26}O$	214	34.5	16.5	81.7	9.2	8.7	27.6	9.6	6.6	11.6	4.7	6.2	4.2	0.0	11.6	77.7	18.2	9.7	5.1
Dodecanol	$C_{13}H_{28}O$	228	10.4	5.3	19.4	2.7	2.9	1.5	1.4	2.0	1.7	2.4	0.2	0.9	0.0	1.5	5.2	4.8	0.0	2.0
Tetradecanol	$C_{14}H_{30}O$	242	82.8	32.0	52.9	34.9	29.5	32.0	8.9	16.6	17.1	18.4	4.7	6.1	0.0	9.5	31.7	20.5	9.9	17.9
Pentadecanol	$C_{15}H_{32}O$	256	44.0	12.8	32.0	29.5	33.6	32.1	6.3	18.5	16.2	16.6	3.0	4.8	0.0	0.8	6.1	17.4	5.4	15.2
Hexadecanol	$C_{16}H_{34}O$	242	177.8	43.8	70.7	80.0	112.4	104.9	26.0	51.3	59.5	63.9	9.0	12.9	0.6	25.6	26.7	63.7	22.6	66.8
Heptadecanol	$C_{17}H_{36}O$	256	19.9	3.0	10.0	13.2	22.0	20.9	4.9	10.1	13.2	10.4	0.0	1.4	0.0	4.1	4.0	9.9	0.7	9.8
Octadecanol	$C_{18}H_{38}O$	270	44.6	58.8	71.9	19.4	44.1	25.1	16.0	22.1	52.3	34.8	18.4	26.0	8.7	52.6	44.0	41.0	50.1	23.4
Nonadecanol	$C_{19}H_{40}O$	284	1.2	1.8	2.4	0.7	2.2	0.8	0.9	1.6	2.9	1.5	0.0	0.7	0.0	0.4	4.5	0.1	0.0	1.9
Eicosanol	$C_{20}H_{42}O$	298	17.6	5.1	10.0	2.6	6.0	4.3	2.9	2.8	4.8	5.1	0.0	0.3	0.0	1.3	3.1	2.0	1.0	3.4
Heneicosanol	$C_{21}H_{44}O$	308	1.0	4.9	8.8	2.0	1.7	0.9	1.3	0.7	1.8	2.7	0.0	0.2	6.9	0.3	0.2	1.2	0.3	1.9
Docosanol	$C_{22}H_{46}O$	326	12.9	0.8	81.4	6.3	18.9	16.9	8.2	10.6	20.0	15.9	10.2	12.2	0.0	47.8	21.5	12.7	23.4	20.8
Triacosanol	$C_{23}H_{48}O$	340	2.7	4.8	18.0	0.0	5.1	1.0	0.6	0.2	3.7	2.9	0.0	0.0	9.9	0.0	0.0	0.0	0.0	2.8
Tetracosanol	$C_{24}H_{50}O$	354	12.0	0.1	61.4	10.1	19.9	6.1	5.4	21.6	10.6	11.4	8.1	8.4	0.0	40.0	33.5	2.7	2.4	46.5

Pentacosanol	$C_{25}H_{52}O$	368	1.0	1.5	13.0	0.0	0.7	0.0	0.0	0.0	0.1	1.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	1.6
Hexacosanol	$C_{26}H_{54}O$	382	4.7	8.3	39.0	0.6	4.0	0.5	1.0	0.6	4.7	7.6	0.0	0.0	0.0	0.0	0.0	1.2	0.0	5.3
Heptacosanol	$C_{27}H_{56}O$	396	0.3	0.0	10.4	0.0	0.0	0.0	0.0	0.0	0.0	0.3	0.0	0.0	1.2	0.0	0.0	0.0	0.0	1.0
Octacosanol	$C_{28}H_{58}O$	410	15.7	18.6	76.6	1.4	6.6	1.2	2.9	2.2	8.1	20.8	0.0	0.0	0	0.0	0.2	2.7	0.0	14.5
Total			**483.1**	**218.2**	**659.4**	**212.7**	**318.3**	**276.0**	**96.5**	**167.4**	**228.3**	**220.7**	**59.8**	**77.9**	**27.2**	**195.4**	**258.5**	**198.2**	**125.3**	**239.7**
CPI(e/o)			4.6	4.9	4.1	3.2	3.5	3.3	4.6	3.9	4.5	4.7	15.7	8.2	0.5	24.8	8.0	4.4	16.9	5.5
Wax inputs																				
Total			**45.2**	**27.9**	**258.2**	**18.4**	**49.4**	**24.7**	**17.6**	**34.9**	**43.5**	**55.7**	**18.3**	**20.6**	**0.0**	**87.8**	**55.2**	**19.3**	**25.8**	**87.1**
%			9.4%	12.8%	39.2%	8.6%	15.5%	9.0%	18.2%	20.9%	19.0%	25.3%	30.6%	26.4%	0.0%	44.9%	21.4%	9.8%	20.6%	36.3%
Algal inputs																				
Total			**357.3**	**156.1**	**287.2**	**146.2**	**200.7**	**194.0**	**63.5**	**99.4**	**145.4**	**127.0**	**38.3**	**49.4**	**9.3**	**100.5**	**183.2**	**145.4**	**93.1**	**116.5**
%			74.0%	71.5%	43.5%	68.7%	63.1%	70.3%	65.8%	59.4%	63.7%	57.5%	64.0%	63.4%	34.1%	51.5%	70.9%	73.4%	74.3%	48.6%
Terr/Aqutic			0.13	0.18	0.90	0.13	0.25	0.13	0.28	0.35	0.30	0.44	0.48	0.42	0.00	0.87	0.30	0.13	0.28	0.75
Microbal inputs																				
Total			**75.5**	**23.0**	**63.8**	**46.1**	**60.7**	**55.3**	**13.4**	**32.2**	**34.0**	**31.0**	**3.2**	**7.8**	**0.0**	**6.8**	**19.9**	**32.2**	**6.2**	**28.8**
%			15.6%	10.5%	9.7%	21.7%	19.1%	20.0%	13.9%	19.2%	14.9%	14.0%	5.4%	10.0%	0.0%	3.5%	7.7%	16.3%	4.9%	12.0%
Plasticizers/Antioxidants																				
Diethyl phthalate	$C_{12}H_{14}O_4$	222	5.4	3.6	7.8	7.3	5.7	3.7	3.3	3.1	2.9	7.5	2.1	2.3	2.8	5.8	4.1	7.0	5.1	5.7
Di-isobutyl phthalate	$C_{16}H_{22}O_4$	278	61.5	67.1	120.2	68.8	76.2	43.0	31.1	43.5	50.7	68.2	21.4	43.4	10.5	59.6	67.4	59.9	51.0	64.9
Dibutyl phthalate	$C_{16}H_{22}O_4$	278	175.5	132.2	185.2	41.4	119.5	47.0	38.8	78.9	100.1	117.8	26.0	61.4	24.9	54.5	74.7	78.6	47.6	76.8
Di(2-ethylhexyl) phthalate (DEHP)	$C_{24}H_{38}O_4$	390	3.1	1.3	8.1	2.3	2.5	3.1	1.9	1.2	2.7	2.9	2.0	1.3	0.5	3.2	1.7	3.8	5.3	2.0
Total			**245.5**	**204.2**	**321.3**	**119.8**	**203.8**	**96.8**	**75.0**	**126.7**	**156.5**	**196.4**	**51.5**	**108.4**	**38.7**	**123.2**	**147.9**	**149.2**	**109.1**	**149.4**
%																				

Station #			**29**	**30**	**31**	**32**	**34**	**36**	**37**	**38**	**40**	**41**	**42**	**43**	**45**				
TEOM (ng/g)			**4463**	**3701**	**1180**	**8753**	**8349**	**8825**	**23446**	**10583**	**2396**	**10283**	**14010**	**44747**	**2515**	**Min**	**Max**	**Avg**	**SD**
Compound (ng/g)	**Composition**	**M.W.**																	
n-Alkanes																			
Pentadecane	$C_{15}H_{32}$	212	0.2	0.2	0.0	1.9	0.5	0.4	2.0	0.0	0.5	0.4	1.7	7.4	0.7				
Hexadecane	$C_{16}H_{34}$	226	2.1	5.1	0.9	6.6	2.1	18.9	14.0	0.0	1.9	1.7	7.5	29.0	1.8				
Heptadecane	$C_{17}H_{36}$	240	11.2	18.9	27.6	36.8	10.0	383.8	56.3	0.0	20.6	7.2	21.0	120.8	10.4				
Pristane	$C_{19}H_{40\,(Pr)}$	268	1.3	0.5	0.8	1.3	0.7	6.6	1.6	0.0	0.8	0.8	1.1	8.2	0.4				

