

Data Path : Z:\HPCHEM1\BNA F\DATA\BF120915\
 Data File : BF083667.D
 Acq On : 10 Dec 2015 5:45
 Operator : UM/IZ
 Sample : G4583-09DL 10X
 Misc :
 ALS Vial : 31 Sample Multiplier: 1

Instrument :
 BNA_F
 ClientSampleId :
 SB-P3WC-09(0-8)DL

Manual Integrations
 APPROVED

MMdadoda
 12/10/2015 5:50:31 PM

Quant Time: Dec 10 06:41:01 2015
 Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF120815.M
 Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
 QLast Update : Wed Dec 09 00:23:35 2015
 Response via : Initial Calibration

Internal Standards	R.T.	QIon	Response	Conc	Units	Dev(Min)
1) 1,4-Dichlorobenzene-d4	5.68	152	130598	20.00	ng	-0.02
21) Naphthalene-d8	7.58	136	503764	20.00	ng	-0.02
38) Acenaphthene-d10	10.36	164	234346	20.00	ng	-0.02
63) Phenanthrene-d10	12.76	188	366201	20.00	ng	-0.02
75) Chrysene-d12	16.97	240	314184	20.00	ng	-0.02
86) Perylene-d12	18.63	264	260379	20.00	ng	-0.01
System Monitoring Compounds						
5) 2-Fluorophenol	3.98	112	124625	14.47	ng	0.01
7) Phenol-d6	5.28	99	187058	16.26	ng	0.00
23) Nitrobenzene-d5	6.52	82	118137	10.94	ng	-0.01
41) 2,4,6-Tribromophenol	11.68	330	22816	10.93	ng	-0.01
44) 2-Fluorobiphenyl	9.32	172	210998	12.67	ng	-0.02
78) Terphenyl-d14	15.38	244	150010	11.23	ng	-0.03
Target Compounds						Qvalue
31) Naphthalene	7.62	128	4405059	165.10	ng	96
37) 2-Methylnaphthalene	8.72	142	525250	31.34	ng	98
45) 1,1'-Biphenyl	9.47	154	169937	8.34	ng	97
48) Acenaphthylene	10.13	152	202396	7.98	ng	96
51) Acenaphthene	10.42	154	418523	28.83	ng	100
54) Dibenzofuran	10.72	168	46596	2.31	ng	98
57) Fluorene	11.25	166	241218	13.73	ng	100
70) Phenanthrene	12.80	178	1335653	63.48	ng	99
71) Anthracene	12.89	178	363739	16.69	ng	99
72) Carbazole	13.21	167	38768	2.07	ng	98
74) Fluoranthene	14.73	202	776019	36.05	ng	99
77) Pyrene	15.08	202	893501	39.50	ng	98
80) Benzo(a)anthracene	16.96	228	319516m	17.38	ng	
82) Chrysene	17.01	228	304116	16.50	ng	98
85) Indeno(1,2,3-cd)pyrene	19.88	276	105737	8.50	ng	# 100
87) Benzo(b)fluoranthene	18.25	252	248279m	16.74	ng	
88) Benzo(k)fluoranthene	18.26	252	105733m	6.47	ng	
89) Benzo(a)pyrene	18.57	252	247980	17.14	ng	98
91) Benzo(a,h,i)perylene	20.24	276	109682	10.17	ng	95

(#) = qualifier out of range (m) = manual integration (+) = signals summed

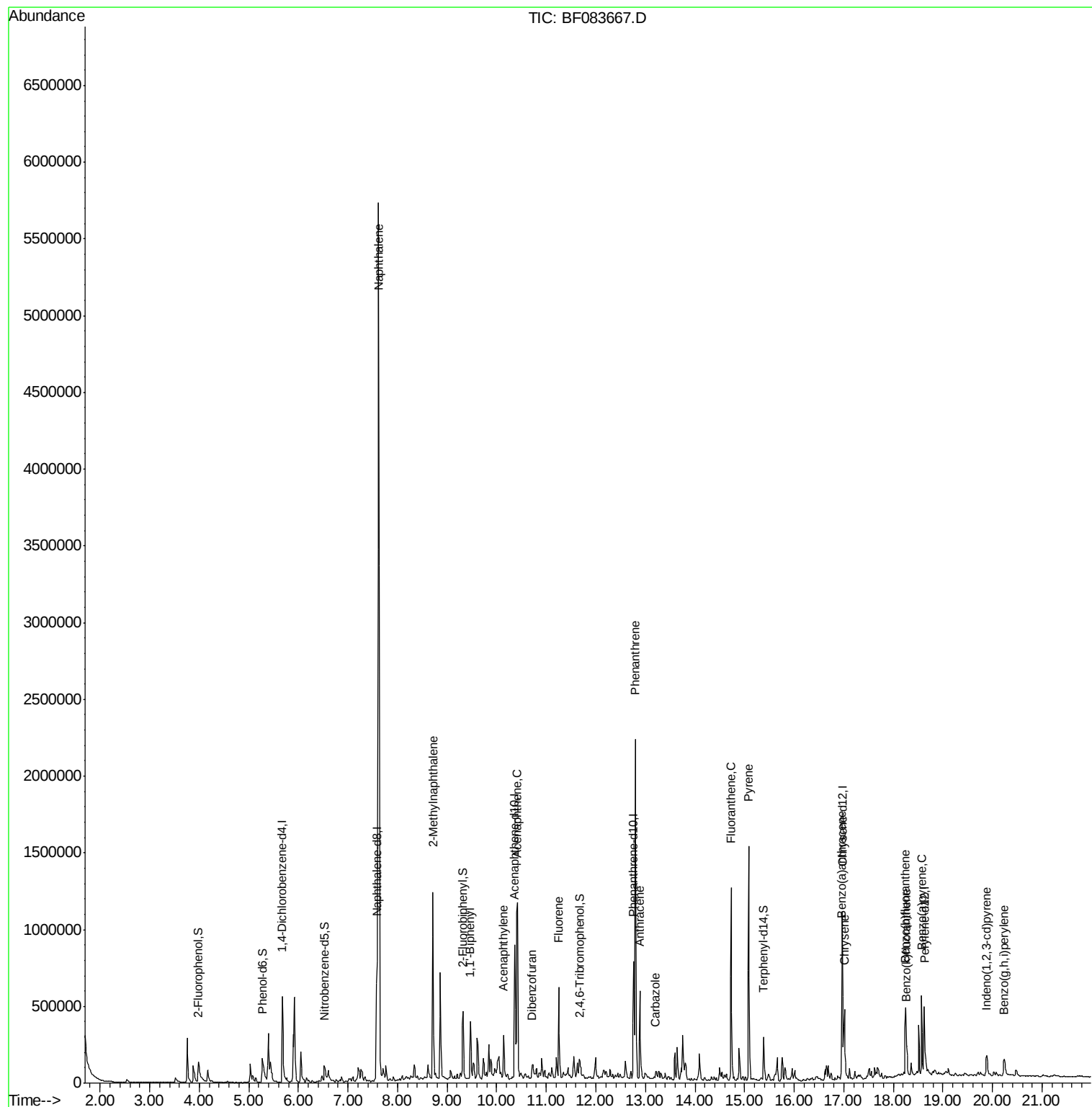
Data Path : Z:\HPCHEM1\BNA F\DATA\BF120915\
Data File : BF083667.D
Acq On : 10 Dec 2015 5:45
Operator : UM/IZ
Sample : G4583-09DL 10X
Misc :
ALS Vial : 31 Sample Multiplier: 1