Octadecane	$C_{18}H_{38}$	256	18.7	24.4	6.7	17.1	5.4	207.2	29.2	0.0	15.0	8.1	19.1	70.7	6.5				
Phytane	$C_{20}H_{42(Ph)'}$	282	4.8	2.4	2.0	1.9	0.7	95.5	13.9	0.0	3.2	2.4	7.7	68.6	3.0				
Nonadecane	$C_{19}H_{40}$	268	4.9	3.1	5.4	2.0	2.7	95.7	9.3	0.0	23.2	2.9	1.9	11.8	0.0				
Eicosane	$C_{20}H_{42}$	282	22.6	22.6	8.6	30.5	12.3	33.2	46.7	0.0	16.0	19.3	15.2	78.2	5.7				
Heneicosane	$C_{21}H_{44}$	296	10.5	10.4	5.7	16.6	5.5	188.7	12.2	0.0	13.8	5.5	7.2	218.9	5.4				
Docosane	$C_{22}H_{46}$	310	13.4	14.5	7.3	20.9	7.8	183.8	11.3	0.0	8.5	8.2	11.1	36.0	5.1				
Tricosane	$C_{23}H_{48}$	324	12.0	11.4	11.0	18.4	8.4	162.5	9.1	0.0	8.5	7.2	9.9	42.1	6.7				
Tetracosane	$C_{24}H_{50}$	338	11.3	11.7	5.6	15.9	10.9	151.6	7.1	0.0	7.5	7.3	6.9	27.2	6.4				
Pentacosane	$C_{25}H_{52}$	352	11.7	9.6	15.5	13.6	11.2	432.4	28.1	0.0	11.0	7.0	5.8	191.3	10.9				
Hexacosane	$C_{26}H_{54}$	366	8.0	8.2	3.7	10.0	11.6	92.3	4.9	0.0	6.0	5.7	5.0	18.2	7.2				
Heptacosane	$C_{27}H_{56}$	380	10.4	13.0	15.9	9.1	10.5	103.0	9.2	0.0	9.6	5.6	10.3	63.0	11.3				
Octacosane	$C_{28}H_{58}$	394	5.7	6.6	2.5	6.2	7.7	46.6	4.1	0.0	3.9	3.5	3.0	10.4	4.4				
Nonacosane	$C_{29}H_{60}$	408	6.8	10.9	7.0	5.7	5.9	68.1	8.4	0.0	7.3	3.2	5.5	26.8	7.6				
Triacontane	$C_{30}H_{62}$	422	2.9	3.8	1.2	3.5	3.1	16.6	1.7	0.0	2.7	2.1	1.1	4.4	2.3				
Hentriacontane	$C_{31}H_{64}$	436	5.2	10.4	5.3	3.4	2.8	41.6	9.4	0.0	8.4	1.0	3.0	10.8	5.0				
Dotriacontane	$C_{32}H_{66}$	450	0.9	1.5	0.3	0.7	0.9	9.7	1.1	0.0	1.0	0.5	0.3	1.6	0.6				
Tritriacontane	$C_{33}H_{68}$	464	2.5	3.2	2.3	0.1	0.4	0.0	4.2	0.0	2.5	0.2	0.0	2.7	1.7				
Tetratriacontane	$C_{34}H_{70}$	478	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
Pentatriacontane	$C_{35}H_{72}$	492	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
Hexatriacontane	$C_{36}H_{74}$	506	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
Heptatriacontane	$C_{37}H_{76}$	520	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
Total			**167.1**	192.0	135.4	222.2	121.3	2338.2	283.9	0.0	171.8	100.0	144.3	1048.2	102.8	0.0	2338.2	302.6	446.7
CPI(o/e)			**0.9**	0.9	2.6	1.0	0.9	1.9	1.2	0.0	1.7	0.7	1.0	2.5	1.5	0.0	2.7	1.2	0.6
LMW/HMW			**2.0**	1.8	1.5	3.1	1.2	1.8	2.7	0.0	2.2	2.3	3.0	1.9	0.9	0.0	4.2	2.0	0.9
TAR			**0.9**	1.2	0.8	0.3	1.1	0.3	0.4	0.0	0.5	0.6	0.6	0.3	1.5	0.0	3.0	0.8	0.6
Wax n-alkanes																			
Total			**11.4**	21.4	24.7	3.4	2.2	98.5	21.8	0.0	17.3	1.1	12.0	77.8	14.7	0.0	137.7	25.3	36.5
%			**0.1**	0.1	0.2	0.0	0.0	0.0	0.1	0.0	0.1	0.0	0.1	0.1	0.1	0.0	0.3	0.1	0.1
Algal n-Alkanes																			
Total			**16.4**	17.8	35.0	45.4	15.0	555.6	58.2	0.0	49.6	11.2	18.5	309.1	12.4	0.0	555.6	58.6	109.9
%			**0.1**	0.1	0.3	0.2	0.1	0.2	0.2	0.0	0.3	0.1	0.1	0.3	0.1	0.0	0.3	0.2	0.1
Bacterial n-Alkanes																			
Total			**43.5**	52.1	16.2	54.2	19.8	259.3	89.9	0.0	32.9	29.1	41.9	177.9	14.0	0.0	259.3	51.3	55.6
%			**0.3**	0.3	0.1	0.2	0.2	0.1	0.3	0.0	0.2	0.3	0.3	0.2	0.1	0.0	0.3	0.2	0.1

Petroleum n-alkanes			**95.9**	100.8	59.5	119.2	84.3	1424.8	113.9	0.0	72.0	58.6	71.9	483.5	61.7	0.0	1424.8	167.4	264.0
%			**0.6**	0.5	0.4	0.5	0.7	0.6	0.4	0.0	0.4	0.6	0.5	0.5	0.6	0.0	0.7	0.5	0.1
																		0.8	
Hopanes																			
Trisnorneohopane	$C_{27}H_{46}$	370	2.0	0.0	0.8	5.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	41.6	0.0				
17a(H)-Trisnorhopane	$C_{27}H_{46}$	370	4.5	0.0	0.7	5.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	45.7	0.0				
17a(H),21b(H)-Norhopane	$C_{29}H_{50}$	398	6.9	0.0	1.7	18.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	211.9	0.0				
17a(H),21b(H)-Hopane	$C_{30}H_{52}$	412	4.0	0.0	2.1	11.8	0.0	0.0	0.0	0.0	0.0	0.0	0.0	132.9	0.0				
17a(H),21b(H)-22S-Homohopane	$C_{31}H_{54}$	426	1.9	0.0	0.7	4.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	71.1	0.0				
17a(H),21b(H)-22R-Homohopane	$C_{31}H_{54}$	426	1.6	0.0	0.1	3.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	37.5	0.0				
Gammacerane	$C_{30}H_{52}$	412	0.1	0.0	0.1	0.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	22.1	0.0				
17a(H),21b(H)-22S-Bishomohopane	$C_{32}H_{56}$	440	0.7	0.0	1.1	2.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	62.5	0.0				
17a(H),21b(H)-22R-Bishomohopane	$C_{32}H_{56}$	440	0.2	0.0	0.5	1.2	0.0	0.0	0.0	0.0	0.0	0.0	0.0	41.2	0.0				
17a(H),21b(H)-22S-Trishomohopane	$C_{33}H_{58}$	454	0.0	0.0	0.0	0.9	0.0	0.0	0.0	0.0	0.0	0.0	0.0	15.5	0.0				
17a(H),21b(H)-22R-Trishomohopane	$C_{33}H_{58}$	454	0.0	0.0	0.0	0.3	0.0	0.0	0.0	0.0	0.0	0.0	0.0	10.5	0.0				
17a(H),21b(H)-22S-Tetrakishomohopane	$C_{34}H_{60}$	468	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	14.2	0.0				
17a(H),21b(H)-22R-Tetrakishomohopane	$C_{34}H_{60}$	468	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	17.0	0.0				
17a(H),21b(H)-22S-Pentakishomohopane	$C_{35}H_{62}$	482	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	5.8	0.0				
17a(H),21b(H)-22R-Pentakishomohopane	$C_{35}H_{62}$	482	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	6.7	0.0				
Total			**21.8**	0.0	7.7	54.1	0.0	0.0	0.0	0.0	0.0	0.0	0.0	736.3	0.0	0.0	736.3	29.8	132.3
C_{31} S/(R+S)			0.6	ND	0.8	0.6	ND	ND	ND	ND	ND	ND	ND	0.7	ND	0.6	0.8	0.7	0.1
C_{32} S/(R+S)			0.8	ND	0.7	0.7	ND	ND	ND	ND	ND	ND	ND	0.6	ND	0.6	1.0	0.7	0.1
Steranes																			
13b,17a-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
13b,17a-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
13a,17b-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
13a,17b-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14a,17ba-20S-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20R-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20S-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14a,17ba-20R-Cholestane	$C_{27}H_{48}$	372	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14a,17ba-20S-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20R-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20S-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				

14a,17ba-20R-Ergostane	$C_{28}H_{50}$	386	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14a,17ba-20S-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20R-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14b,17b-20S-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
14a,17ba-20R-Stigmastane	$C_{29}H_{52}$	400	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
Total			**0.0**	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				
PAHs																			
Phenanthrene	$C_{14}H_{10}$	178	0.0	0.1	0.0	0.4	0.0	0.0	0.0	0.0	0.1	0.2	0.1	5.8	0.0				
Anthracene	$C_{14}H_{10}$	178	2.8	0.6	0.0	8.0	0.0	0.0	0.0	0.0	0.6	7.0	2.1	20.6	0.0				
Benzo[k]fluoranthene	$C_{20}H_{12}$	252	20.1	22.2	0.0	30.6	15.0	15.0	110.2	32.8	0.0	35.0	40.6	313.2	0.0				
Benzo[b]fluoranthene	$C_{20}H_{12}$	252	14.0	15.1	0.0	21.2	9.3	10.4	66.0	21.7	0.0	19.4	23.9	205.7	0.0				
Total			**36.9**	37.9	0.0	60.3	24.4	25.4	176.2	54.5	0.6	61.5	66.8	545.4	0.0	0.0	545.4	54.5	96.8
Ant/(Ant+Phe)			1.0	0.9	0.0	0.9	0.0	0.0	0.0	0.0	0.9	1.0	1.0	0.8	0.0	0.0	1.0	0.7	0.4
Methyl n-Alkanoates																			
Methyl hexadecanoate	$C_{17}H_{34}O_2$	270	73.2	42.2	27.8	65.6	64.3	80.3	114.9	58.2	44.1	60.7	78.5	147.7	50.0				
Methyl octadecenoate	$C_{19}H_{38}O_2$	298	6.1	3.3	1.2	8.0	13.6	22.3	15.3	5.1	8.7	8.1	9.7	11.6	4.7				
Total			**79.3**	45.5	29.1	73.6	77.9	102.6	130.2	63.3	52.8	68.8	88.1	159.3	54.7				
Total FA																			
Nonanoic acid	$C_9H_{18}O_2$	158	12.7	1.8	13.7	6.9	45.5	2.3	85.7	26.1	0.0	23.7	8.9	79.4	37.6				
Decanoic acid	$C_{10}H_{20}O_2$	172	4.4	0.6	4.7	2.5	19.8	1.1	44.4	11.1	0.0	9.1	3.0	38.4	14.4				
Undecanoic acid	$C_{11}H_{22}O2$	186	1.9	0.1	2.7	1.0	9.7	0.0	25.0	5.4	0.0	4.1	0.8	18.3	7.1				
Dodecanoic acid	$C_{12}H_{24}O_2$	200	4.3	1.2	5.5	1.8	21.2	0.1	56.5	11.6	0.0	8.8	1.6	38.0	13.2				
Tridecanoic acid	$C_{13}H_{26}O_2$	214	2.7	1.5	2.8	1.7	10.2	0.1	30.8	6.3	0.0	5.0	2.2	19.5	5.6				
Tetradecanoic acid	$C_{14}H_{28}O_2$	228	10.7	2.2	15.1	4.6	59.0	3.0	150.2	32.2	0.2	28.4	3.4	85.4	28.9				
Pentadecanoic acid	$C_{15}H_{30}O_2$	242	6.3	1.7	9.5	2.0	36.7	0.1	93.6	20.2	0.1	17.3	1.1	44.1	17.1				
Hexadecanoic acid	$C_{16}H_{32}O_2$	256	201.3	61.8	236.3	97.2	712.2	88.3	1434.9	425.4	47.3	369.2	100.9	756.2	375.0				
Heptadecanoic acid	$C_{17}H_{34}O_2$	270	2.5	0.1	3.4	0.4	12.5	0.3	34.8	8.0	0.1	6.6	0.2	15.9	5.4				
Octadecanoic acid	$C_{18}H_{36}O_2$	284	91.2	14.3	145.8	25.7	484.5	26.4	969.2	260.3	10.3	211.5	22.3	395.0	241.5				
Nonadecanoic acid	$C_{19}H_{38}O_2$	298	0.2	0.1	1.7	0.3	0.2	0.7	4.2	0.6	0.7	0.4	0.1	8.7	1.7				
Eicosanoic acid	$C_{20}H_{40}O_2$	312	0.4	0.1	1.1	0.4	3.9	0.1	13.9	2.3	0.0	1.7	0.2	5.1	1.5				
Total			**338.6**	85.5	442.1	144.4	1415.4	122.4	2943.1	809.5	58.6	685.9	144.6	1504.0	749.0	43.3	2973.2	745.8	799.6
CPI(e/o)			11.9	15.0	12.1	10.8	11.3	33.5	9.7	11.1	66.8	11.0	9.8	7.1	9.1	4.3	66.8	15.3	13.5
Wax FA			**0.0**	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0				

Algal FA																		
Total			**312.4**	80.2	408.4	132.2	1300.6	118.9	2669.1	742.9	57.7	628.7	131.2	1318.2	674.5	42.6	2726.3	677.5	726.6
%			0.9	0.9	0.9	0.9	0.9	1.0	0.9	0.9	1.0	0.9	0.9	0.9	0.9	0.8	1.0	0.9	0.0
Microbial FA																		
Total			**26.2**	5.4	33.7	12.2	114.7	3.5	274.1	66.7	0.9	57.2	13.4	185.8	74.5	0.7	274.1	68.3	76.0
%			0.1	0.1	0.1	0.1	0.1	0.0	0.1	0.1	0.0	0.1	0.1	0.1	0.1	0.0	0.2	0.1	0.0
n-Alkanols																		
Methyl unodcanoate	$C_{12}H_{26}O$	214	18.2	17.2	2.0	7.8	22.6	11.4	841.4	9.0	10.6	5.1	20.4	188.2	8.0			
Dodecanol	$C_{13}H_{28}O$	228	3.9	4.5	0.0	3.0	1.9	1.0	181.0	2.4	0.0	0.6	5.4	64.6	1.5			
Tetradecanol	$C_{14}H_{30}O$	242	14.3	13.9	2.8	18.9	9.6	12.9	511.7	9.3	12.3	5.8	14.5	197.6	10.4			
Pentadecanol	$C_{15}H_{32}O$	256	5.5	8.1	2.7	20.4	6.5	10.6	358.0	8.8	7.7	5.3	8.1	279.2	9.5			
Hexadecanol	$C_{16}H_{34}O$	242	29.5	19.6	10.6	59.5	17.5	54.7	698.7	22.2	28.3	19.5	32.2	505.6	29.2			
Heptadecanol	$C_{17}H_{36}O$	256	3.5	4.2	1.4	11.4	2.8	4.6	155.4	4.7	3.8	4.8	4.1	186.8	4.2			
Octadecanol	$C_{18}H_{38}O$	270	26.5	45.1	9.6	24.8	18.9	28.7	614.5	33.9	18.8	25.9	25.1	428.9	13.4			
Nonadecanol	$C_{19}H_{40}O$	284	0.1	1.8	0.0	0.5	0.9	0.6	101.9	0.7	0.4	1.8	1.7	15.1	0.2			
Eicosanol	$C_{20}H_{42}O$	298	3.6	10.2	5.4	3.0	3.5	3.3	78.0	3.7	5.0	2.8	1.5	204.8	5.9			
Heneicosanol	$C_{21}H_{44}O$	308	0.6	3.0	4.4	1.9	3.2	1.1	71.8	3.5	4.8	2.3	2.7	38.0	8.2			
Docosanol	$C_{22}H_{46}O$	326	22.3	82.0	2.9	12.2	2.9	9.2	725.6	18.5	37.2	9.7	18.7	352.7	3.7			
Triacosanol	$C_{23}H_{48}O$	340	2.3	4.1	0.8	3.7	0.0	0.0	43.2	0.1	2.3	0.0	0.2	55.6	0.0			
Tetracosanol	$C_{24}H_{50}O$	354	11.4	12.9	4.2	21.9	4.3	15.0	1011.3	0.3	14.8	18.4	4.9	65.6	1.7			
Pentacosanol	$C_{25}H_{52}O$	368	0.0	0.0	0.0	0.2	0.0	0.0	12.6	0.0	0.3	0.0	0.0	25.4	0.0			
Hexacosanol	$C_{26}H_{54}O$	382	2.2	6.8	2.7	2.9	0.0	0.3	59.8	0.6	7.9	0.0	1.9	126.6	0.5			
Heptacosanol	$C_{27}H_{56}O$	396	0.0	0.3	0.0	0.0	0.0	0.0	4.0	0.0	0.7	0.0	0.0	16.9	0.0			
Octacosanol	$C_{28}H_{58}O$	410	5.5	12.5	7.0	4.1	0.5	3.6	138.7	1.6	13.5	1.1	3.0	223.5	0.4			
Total			**149.2**	246.1	56.5	196.1	95.3	156.9	5607.5	119.4	168.3	103.4	144.3	2975.3	97.0	27.2	5607.5	457.4	1085.6
CPI(e/o)			7.3	7.8	4.9	3.6	3.7	7.1	4.1	4.5	6.9	5.6	4.6	3.1	2.8	0.5	24.8	6.2	4.8
Wax inputs																		
Total			**41.3**	114.1	16.8	41.2	7.7	28.0	1935.3	21.1	73.3	29.3	28.4	768.4	6.4	0.0	1935.3	129.1	362.6
%			0.3	0.5	0.3	0.2	0.1	0.2	0.3	0.2	0.4	0.3	0.2	0.3	0.1	0.0	0.5	0.2	0.1
Algal inputs																		
Total			**92.0**	106.0	30.4	113.9	72.2	111.0	2744.2	78.1	74.9	59.2	93.7	1525.1	66.9	9.3	2744.2	247.8	532.6
%			0.6	0.4	0.5	0.6	0.8	0.7	0.5	0.7	0.4	0.6	0.6	0.5	0.7	0.3	0.8	0.6	0.1

Terr/Aqutic			0.4	1.1	0.6	0.4	0.1	0.3	0.7	0.3	1.0	0.5	0.3	0.5	0.1	0.0	1.1	0.4	0.3
Microbal inputs																			
Total			**13.0**	18.6	4.0	35.3	12.1	16.8	796.3	16.6	11.9	12.6	19.3	545.8	15.5	0.0	796.3	66.4	165.7
%			0.1	0.1	0.1	0.2	0.1	0.1	0.1	0.1	0.1	0.1	0.1	0.2	0.2	0.0	0.2	0.1	0.1
Plasticizers/Antioxidants																			
Diethyl phthalate	$C_{12}H_{14}O_4$	222	5.2	2.4	2.8	5.2	1.8	4.2	11.1	5.6	2.6	18.8	7.0	22.7	3.8				
Di-isobutyl phthalate	$C_{16}H_{22}O_4$	278	65.5	43.5	13.9	61.6	28.9	45.1	109.6	48.3	33.6	196.2	56.8	146.4	31.3				
Dibutyl phthalate	$C_{16}H_{22}O_4$	278	65.2	70.0	17.9	77.9	76.0	96.2	698.7	59.3	25.9	167.6	99.5	505.6	67.9				
Di(2-ethylhexyl) phthalate (DEHP)	$C_{24}H_{38}O_4$	390	2.3	3.1	0.3	1.9	1.7	1.3	3.3	1.8	74.9	8.1	5.0	15.4	1.2				
Total			**138.2**	119.0	34.9	146.6	108.4	146.8	822.7	115.0	137.0	390.8	168.3	690.1	104.3	34.9	822.7	185.3	169.9