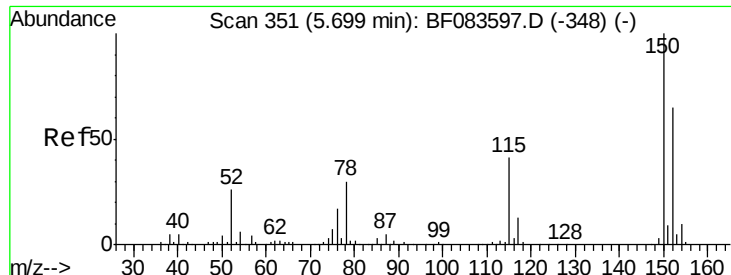
Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM

Quant Time: Dec 10 06:41:01 2015
Quant Method : Z:\HPCHEM1\BNA F\METHODS\8270-BF120815.M
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
QLast Update : Wed Dec 09 00:23:35 2015
Response via : Initial Calibration





#1

1,4-Dichlorobenzene-d4

Concen: 20.00 ng

RT: 5.68 min Scan# 349

Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

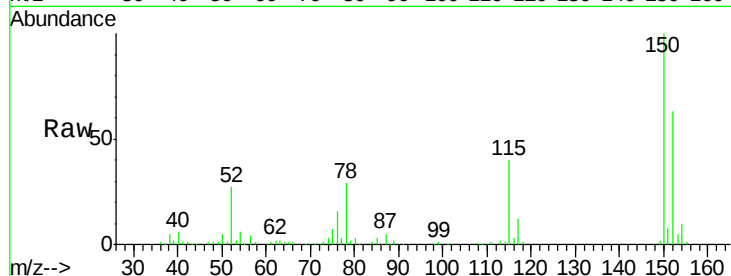
ClientSampleId :

SB-P3WC-09(0-8)DL

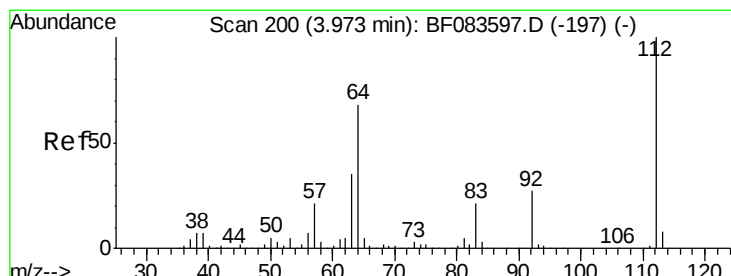
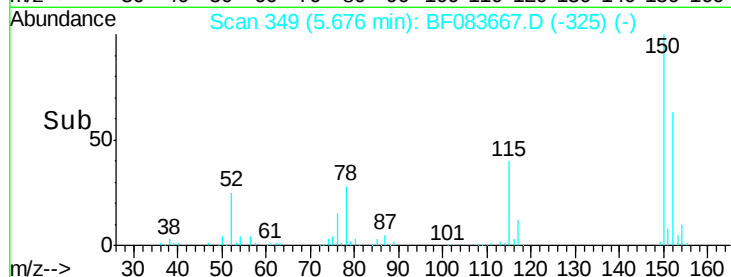
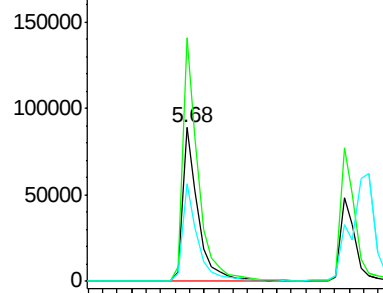
Tot Ion:	152	Resp:	130598
Ion Ratio	Lower	Upper	
152	100		
150	158.5	126.5	189.7
115	63.5	52.3	78.5

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM



Abundance Ion 152.00 (151.70 to 152.70): E
Ion 150.00 (149.70 to 150.70): E
Ion 115.00 (114.70 to 115.70): E