Alwajh Lagoon

Concentration in ng/g

			Station #												
Compound	**Composition**	**M.W.**	**14**	**21**	**48**	**60**	**72**	**79**	**87**	**98**	**100**	**104**	**116**	**128**	**129**
n-Alkanes															
Tetradecane	$C_{14}H_{30}$	198	0.6	0.4	0.1	0.2	0.1	0.4	0.0	0.1	0.2	0.2	0.1	0.1	0.5
Pentadecane	$C_{15}H_{32}$	212	2.5	0.7	0.1	0.5	0.3	1.4	0.1	0.4	0.7	0.7	0.4	0.3	1.0
Hexadecane	$C_{16}H_{34}$	226	32.8	9.4	1.4	6.8	4.3	16.8	3.9	7.8	8.3	9.2	7.4	6.3	12.6
Heptadecane	$C_{17}H_{36}$	240	16.3	4.3	0.6	3.1	2.3	6.6	2.3	4.3	3.6	4.4	5.1	3.3	4.8
Pristane	$C_{19}H_{40\,(Pr)}$	268	1.1	0.3	0.0	0.3	0.1	0.2	0.0	0.5	0.1	0.4	0.5	0.1	0.2
Octadecane	$C_{18}H_{38}$	256	45.3	13.6	2.0	8.3	7.9	23.3	9.0	11.4	10.4	11.3	12.2	11.5	14.9
Phytanes	$C_{20}H_{42(Ph)}$	282	7.4	1.9	0.2	0.7	0.7	2.2	0.8	0.9	1.0	1.0	1.4	1.0	1.1
Nonadecane	$C_{19}H_{40}$	268	18.6	4.3	0.5	2.4	2.2	4.4	1.9	3.3	3.3	3.2	3.9	3.2	4.0
Eicosane	$C_{20}H_{42}$	282	39.1	11.1	1.8	7.0	7.5	20.1	8.6	9.9	9.1	9.1	10.5	11.0	13.4
Heneicosane	$C_{21}H_{44}$	296	35.4	7.2	1.2	4.2	0.2	1.8	3.6	0.2	0.4	0.2	5.2	0.4	8.4
Docosane	$C_{22}H_{46}$	310	24.3	5.4	0.8	2.3	1.9	5.8	1.8	2.2	2.2	2.3	2.2	2.8	1.6
Tricosane	$C_{23}H_{48}$	324	21.0	4.5	0.7	2.6	2.6	5.9	3.0	3.8	3.3	3.6	4.0	2.4	5.1
Tetracosane	$C_{24}H_{50}$	338	12.8	4.9	0.4	1.4	1.7	5.1	1.9	2.1	2.1	2.0	2.4	2.3	3.1
Pentacosane	$C_{25}H_{52}$	352	5.0	0.5	0.1	0.2	0.2	1.0	0.2	0.3	0.3	0.3	0.3	0.4	0.5
Hexacosane	$C_{26}H_{54}$	366	7.1	1.8	0.2	0.9	1.0	3.2	1.1	1.3	1.1	1.2	1.4	1.3	1.8
Heptacosane	$C_{27}H_{56}$	380	1.6	0.5	0.1	0.1	0.2	0.9	0.3	0.2	0.3	0.4	0.3	0.2	0.5
Octacosane	$C_{28}H_{58}$	394	2.6	0.1	0.1	0.3	0.4	1.4	0.4	0.5	0.4	0.5	0.5	0.4	0.8
Nonacosane	$C_{29}H_{60}$	408	1.5	0.2	0.0	0.0	0.1	0.5	0.0	0.3	0.2	0.1	0.1	0.0	0.2

Triacontane	$C_{30}H_{62}$	422	1.2	0.7	0.1	0.2	0.2	0.9	0.3	0.3	0.3	0.3	0.3	0.3	0.5
Hentriacontane	$C_{31}H_{64}$	436	1.6	0.1	0.1	0.3	0.3	1.4	0.3	0.4	0.3	0.5	0.4	0.4	0.8
Dotriacontane	$C_{32}H_{66}$	450	0.1	0.0	0.0	0.0	0.0	0.3	0.0	0.1	0.1	0.2	0.1	0.1	0.2
Tritriacontane	$C_{33}H_{68}$	464	0.2	0.0	0.0	0.1	0.0	0.4	0.0	0.1	0.1	0.1	0.0	0.1	0.1
Total			**278.2**	**71.7**	**10.5**	**42.0**	**34.2**	**104.0**	**39.7**	**50.2**	**47.7**	**51.2**	**59.0**	**48.0**	**76.2**
CPI(o/e)			**0.6**	**0.5**	**0.5**	**0.5**	**0.3**	**0.3**	**0.4**	**0.4**	**0.4**	**0.4**	**0.5**	**0.3**	**0.5**
LMW/HMW			**11.7**	**16.7**	**14.9**	**17.1**	**12.1**	**9.1**	**12.9**	**13.3**	**13.7**	**12.8**	**15.3**	**13.4**	**12.2**
TAR			**0.11**	**0.06**	**0.07**	**0.06**	**0.12**	**0.21**	**0.08**	**0.10**	**0.10**	**0.11**	**0.06**	**0.11**	**0.09**
Wax n-alkanes															
Total			**4.2**	**0.8**	**0.1**	**0.5**	**0.6**	**2.5**	**0.5**	**0.7**	**0.6**	**0.7**	**0.6**	**0.4**	**1.1**
%			**1.5%**	**1.1%**	**1.1%**	**1.1%**	**1.7%**	**2.4%**	**1.3%**	**1.4%**	**1.2%**	**1.4%**	**1.1%**	**0.8%**	**1.4%**
Algal n-Alkanes															
Total			**72.8**	**16.5**	**2.4**	**10.2**	**4.9**	**14.1**	**7.9**	**8.2**	**8.0**	**8.5**	**14.7**	**7.2**	**18.3**
%			**26%**	**23%**	**23%**	**24%**	**14%**	**14%**	**20%**	**16%**	**17%**	**17%**	**25%**	**15%**	**24%**
Bacterial n-Alkanes															
Total			**95.9**	**28.5**	**4.5**	**18.4**	**17.0**	**51.9**	**18.7**	**24.2**	**23.3**	**24.4**	**24.1**	**24.9**	**35.0**
%			**34.5%**	**39.7%**	**42.7%**	**43.8%**	**49.7%**	**49.9%**	**47.3%**	**48.1%**	**48.9%**	**47.7%**	**40.9%**	**51.9%**	**45.9%**
Petroleum n-alkanes			**105.3**	**26.0**	**3.5**	**13.0**	**11.8**	**35.4**	**12.5**	**17.2**	**15.8**	**17.6**	**19.5**	**15.5**	**21.9**
%			**37.8%**	**36.3%**	**32.9%**	**30.9%**	**34.4%**	**34.1%**	**31.5%**	**34.2%**	**33.2%**	**34.3%**	**33.1%**	**32.2%**	**28.7%**
Hopanes															
Trisnorneohopane	$C_{27}H_{46}$	370	0.54	0.14	T	T	T	T	T	T	0.09	0.04	0.00	0.01	0.51
17a(H)-Trisnorhopane	$C_{27}H_{46}$	370	0.91	0.03	T	T	T	T	T	T	0.06	0.05	0.00	0.01	0.43
17a(H),21b(H)-Norhopane	$C_{29}H_{50}$	398	2.22	0.30	T	T	T	T	T	T	0.37	0.15	0.02	0.04	2.51
17a(H),21b(H)-Hopane	$C_{30}H_{52}$	412	1.90	0.33	T	T	T	T	T	T	0.33	0.16	0.02	0.05	2.63
17a(H),21b(H)-22S-Homohopane	$C_{31}H_{54}$	426	0.70	0.12	T	T	T	T	T	T	0.14	0.06	0.00	0.01	0.93
17a(H),21b(H)-22R-Homohopane	$C_{31}H_{54}$	426	0.52	0.07	T	T	T	T	T	T	0.08	0.03	0.00	0.01	0.66
Gammacerane	$C_{30}H_{52}$	412	0.07	0.01	T	T	T	T	T	T	0.01	0.02	0.00	0.00	0.08
17a(H),21b(H)-22S-Bishomohopane	$C_{32}H_{56}$	440	0.58	0.10	T	T	T	T	T	T	0.08	0.04	0.00	0.01	0.79
17a(H),21b(H)-22R-Bishomohopane	$C_{32}H_{56}$	440	0.23	0.05	T	T	T	T	T	T	0.06	0.03	0.00	0.00	0.31
17a(H),21b(H)-22S-Trishomohopane	$C_{33}H_{58}$	454	0.31	0.03	T	T	T	T	T	T	0.05	T	T	T	0.32
17a(H),21b(H)-22R-Trishomohopane	$C_{33}H_{58}$	454	0.22	0.01	T	T	T	T	T	T	0.03	T	T	T	0.20
17a(H),21b(H)-22S-Tetrakishomohopane	$C_{34}H_{60}$	468	0.13	0.00	T	T	T	T	T	T	0.03	T	0.22	0.00	0.04

17a(H),21b(H)-22R-Tetrakishomohopane	$C_{34}H_{60}$	468	0.03	0.00	T	T	T	T	T	T	0.02	T	T	T	0.03
17a(H),21b(H)-22S-Pentakishomohopane	$C_{35}H_{62}$	482	0.00	0.00	T	T	T	T	T	T	0.00	T	T	T	T
17a(H),21b(H)-22R-Pentakishomohopane	$C_{35}H_{62}$	482	0.00	0.00	T	T	T	T	T	T	0.00	T	T	T	T
Total			**8.34**	**1.19**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**1.35**	**0.58**	**0.26**	**0.13**	**9.47**
C_{31} S/(R+S)			0.57	0.62	ND	ND	ND	ND	ND	ND	0.64	0.63	0.46	0.58	0.59
C_{32} S/(R+S)			0.71	0.69	ND	ND	ND	ND	ND	ND	0.58	0.54	0.58	0.66	0.72
Steranes															
13b,17a-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
13b,17a-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
13a,17b-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
13a,17b-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T	T	T
Total															
PAHs															
Phenanthrene	$C_{14}H_{10}$	178	17.1	2.3	1.1	0.4	0.9	1.0	1.8	8.9	1.1	0.0	1.0	2.6	3.1
Anthracene	$C_{14}H_{10}$	178	20.9	2.4	0.9	0.2	1.6	0.2	1.4	6.7	1.5	0.0	1.5	5.4	6.6
Benzo[k]fluoranthene	$C_{20}H_{12}$	252	T	T	T	0.1	T	0.2	T	T	0.6	T	T	0.7	0.5
Benzo[b]fluoranthene	$C_{20}H_{12}$	252	T	T	T	0.0	T	0.0	T	T	0.3	T	T	0.3	0.4
Total			**38.0**	**4.7**	**2.0**	**0.8**	**2.5**	**1.4**	**3.2**	**15.6**	**3.5**	**0.0**	**2.5**	**8.9**	**10.6**
Ant/(Ant+Phe)			0.6	0.5	0.5	0.4	0.7	0.2	0.4	0.4	0.6	0.0	0.6	0.7	0.7

Methyl alkanoates															
Methyl octanoate	$C_9H_{18}O_2$	158	2.12	0.02	0.05	0.03	0.05	0.00	0.03	0.13	0.00	0.00	0.07	0.03	0.02
Methyl nonanoate	$C_{10}H_{20}O_2$	172	1.35	0.05	0.09	0.04	0.05	0.02	0.03	0.21	0.00	0.00	0.07	0.06	0.06
Methyl decanoate	$C_{11}H_{22}O_2$	186	0.41	0.02	0.04	0.02	0.02	0.02	0.01	0.08	0.00	0.00	0.02	0.04	0.02
Methyl unodcanoate	$C_{12}H_{24}O_2$	200	0.59	0.03	0.04	0.03	0.03	0.04	0.01	0.12	0.01	0.00	0.03	0.06	0.04
Methyl dodecanoate	$C_{13}H_{26}O_2$	214	1.43	0.12	0.10	0.09	0.07	0.51	0.05	0.49	0.06	0.01	0.13	0.10	0.09
Methyl tridecanoate	$C_{14}H_{28}O_2$	228	1.34	0.22	0.10	0.13	0.10	0.49	0.11	0.60	0.09	0.02	0.07	0.18	0.31
Methyl tetradecanoate	$C_{15}H_{30}O_2$	242	4.79	0.63	0.34	0.44	0.30	1.33	0.39	2.18	0.34	0.07	0.50	0.65	0.71
Methyl pentadecanoate	$C_{16}H_{32}O_2$	256	2.68	0.27	0.19	0.29	0.20	0.58	0.23	1.18	0.13	0.03	0.27	0.30	0.29
Methyl hexadecenoate	$C_{17}H_{32}O_2$	268	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.01	0.01
Methyl hexadecanoate	$C_{17}H_{34}O_2$	270	74.76	14.64	4.81	7.35	5.83	30.48	7.32	34.26	6.51	1.37	7.83	12.14	19.34
Methyl heptadecenoate	$C_{18}H_{34}O_2$	282	1.09	0.10	0.11	0.10	0.07	0.33	0.15	0.54	0.04	0.01	0.10	0.12	0.21
Methyl octadecanoate	$C_{19}H_{36}O_2$	296	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.01	0.00
Methyl octadecenoate	$C_{19}H_{38}O_2$	298	43.08	5.46	5.98	5.54	3.83	8.96	6.00	27.80	2.47	0.52	3.73	4.56	3.86
Methyl nonadecanoate	$C_{20}H_{40}O_2$	312	3.32	0.04	0.04	0.05	0.04	0.16	0.05	0.23	0.06	0.01	0.05	0.12	0.32
Total			**136.95**	**21.52**	**11.71**	**14.04**	**10.48**	**42.89**	**14.31**	**67.43**	**9.72**	**2.04**	**12.71**	**18.25**	**25.19**
CPI(e/o)															
Total FA															
Pentanoic acid	$C_5H_{10}O_2$	102	0.01	0.01	0.00	0.00	0.00	1.55	0.16	0.05	0.21	0.00	0.02	0.43	1.60
Hexanoic acid	$C_6H_{12}O_2$	116	0.05	0.04	0.00	0.00	0.00	5.26	0.60	0.07	0.78	0.00	0.01	2.24	4.23
Heptanoic acid	$C_7H_{14}O_2$	130	0.12	0.45	0.00	0.00	0.00	4.59	0.56	0.16	0.87	0.00	0.01	2.53	3.63
Octanoic acid	$C_8H_{16}O_2$	144	0.31	0.70	0.00	0.00	0.00	11.90	1.17	0.39	2.18	0.00	0.06	6.61	9.29
Nonanoic acid	$C_9H_{18}O_2$	158	3.36	1.46	0.05	0.03	0.05	16.42	1.92	0.76	3.97	0.00	0.24	9.03	11.95
Dodanoic acid	$C_{10}H_{20}O_2$	172	3.25	2.63	0.09	0.04	0.05	4.82	0.62	0.53	1.40	0.00	0.17	2.98	3.36
Undecanoic acid	$C_{11}H_{22}O_2$	186	1.45	0.71	0.04	0.02	0.02	2.81	0.32	0.22	0.84	0.00	0.07	1.61	1.73
Dodecanoic acid	$C_{12}H_{24}O_2$	200	0.93	0.32	0.04	0.03	0.03	4.38	0.53	0.37	1.32	0.00	0.04	2.64	2.50
Tridecanoic acid	$C_{13}H_{26}O_2$	214	2.25	0.62	0.10	0.09	0.07	2.55	0.34	1.55	0.76	0.01	0.22	1.41	1.37
Tetradecanoic acid	$C_{14}H_{28}O_2$	228	5.02	5.46	0.10	0.13	0.10	7.88	1.05	1.01	2.16	0.02	0.54	4.73	4.65
Pentadecanoic acid	$C_{15}H_{30}O_2$	242	8.67	6.33	0.34	0.44	0.30	5.45	0.78	2.45	1.42	0.07	0.59	3.27	2.91
Hexadecenoic acid	$C_{16}H_{30}O_2$	254	2.91	0.32	0.19	0.29	0.20	0.89	0.24	1.20	0.14	0.03	0.28	0.30	0.38
Hexadecanoic acid	$C_{16}H_{32}O_2$	256	7.76	0.86	0.00	0.00	0.00	55.77	8.38	3.52	20.36	0.00	1.24	39.92	39.00
Heptadecanoic acid	$C_{17}H_{34}O_2$	270	75.55	24.47	4.81	7.35	5.83	31.75	7.41	34.33	6.83	1.37	7.85	13.14	19.35