#5

2-Fluorophenol

Concen: 14.47 ng

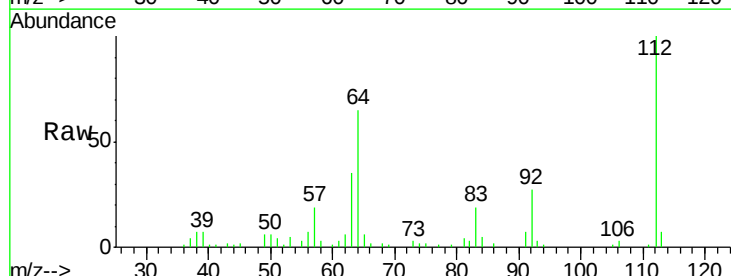
RT: 3.98 min Scan# 201

Delta R.T. 0.01 min

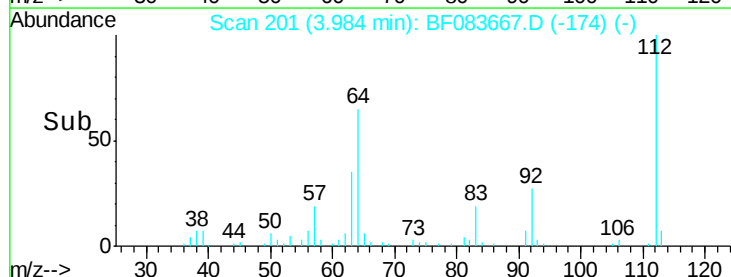
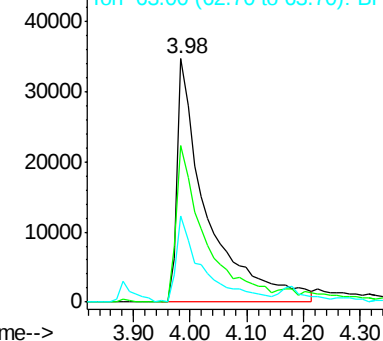
Lab File: BF083667.D

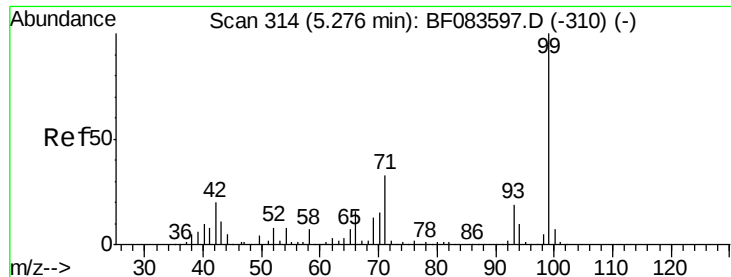
Acq: 10 Dec 2015 5:45

Tgt Ion:	112	Resp:	124625
Ion Ratio	Lower	Upper	
112	100		
64	64.6	50.5	75.7
63	35.2	25.8	38.6



Abundance Ion 112.00 (111.70 to 112.70): E
Ion 64.00 (63.70 to 64.70): BF0
Ion 63.00 (62.70 to 63.70): BF0





#7

Phenol-d6

Concen: 16.26 ng

RT: 5.28 min Scan# 314

Delta R.T. 0.00 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

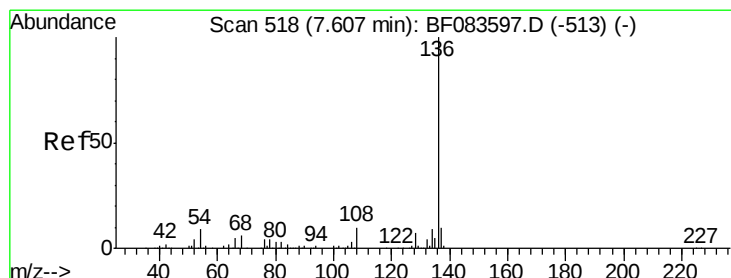
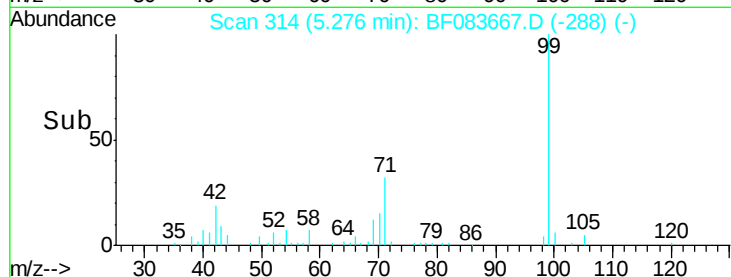
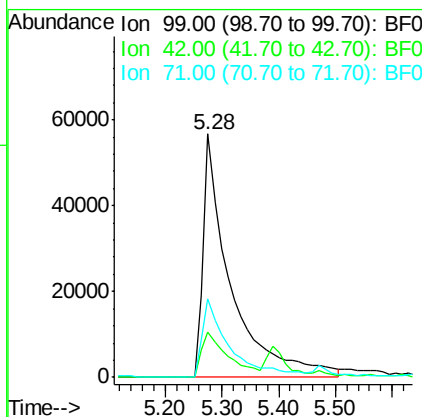
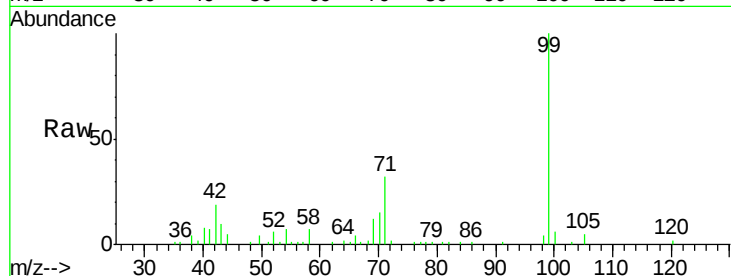
ClientSampleId :

SB-P3WC-09(0-8)DL

Tot Ion:	99	Resp:	187058
Ion Ratio	Lower	Upper	
99	100		
42	18.8	17.3	25.9
71	32.2	26.6	40.0

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM



#21

Naphthalene-d8

Concen: 20.00 ng

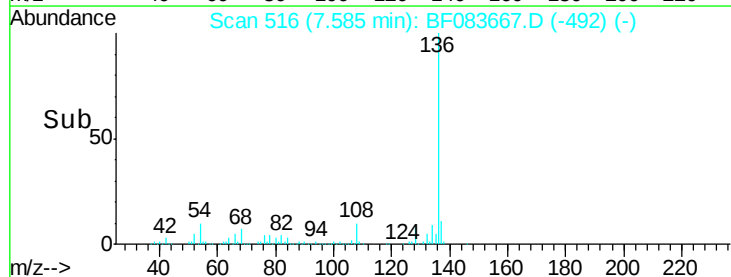
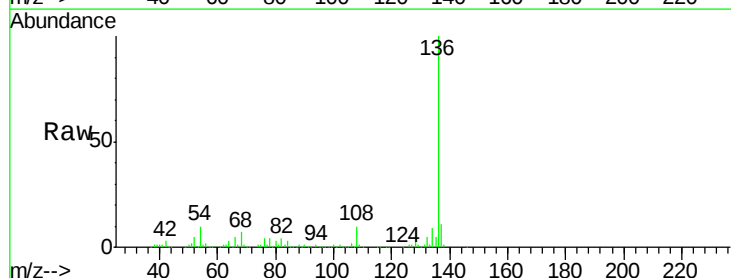
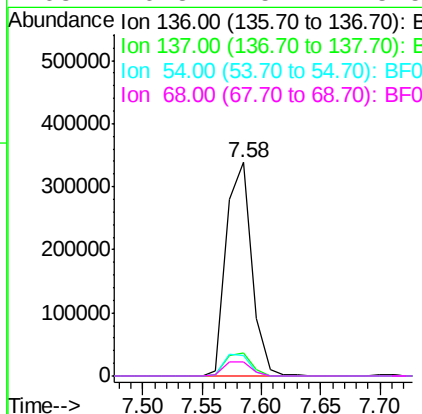
RT: 7.58 min Scan# 516

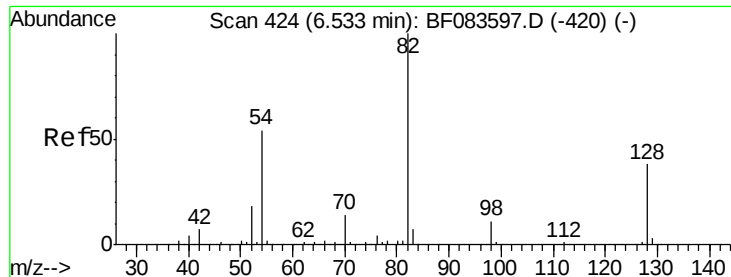
Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Tgt Ion:	136	Resp:	503764
Ion Ratio	Lower	Upper	
136	100		
137	10.8	8.7	13.1
54	9.6	7.8	11.6
68	6.8	5.7	8.5





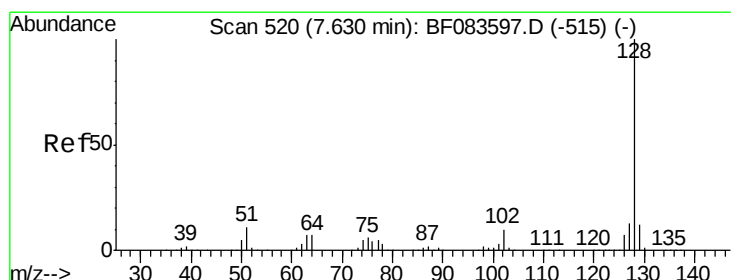
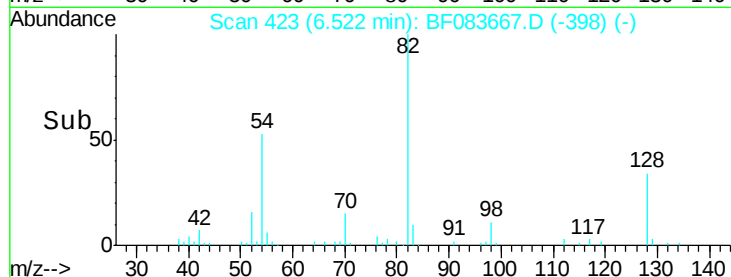
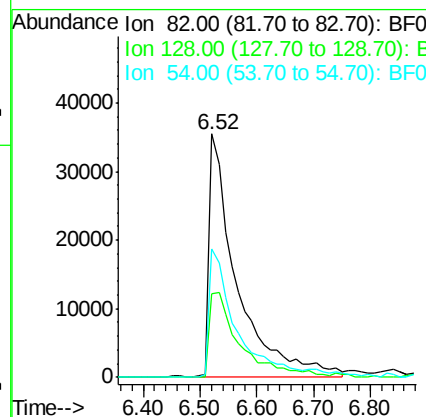
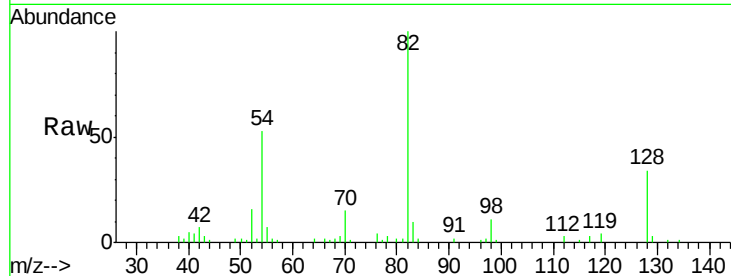
#23
Nitrobenzene-d5
Concen: 10.94 ng
RT: 6.52 min Scan# 423
Delta R.T. -0.01 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Resp	Lower	Upper
82	100	118137		
128	34.5	30.7	46.1	
54	52.7	42.5	63.7	