Octadecenoic acid	$C_{18}H_{34}O_2$	282	3.17	0.30	0.11	0.10	0.07	0.37	0.15	0.54	0.04	0.01	0.10	0.15	21.00
Octadecanoic acid	$C_{18}H_{36}O_2$	284	5.90	0.80	0.00	0.00	0.00	36.77	2.81	1.49	9.61	0.00	0.37	25.47	0.17
Nonadecanoic acid	$C_{19}H_{38}O_2$	298	43.08	5.51	5.98	5.54	3.83	10.57	6.24	27.92	2.56	0.52	3.73	5.17	3.97
Eicosanoic acid	$C_{20}H_{40}O_2$	312	3.32	0.59	0.04	0.05	0.04	0.54	0.05	0.36	0.06	0.01	0.05	0.95	0.32
Heneicosanoic acid	$C_{21}H_{42}O_2$	326	136.95	21.66	11.71	14.04	10.48	43.10	14.31	67.43	9.72	2.04	12.71	18.25	25.19
Total			**304.03**	**73.25**	**23.60**	**28.15**	**21.08**	**247.37**	**47.63**	**144.37**	**65.22**	**4.08**	**28.30**	**140.82**	**156.61**
CPI(e/o)			**0.10**	**0.19**	**0.01**	**0.01**	**0.01**	**1.07**	**0.47**	**0.06**	**1.39**	**0.01**	**0.10**	**1.56**	**0.89**
Wax FA			**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
Algal FA															
Total			**32.6**	**12.0**	**0.6**	**0.6**	**0.5**	**128.6**	**15.6**	**9.5**	**38.1**	**0.1**	**2.9**	**86.0**	**84.9**
%			**10.7%**	**16.4%**	**2.4%**	**2.3%**	**2.3%**	**52.0%**	**32.7%**	**6.6%**	**58.3%**	**1.7%**	**10.1%**	**61.1%**	**54.2%**
Microbial FA															
Total			**134.35**	**39.10**	**11.31**	**13.47**	**10.10**	**69.55**	**17.01**	**67.23**	**16.38**	**1.97**	**12.70**	**33.63**	**41.27**
%			44.2%	53.4%	47.9%	47.9%	47.9%	28.1%	35.7%	46.6%	25.1%	48.3%	44.9%	23.9%	26.4%
n-Alkanols															
Undecanol	$C_{11}H_{24}O$	172	1.20	0.21	0.04	0.13	0.08	0.41	0.06	0.25	0.21	0.06	0.15	0.55	0.44
Dodecanol	$C_{12}H_{26}O$	186	16.72	2.92	0.85	2.00	1.32	5.83	1.98	7.05	5.89	1.58	3.04	9.23	5.56
Tridecanol	$C_{13}H_{28}O$	200	6.40	1.10	0.31	0.80	0.45	1.85	0.85	2.18	1.33	0.42	1.33	1.79	0.97
Tetradecanol	$C_{14}H_{30}O$	214	20.26	3.56	1.45	2.69	1.93	5.98	3.10	8.29	3.99	1.70	5.67	6.35	2.24
Pentadecanol	$C_{15}H_{32}O$	228	8.92	1.16	0.67	2.51	0.99	3.54	2.29	4.19	1.76	0.80	2.77	2.38	1.30
Hexadecanol	$C_{16}H_{34}O$	242	40.55	5.43	2.63	5.77	3.36	8.92	4.50	8.99	3.37	2.22	8.40	6.85	2.66
Heptadecanol	$C_{17}H_{36}O$	256	10.15	1.11	0.75	1.91	0.86	3.02	1.42	3.01	0.85	0.61	2.61	1.85	0.79
Octadecanol	$C_{18}H_{38}O$	270	35.12	6.84	1.83	4.77	4.20	12.40	8.11	17.22	6.69	3.59	14.37	10.47	5.75
Nonadecanol	$C_{19}H_{40}O$	284	3.52	0.52	0.16	0.45	0.34	1.01	0.57	1.18	0.43	0.23	0.93	0.68	0.78
Eicosanol	$C_{20}H_{42}O$	298	5.80	0.98	0.30	0.87	0.62	3.00	1.20	2.13	0.73	1.42	2.44	2.72	0.72
Heneicosanol	$C_{21}H_{44}O$	312	1.73	0.33	0.10	0.21	0.17	0.46	0.49	0.86	0.35	0.13	0.63	2.45	1.02
Docosanol	$C_{22}H_{46}O$	326	6.14	1.32	0.68	5.89	1.74	0.88	12.69	19.87	0.94	3.13	10.13	14.04	7.84
Triacosanol	$C_{23}H_{48}O$	340	1.92	0.38	0.09	0.33	0.18	0.53	0.65	1.26	0.40	0.15	0.62	0.83	0.26
Tetracosanol	$C_{24}H_{50}O$	354	1.71	3.63	0.08	9.86	0.66	27.87	8.06	7.61	2.75	1.66	3.74	3.65	3.18
Pentacosanol	$C_{25}H_{52}O$	368	0.28	0.13	0.04	0.01	0.03	0.07	0.05	0.20	0.07	0.03	0.21	0.11	0.07
Hexacosanol	$C_{26}H_{54}O$	382	1.65	0.31	0.20	0.22	0.18	0.41	0.35	0.63	0.30	0.19	0.93	0.51	0.09
Total			**162.06**	**29.93**	**10.18**	**38.41**	**17.11**	**76.16**	**46.37**	**84.93**	**30.05**	**17.92**	**57.97**	**64.45**	**33.66**
CPI(e/o)			**3.75**	**5.06**	**3.71**	**5.06**	**4.51**	**6.00**	**6.26**	**5.47**	**4.57**	**6.36**	**5.27**	**5.06**	**4.98**

Wax inputs															
Total			**9.50**	**6.25**	**2.96**	**18.97**	**6.58**	**34.15**	**27.10**	**35.11**	**11.99**	**13.98**	**24.80**	**29.19**	**23.11**
%			5.9%	20.9%	29.0%	49.4%	38.4%	44.8%	58.4%	41.3%	39.9%	78.0%	42.8%	45.3%	68.6%
Algal inputs															
Total			**118.44**	**19.73**	**7.06**	**16.10**	**11.43**	**36.13**	**18.89**	**43.69**	**20.66**	**10.50**	**33.92**	**35.62**	**16.92**
%			73.1%	65.9%	69.4%	41.9%	66.8%	47.4%	40.7%	51.4%	68.8%	58.6%	58.5%	55.3%	50.3%
Terristrial/Aquatic			0.08	0.32	0.42	1.18	0.58	0.95	1.43	0.80	0.58	1.33	0.73	0.82	1.37
Microbal inputs															
Total			**28.98**	**3.88**	**1.90**	**5.67**	**2.64**	**9.42**	**5.13**	**10.56**	**4.37**	**2.07**	**7.65**	**6.70**	**3.84**
%			17.9%	13.0%	18.6%	14.8%	15.5%	12.4%	11.1%	12.4%	14.5%	11.5%	13.2%	10.4%	11.4%
Plasticizers															
Diethyl phthalate	$C_{12}H_{14}O_4$	222	12.0	3.7	1.2	0.7	1.2	7.4	2.0	6.4	1.2	4.0	5.5	2.4	5.3
Di-isobutyl phthalate	$C_{16}H_{22}O_4$	278	100.7	16.8	7.1	7.3	9.1	32.0	9.8	49.9	8.0	10.4	12.7	14.4	19.3
Dibutyl phthalate	$C_{16}H_{22}O_4$	278	178.7	40.7	12.3	10.6	17.2	79.8	13.2	170.1	12.3	33.2	50.4	23.7	41.6
Di(2-ethylhexyl) phthalate	$C_{24}H_{38}O_4$	390	20.9	3.1	1.0	0.3	1.1	15.6	3.1	8.9	1.2	2.0	2.1	2.9	2.3
Total			**312.4**	**64.3**	**21.7**	**19.0**	**28.6**	**134.8**	**28.0**	**235.2**	**22.8**	**49.6**	**70.7**	**43.4**	**68.6**
			Station #												
Compound	**Composition**	**M.W.**	**131**	**134**	**139**	**151**	**155**	**168**	**173**	**185**	**186**	**193**	**199**		
n-Alkanes															
Tetradecane	$C_{14}H_{30}$	198	0.1	0.1	0.2	0.5	0.3	0.0	0.2	0.1	0.2	0.3	0.2		
Pentadecane	$C_{15}H_{32}$	212	0.3	1.1	0.7	1.0	0.9	0.3	0.5	0.5	1.0	0.7	0.6		
Hexadecane	$C_{16}H_{34}$	226	4.5	10.0	9.9	10.3	12.4	8.0	7.6	7.2	15.9	6.6	6.6		
Heptadecane	$C_{17}H_{36}$	240	2.1	5.2	3.9	4.1	6.5	4.0	4.0	3.6	7.2	2.8	3.4		
Pristane	$C_{19}H_{40\,(Pr)}$	268	0.1	0.2	0.1	0.1	0.2	0.2	0.4	0.2	0.7	0.2	0.3		
Octadecane	$C_{18}H_{38}$	256	6.5	15.5	13.6	10.7	17.1	14.4	11.4	10.1	20.4	7.1	8.8		
Phytanes	$C_{20}H_{42(Ph)}$	282	0.7	1.4	1.2	0.8	1.3	1.1	1.2	0.8	2.1	0.6	1.2		
Nonadecane	$C_{19}H_{40}$	268	3.0	4.0	3.2	0.7	4.1	3.5	3.0	2.9	5.4	2.0	2.9		
Eicosane	$C_{20}H_{42}$	282	5.8	14.1	12.1	9.6	15.6	13.5	10.2	9.5	16.9	6.0	7.8		
Heneicosane	$C_{21}H_{44}$	296	0.8	6.4	0.4	0.1	1.4	8.0	0.3	0.3	2.1	0.1	0.6		
Docosane	$C_{22}H_{46}$	310	3.0	3.0	2.5	2.3	3.8	2.7	2.2	2.2	3.9	1.4	1.9		
Tricosane	$C_{23}H_{48}$	324	1.9	4.7	4.4	2.9	4.2	5.1	3.8	1.8	5.8	1.4	1.8		
Tetracosane	$C_{24}H_{50}$	338	1.5	3.2	2.4	2.3	3.5	2.8	2.2	2.0	3.6	1.2	1.6		