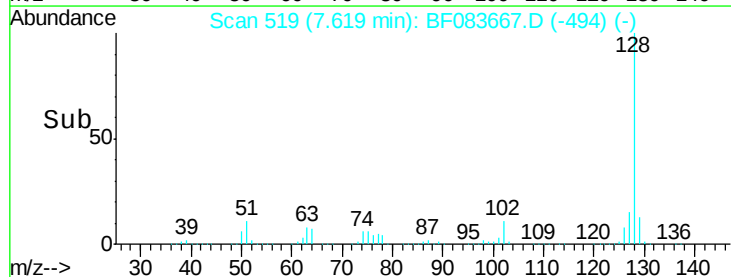
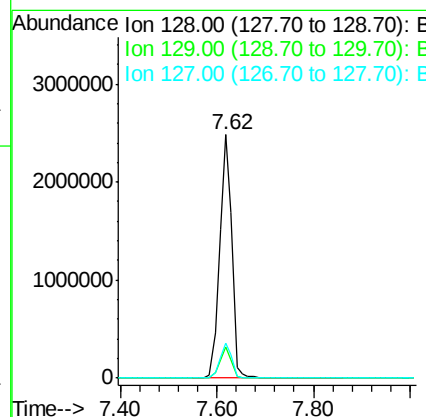
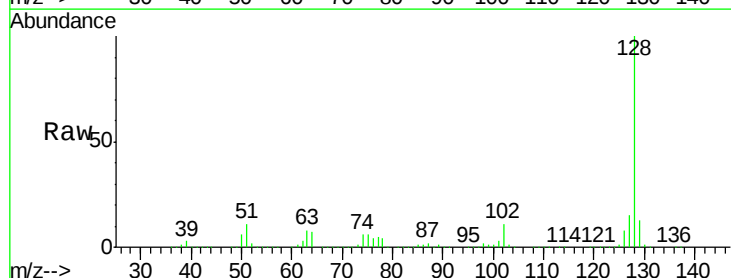
Manual Integrations
APPROVED

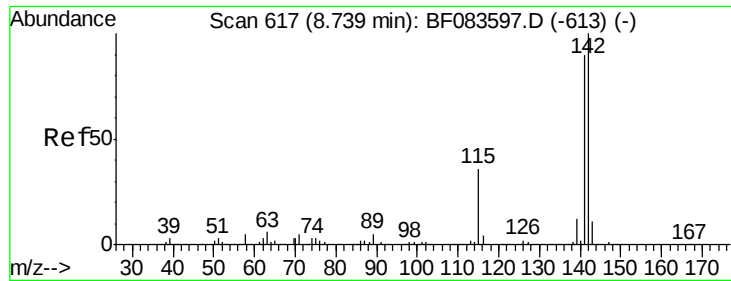
MMdadoda
12/10/2015 5:50:31 PM



#31
Naphthalene
Concen: 165.10 ng
RT: 7.62 min Scan# 519
Delta R.T. -0.01 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Resp	Lower	Upper
128	100	4405059		
129	12.7	8.6	13.0	
127	14.6	10.6	16.0	





#37

2-Methylnaphthalene

Concen: 31.34 ng

RT: 8.72 min Scan# 615

Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

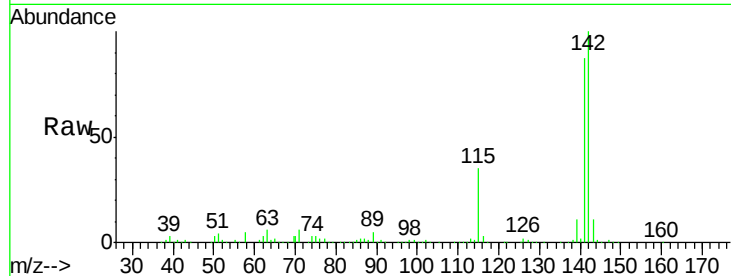
ClientSampleId :

SB-P3WC-09(0-8)DL

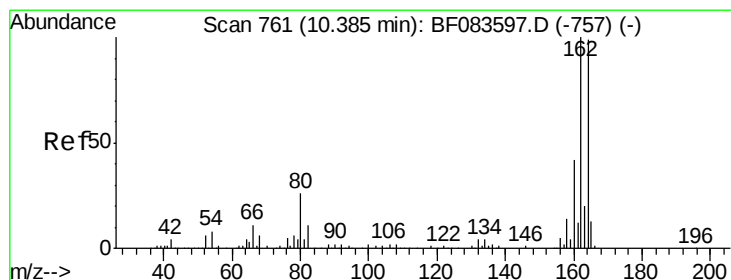
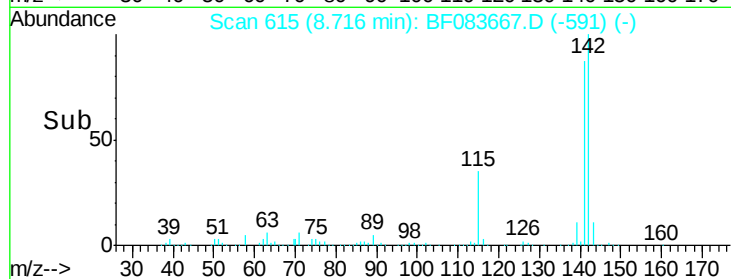
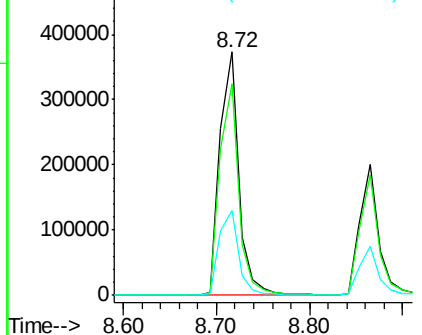
Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM

Tot Ion:	142	Resp:	525250
Ion Ratio	Lower	Upper	
142	100		
141	86.8	70.3	105.5
115	34.7	29.2	43.8



Abundance Ion 142.00 (141.70 to 142.70): E
Ion 141.00 (140.70 to 141.70): E
Ion 115.00 (114.70 to 115.70): E



#38

Acenaphthene-d10

Concen: 20.00 ng

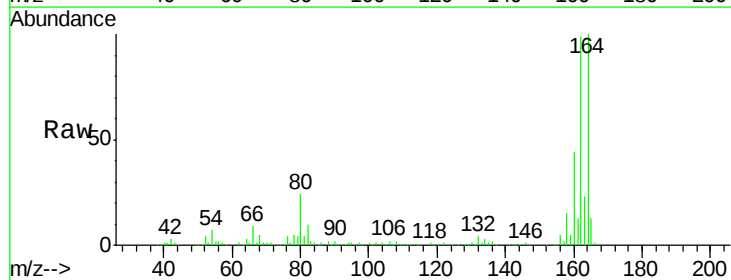
RT: 10.36 min Scan# 759

Delta R.T. -0.02 min

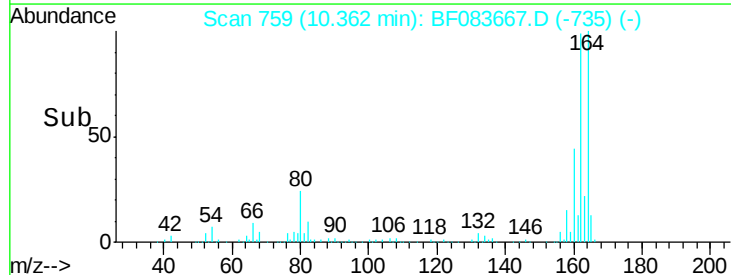
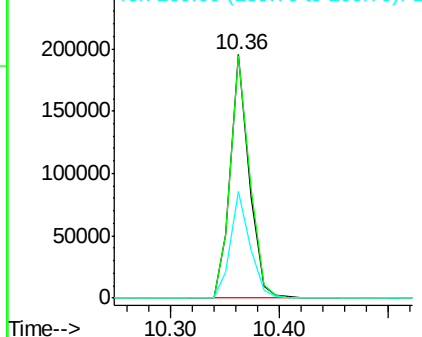
Lab File: BF083667.D

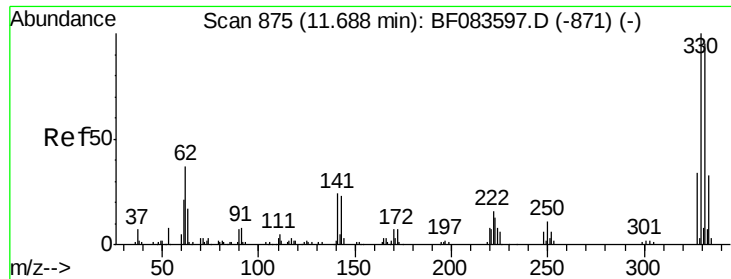
Acq: 10 Dec 2015 5:45

Tgt Ion:	164	Resp:	234346
Ion Ratio	Lower	Upper	
164	100		
162	99.4	78.8	118.2
160	43.6	33.4	50.2



Abundance Ion 164.00 (163.70 to 164.70): E
Ion 162.00 (161.70 to 162.70): E
Ion 160.00 (159.70 to 160.70): E





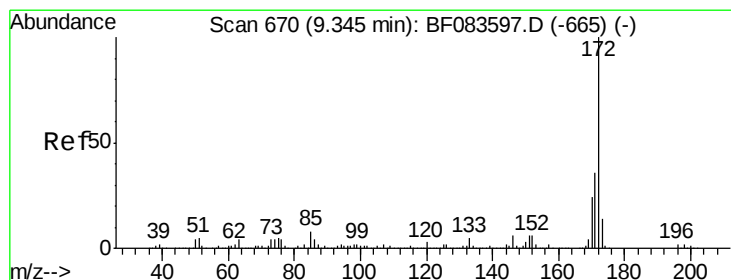
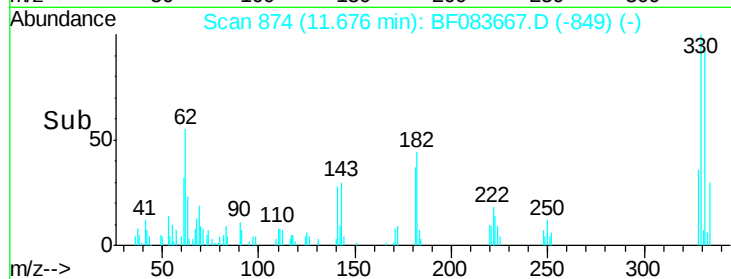
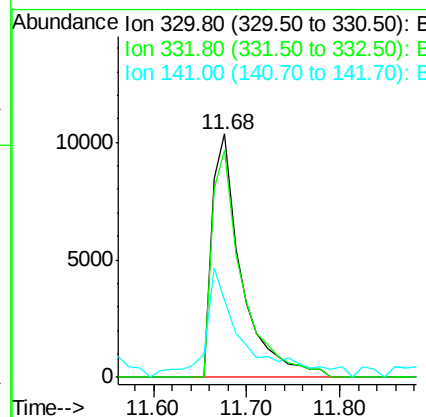
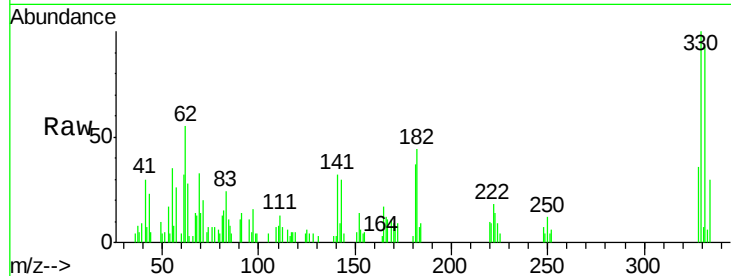
#41
 2,4,6-Tribromophenol
 Concen: 10.93 ng
 RT: 11.68 min Scan# 874
 Delta R.T. -0.01 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Instrument :
 BNA_F
 ClientSampleId :
 SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Resp	Lower	Upper
330	100	22816		
332	96.4	0.0	0.0	0.0
141	57.7	0.0	0.0	0.0