Pentacosane	$C_{25}H_{52}$	352	0.3	0.5	0.3	1.9	0.7	0.4	0.4	0.4	0.4	0.2	0.3
Hexacosane	$C_{26}H_{54}$	366	0.8	1.9	1.5	1.3	2.1	1.7	1.3	1.1	2.0	0.7	0.8
Heptacosane	$C_{27}H_{56}$	380	0.3	0.5	0.3	0.2	0.6	0.2	0.3	0.2	0.5	0.1	0.2
Octacosane	$C_{28}H_{58}$	394	0.4	0.8	0.5	0.4	1.0	0.7	0.6	0.5	1.0	0.3	0.3
Nonacosane	$C_{29}H_{60}$	408	0.1	0.2	0.2	0.1	0.2	1.1	0.1	0.1	0.1	0.0	0.1
Triacontane	$C_{30}H_{62}$	422	0.2	0.5	0.4	0.3	0.6	0.4	0.3	0.3	0.5	0.2	0.2
Hentriacontane	$C_{31}H_{64}$	436	0.3	1.0	0.6	0.5	0.9	0.6	0.4	0.4	0.9	0.2	0.2
Dotriacontane	$C_{32}H_{66}$	450	0.1	0.1	0.2	0.1	0.2	0.2	0.2	0.1	0.3	0.1	0.1
Tritriacontane	$C_{33}H_{68}$	464	0.1	0.2	0.2	0.2	0.3	0.1	0.1	0.2	0.2	0.0	0.1
Total			**32.9**	**74.6**	**58.9**	**50.6**	**78.1**	**69.0**	**50.7**	**44.5**	**91.1**	**32.3**	**40.0**
CPI(o/e)			**0.4**	**0.5**	**0.3**	**0.3**	**0.3**	**0.5**	**0.4**	**0.3**	**0.4**	**0.3**	**0.4**
LMW/HMW			**11.4**	**11.7**	**12.3**	**8.7**	**10.1**	**11.6**	**12.4**	**12.0**	**13.6**	**15.6**	**16.4**
TAR			**0.13**	**0.11**	**0.13**	**0.32**	**0.16**	**0.11**	**0.12**	**0.14**	**0.10**	**0.09**	**0.09**
Wax n-alkanes													
Total			**0.5**	**1.5**	**0.9**	**0.7**	**1.6**	**1.6**	**0.7**	**0.6**	**1.1**	**0.3**	**0.4**
%			**1.5%**	**2.0%**	**1.5%**	**1.3%**	**2.0%**	**2.3%**	**1.3%**	**1.4%**	**1.2%**	**0.8%**	**1.0%**
Algal n-Alkanes													
Total			**6.2**	**16.7**	**8.1**	**6.0**	**12.8**	**15.8**	**7.8**	**7.3**	**15.7**	**5.6**	**7.6**
%			**19%**	**22%**	**14%**	**12%**	**16%**	**23%**	**15%**	**16%**	**17%**	**17%**	**19%**
Bacterial n-Alkanes													
Total			**14.2**	**33.2**	**30.8**	**25.6**	**37.6**	**31.2**	**24.4**	**22.6**	**44.5**	**16.4**	**10.7**
%			**43.1%**	**44.5%**	**52.3%**	**50.7%**	**48.1%**	**45.2%**	**48.1%**	**50.7%**	**48.9%**	**50.8%**	**26.6%**
Petroleum n-alkanes			**12.0**	**23.2**	**19.0**	**18.3**	**26.1**	**20.4**	**17.8**	**14.0**	**29.8**	**10.0**	**21.4**
%			**36.6%**	**31.1%**	**32.4%**	**36.2%**	**33.4%**	**29.6%**	**35.1%**	**31.5%**	**32.7%**	**31.0%**	**53.4%**
Hopanes													
Trisnorneohopane	$C_{27}H_{46}$	370	T	0.15	T	0.03	0.04	0.01	0.00	0.01	T	T	T
17a(H)-Trisnorhopane	$C_{27}H_{46}$	370	0.01	0.52	T	0.03	0.15	0.00	0.00	0.04	T	T	T
17a(H),21b(H)-Norhopane	$C_{29}H_{50}$	398	0.02	0.58	T	0.09	0.16	0.04	0.00	0.05	T	T	T
17a(H),21b(H)-Hopane	$C_{30}H_{52}$	412	0.02	0.03	T	0.17	0.24	0.05	0.00	0.09	T	T	T
17a(H),21b(H)-22S-Homohopane	$C_{31}H_{54}$	426	0.01	0.17	T	0.03	0.04	0.01	0.00	0.02	T	T	T
17a(H),21b(H)-22R-Homohopane	$C_{31}H_{54}$	426	0.01	0.18	T	0.02	0.02	0.00	0.00	0.01	T	T	T
Gammacerane	$C_{30}H_{52}$	412	0.00	0.05	T	0.00	0.00	0.00	0.00	0.00	T	T	T

17a(H),21b(H)-22S-Bishomohopane	$C_{32}H_{56}$	440	0.01	0.19	T	0.00	0.04	0.00	0.00	0.01	T	T	T
17a(H),21b(H)-22R-Bishomohopane	$C_{32}H_{56}$	440	T	0.14	T	0.00	0.02	0.00	0.00	0.01	T	T	T
17a(H),21b(H)-22S-Trishomohopane	$C_{33}H_{58}$	454	T	T	T	T	0.01	T	T	T	T	T	T
17a(H),21b(H)-22R-Trishomohopane	$C_{33}H_{58}$	454	T	T	T	T	T	T	T	T	T	T	T
17a(H),21b(H)-22S-Tetrakishomohopane	$C_{34}H_{60}$	468	T	T	T	T	T	T	T	T	T	T	T
17a(H),21b(H)-22R-Tetrakishomohopane	$C_{34}H_{60}$	468	T	T	T	T	T	T	T	T	T	T	T
17a(H),21b(H)-22S-Pentakishomohopane	$C_{35}H_{62}$	482	T	T	T	T	T	T	T	T	T	T	T
17a(H),21b(H)-22R-Pentakishomohopane	$C_{35}H_{62}$	482	T	T	T	T	T	T	T	T	T	T	T
Total			**0.07**	**2.02**	**0.00**	**0.37**	**0.73**	**0.12**	**0.01**	**0.24**	**0.00**	**0.00**	**0.00**
C_{31} S/(R+S)			0.58	0.49	ND	0.65	0.66	0.69	0.53	0.71	ND	ND	ND
C_{32} S/(R+S)			ND	0.57	ND	ND	0.68	ND	ND	0.54	ND	ND	ND
Steranes													
13b,17a-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
13b,17a-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
13a,17b-20S-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
13a,17b-20R-Cholestane Diasterane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Cholestane	$C_{27}H_{48}$	372	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Ergostane	$C_{28}H_{50}$	386	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20S-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20R-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T
14b,17b-20S-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T
14a,17ba-20R-Stigmastane	$C_{29}H_{52}$	400	T	T	T	T	T	T	T	T	T	T	T
Total													
PAHs													
Phenanthrene	$C_{14}H_{10}$	178	0.5	3.2	2.4	2.5	4.8	1.8	3.8	1.0	4.9	11.8	1.8
Anthracene	$C_{14}H_{10}$	178	0.4	6.0	2.5	3.1	5.9	2.0	3.5	1.6	7.6	11.3	1.9
Benzo[k]fluoranthene	$C_{20}H_{12}$	252	0.2	0.2	0.2	3.6	0.4	0.1	0.1	0.2	0.2	0.1	0.1
Benzo[b]fluoranthene	$C_{20}H_{12}$	252	0.2	0.1	0.1	3.1	0.2	0.2	0.1	0.0	0.1	0.0	0.0
Total			**1.3**	**9.4**	**5.3**	**12.2**	**11.4**	**4.1**	**7.5**	**2.9**	**12.7**	**23.2**	**3.9**

Ant/(Ant+Phe)			0.4	0.7	0.5	0.6	0.6	0.5	0.5	0.6	0.6	0.5	0.5
Methyl alkanoates													
Methyl octanoate	$C_9H_{18}O_2$	158	0.00	0.05	0.02	0.01	0.02	0.13	0.12	0.02	0.06	0.00	0.00
Methyl nonanoate	$C_{10}H_{20}O_2$	172	0.02	0.10	0.04	0.02	0.03	0.11	0.10	0.06	0.07	0.01	0.01
Methyl decanoate	$C_{11}H_{22}O_2$	186	0.01	0.03	0.01	0.03	0.03	0.03	0.04	0.03	0.04	0.01	0.01
Methyl unodcanoate	$C_{12}H_{24}O_2$	200	0.01	0.05	0.03	0.03	0.05	0.04	0.06	0.04	0.05	0.02	0.03
Methyl dodecanoate	$C_{13}H_{26}O_2$	214	0.07	0.10	0.12	0.11	0.15	0.12	0.16	0.13	0.18	0.11	0.10
Methyl tridecanoate	$C_{14}H_{28}O_2$	228	0.12	0.44	0.17	0.06	0.14	0.19	0.22	0.09	0.21	0.07	0.07
Methyl tetradecanoate	$C_{15}H_{30}O_2$	242	0.29	0.98	0.64	0.47	0.86	0.62	0.66	0.47	1.15	0.28	0.40
Methyl pentadecanoate	$C_{16}H_{32}O_2$	256	0.14	0.47	0.32	0.19	0.39	0.28	0.33	0.19	0.57	0.12	0.20
Methyl hexadecenoate	$C_{17}H_{32}O_2$	268	0.00	0.03	0.00	0.01	0.01	0.00	0.00	0.00	0.01	0.02	0.01
Methyl hexadecanoate	$C_{17}H_{34}O_2$	270	7.49	17.56	11.60	8.29	17.52	10.15	9.64	8.39	22.91	5.07	7.23
Methyl heptadecenoate	$C_{18}H_{34}O_2$	282	0.08	0.22	0.18	0.11	0.26	0.21	0.17	0.17	0.21	0.05	0.12
Methyl octadecanoate	$C_{19}H_{36}O_2$	296	0.00	0.01	0.00	0.01	0.00	0.01	0.00	0.01	0.01	0.01	0.00
Methyl octadecenoate	$C_{19}H_{38}O_2$	298	2.22	7.11	6.54	2.60	6.01	9.27	14.97	3.53	10.23	2.73	3.61
Methyl nonadecanoate	$C_{20}H_{40}O_2$	312	0.05	0.16	0.05	0.08	0.11	0.15	0.11	0.06	0.07	0.03	0.05
Total			**10.47**	**27.14**	**19.64**	**11.96**	**25.57**	**21.31**	**26.58**	**13.19**	**35.76**	**8.54**	**11.85**
CPI(e/o)													
Total FA													
Pentanoic acid	$C_5H_{10}O_2$	102	1.02	0.98	0.17	0.18	1.57	0.01	0.00	0.47	0.67	0.76	0.27
Hexanoic acid	$C_6H_{12}O_2$	116	2.57	5.23	0.96	0.63	4.73	0.02	0.00	2.53	7.05	2.85	1.96
Heptanoic acid	$C_7H_{14}O_2$	130	2.35	5.15	0.86	0.62	5.11	0.02	0.00	2.81	2.05	2.86	2.21
Octanoic acid	$C_8H_{16}O_2$	144	6.39	14.32	2.61	1.97	12.49	0.11	0.00	7.26	7.10	8.63	6.31
Nonanoic acid	$C_9H_{18}O_2$	158	9.72	19.32	3.11	3.53	20.07	0.36	0.12	10.66	4.14	15.00	9.29
Dodanoic acid	$C_{10}H_{20}O_2$	172	3.39	6.71	0.96	1.17	6.80	0.22	0.10	3.68	8.40	5.71	3.26
Undecanoic acid	$C_{11}H_{22}O_2$	186	1.98	3.89	0.54	0.77	4.04	0.06	0.04	2.05	3.75	3.67	1.95
Dodecanoic acid	$C_{12}H_{24}O_2$	200	3.26	6.71	0.78	1.01	6.44	0.12	0.06	3.35	10.04	6.00	3.21