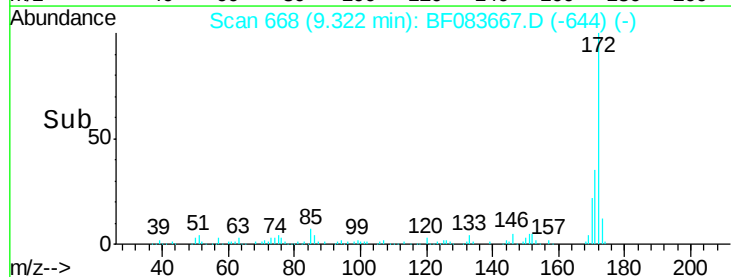
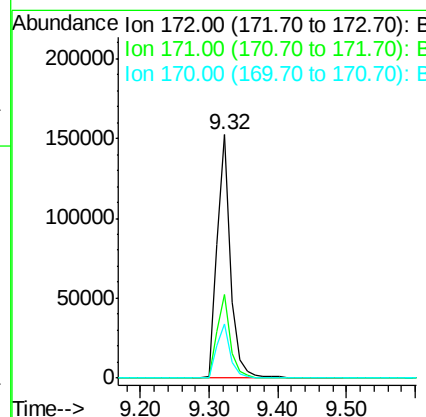
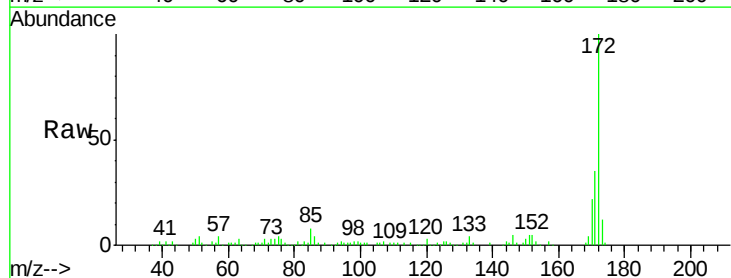
Manual Integrations
 APPROVED

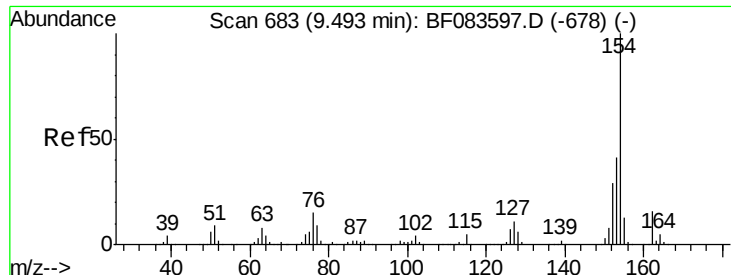
MMdadoda
 12/10/2015 5:50:31 PM



#44
 2-Fluorobiphenyl
 Concen: 12.67 ng
 RT: 9.32 min Scan# 668
 Delta R.T. -0.02 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Resp	Lower	Upper
172	100	210998		
171	34.5	28.6	42.8	
170	22.2	19.4	29.0	





#45

1,1'-Biphenyl

Concen: 8.34 ng

RT: 9.47 min Scan# 681

Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

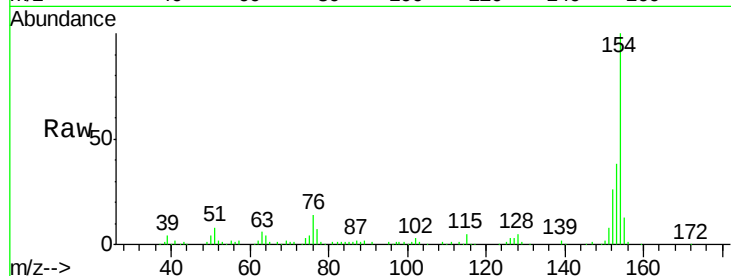
ClientSampleId :