Tridecanoic acid	$C_{13}H_{26}O_2$	214	1.78	3.50	0.66	0.68	3.75	0.19	0.16	1.92	1.25	3.44	1.81
Tetradecanoic acid	$C_{14}H_{28}O_2$	228	5.95	11.94	2.06	1.80	14.16	0.31	0.22	6.29	3.89	11.69	5.79
Pentadecanoic acid	$C_{15}H_{30}O_2$	242	4.04	7.86	1.23	1.42	8.36	0.67	0.66	4.33	3.67	7.56	1.39
Hexadecenoic acid	$C_{16}H_{30}O_2$	254	0.15	0.59	0.33	0.25	0.67	0.29	0.33	0.29	4.08	0.14	0.23
Hexadecanoic acid	$C_{16}H_{32}O_2$	256	49.32	84.55	14.15	15.51	86.07	1.35	0.00	52.41	1.09	83.86	48.94
Heptadecanoic acid	$C_{17}H_{34}O_2$	270	8.82	20.21	11.74	8.55	20.04	10.16	9.64	9.72	24.46	7.65	8.53
Octadecenoic acid	$C_{18}H_{34}O_2$	282	0.11	0.29	0.18	0.11	0.28	0.21	0.17	0.18	0.32	0.07	0.16
Octadecanoic acid	$C_{18}H_{36}O_2$	284	34.42	56.60	5.74	7.40	51.72	0.54	0.00	33.53	0.79	56.80	30.05
Nonadecanoic acid	$C_{19}H_{38}O_2$	298	2.41	8.28	9.07	2.72	6.19	9.30	14.97	3.75	16.88	2.93	4.16
Eicosanoic acid	$C_{20}H_{40}O_2$	312	0.46	0.56	0.72	0.16	0.38	0.15	0.11	0.31	3.72	0.10	0.22
Heneicosanoic acid	$C_{21}H_{42}O_2$	326	10.47	27.14	19.64	11.96	25.57	21.31	26.58	13.19	35.76	8.54	11.85
Total			**148.61**	**283.81**	**75.50**	**60.42**	**278.43**	**45.38**	**53.16**	**158.73**	**139.13**	**228.25**	**141.58**
CPI(e/o)			**2.48**	**1.94**	**0.60**	**0.97**	**1.93**	**0.07**	**0.01**	**2.24**	**0.45**	**3.35**	**2.41**
Wax FA			**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**	**0.00**
Algal FA													
Total			**106.0**	**187.5**	**28.5**	**30.0**	**183.7**	**3.3**	**1.0**	**109.8**	**46.5**	**175.9**	**100.1**
%			**71.3%**	**66.1%**	**37.7%**	**49.6%**	**66.0%**	**7.3%**	**1.9%**	**69.2%**	**33.4%**	**77.0%**	**70.7%**
Microbial FA													
Total			**28.75**	**63.06**	**26.34**	**17.66**	**62.45**	**20.73**	**25.59**	**32.42**	**54.16**	**40.24**	**27.13**
%			19.3%	22.2%	34.9%	29.2%	22.4%	45.7%	48.1%	20.4%	38.9%	17.6%	19.2%
n-Alkanols													
Undecanol	$C_{11}H_{24}O$	172	0.24	1.10	0.35	0.81	0.70	0.10	0.15	0.62	0.67	0.21	0.22
Dodecanol	$C_{12}H_{26}O$	186	2.63	9.46	10.01	8.03	10.82	2.55	3.23	4.64	7.05	4.09	4.57
Tridecanol	$C_{13}H_{28}O$	200	0.70	2.03	1.94	1.67	1.87	0.83	0.97	1.26	2.05	0.90	0.90
Tetradecanol	$C_{14}H_{30}O$	214	2.14	6.38	7.93	5.81	7.24	2.43	4.04	3.68	7.10	2.97	3.55
Pentadecanol	$C_{15}H_{32}O$	228	1.33	3.18	3.24	3.64	6.47	1.31	2.46	1.93	4.08	1.44	2.05
Hexadecanol	$C_{16}H_{34}O$	242	3.57	7.94	7.77	4.56	12.32	2.16	6.22	4.28	8.33	3.73	4.74
Heptadecanol	$C_{17}H_{36}O$	256	0.91	2.35	2.53	1.43	4.06	0.80	2.68	1.46	3.71	1.00	1.62
Octadecanol	$C_{18}H_{38}O$	270	6.04	10.91	15.19	6.10	9.38	6.60	7.96	7.79	9.99	5.29	6.92
Nonadecanol	$C_{19}H_{40}O$	284	0.30	1.08	1.22	0.82	4.53	0.46	0.78	1.51	1.08	0.34	0.46
Eicosanol	$C_{20}H_{42}O$	298	0.89	4.21	3.71	1.15	1.46	0.73	2.00	1.24	3.68	0.94	1.85
Heneicosanol	$C_{21}H_{44}O$	312	0.18	2.57	0.65	0.47	0.25	0.26	0.41	1.98	2.52	0.18	0.23
Docosanol	$C_{22}H_{46}O$	326	4.13	2.51	3.06	1.02	8.87	4.87	9.07	5.76	3.51	4.22	7.97

Triacosanol	$C_{23}H_{48}O$	340	0.21	1.17	1.18	2.58	0.78	0.26	0.47	0.29	1.08	0.33	0.45
Tetracosanol	$C_{24}H_{50}O$	354	0.46	11.78	6.37	4.67	19.90	2.27	3.10	0.87	1.55	0.33	4.95
Pentacosanol	$C_{25}H_{52}O$	368	0.01	0.11	0.12	0.10	0.15	0.03	0.08	0.03	0.11	0.05	0.03
Hexacosanol	$C_{26}H_{54}O$	382	0.15	0.82	0.84	0.68	0.53	0.17	0.61	0.25	0.78	0.26	0.31
Total			**23.87**	**67.60**	**66.13**	**43.54**	**89.36**	**25.83**	**44.22**	**37.60**	**57.30**	**26.28**	**40.82**
CPI(e/o)			**5.16**	**3.97**	**4.88**	**2.78**	**3.75**	**5.39**	**4.53**	**3.14**	**2.74**	**4.90**	**5.85**
Wax inputs													
Total			**17.73**	**29.11**	**25.27**	**22.37**	**46.31**	**25.31**	**31.78**	**26.88**	**26.84**	**26.81**	**36.23**
%			74.3%	43.1%	38.2%	51.4%	51.8%	98.0%	71.9%	71.5%	46.8%	102.0%	88.8%
Algal inputs													
Total			**15.26**	**38.90**	**44.61**	**25.64**	**41.22**	**14.47**	**23.45**	**21.63**	**36.15**	**17.01**	**21.63**
%			63.9%	57.5%	67.5%	58.9%	46.1%	56.0%	53.0%	57.5%	63.1%	64.7%	53.0%
Terristrial/Aquatic			1.16	0.75	0.57	0.87	1.12	1.75	1.35	1.24	0.74	1.58	1.68
Microbal inputs													
Total			**3.24**	**8.64**	**8.93**	**7.57**	**16.94**	**3.39**	**6.89**	**6.17**	**10.92**	**3.69**	**5.03**
%			13.6%	12.8%	13.5%	17.4%	19.0%	13.1%	15.6%	16.4%	19.1%	14.0%	12.3%
Plasticizers													
Diethyl phthalate	$C_{12}H_{14}O_4$	222	3.5	6.8	2.6	1.7	3.7	1.3	1.8	1.9	6.2	1.5	1.8
Di-isobutyl phthalate	$C_{16}H_{22}O_4$	278	9.7	20.9	13.5	11.7	23.9	12.2	11.6	11.5	24.9	8.4	14.0
Dibutyl phthalate	$C_{16}H_{22}O_4$	278	14.9	38.5	11.2	24.4	37.1	31.8	19.2	11.3	72.8	20.3	20.2
Di(2-ethylhexyl) phthalate	$C_{24}H_{38}O_4$	390	1.1	1.9	2.8	2.9	1.8	1.4	1.4	1.0	4.3	1.6	1.4
Total			**29.1**	**68.1**	**30.0**	**40.7**	**66.5**	**46.8**	**34.1**	**25.8**	**108.1**	**31.9**	**37.4**