SB-P3WC-09(0-8)DL

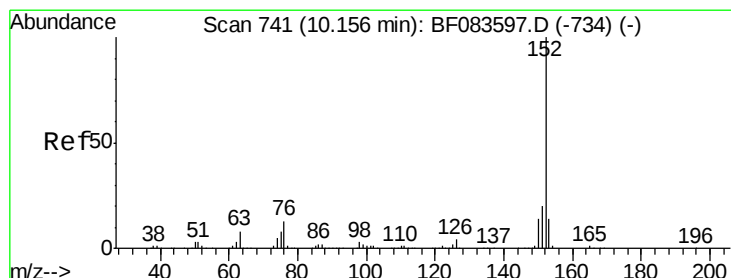
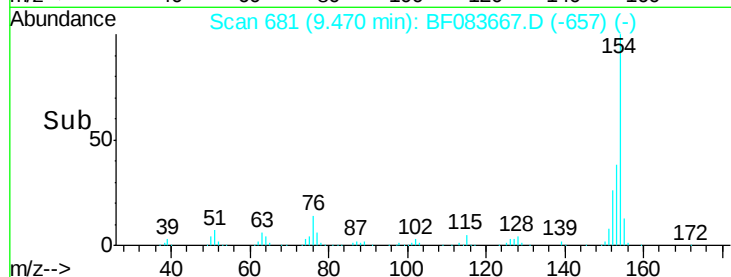
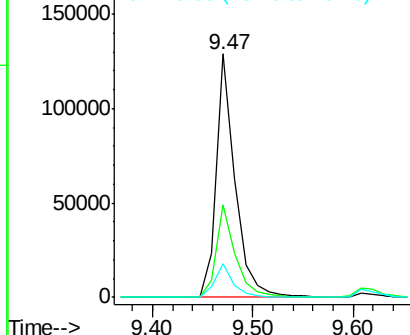
Tot Ion:	154	Resp:	169937
Ion Ratio	Lower	Upper	
154	100		
153	37.9	20.2	60.2
76	13.7	0.0	34.8

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM



Abundance Ion 154.00 (153.70 to 154.70): E
Ion 153.00 (152.70 to 153.70): E
Ion 76.00 (75.70 to 76.70): BF0



#48

Acenaphthylene

Concen: 7.98 ng

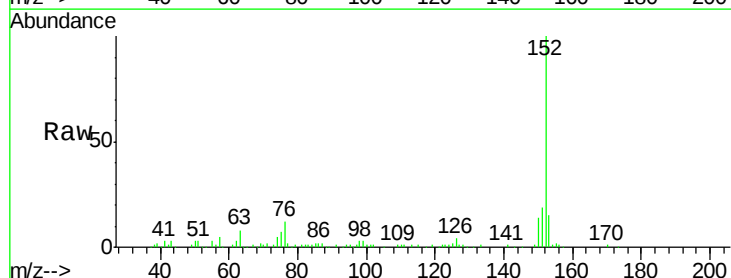
RT: 10.13 min Scan# 739

Delta R.T. -0.02 min

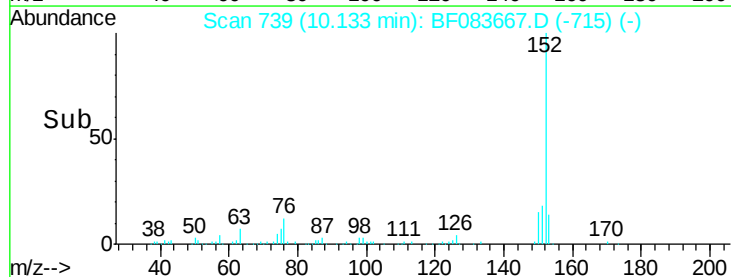
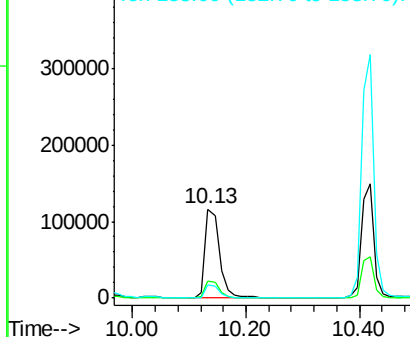
Lab File: BF083667.D

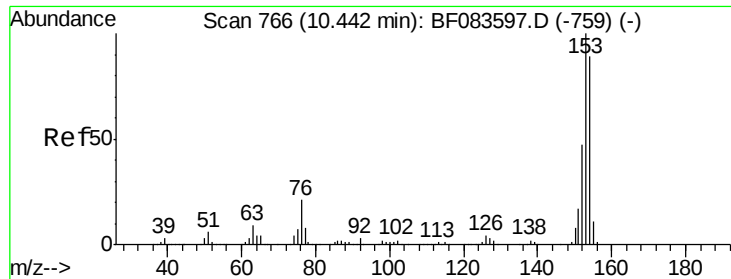
Acq: 10 Dec 2015 5:45

Tgt Ion:	152	Resp:	202396
Ion Ratio	Lower	Upper	
152	100		
151	18.6	16.3	24.5
153	15.0	10.8	16.2



Abundance Ion 152.00 (151.70 to 152.70): E
Ion 151.00 (150.70 to 151.70): E
Ion 153.00 (152.70 to 153.70): E





#51

Acenaphthene

Concen: 28.83 ng

RT: 10.42 min Scan# 764

Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

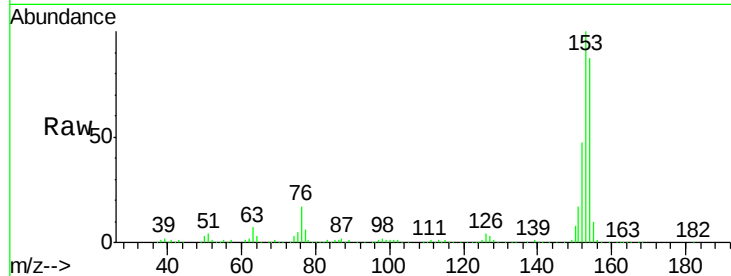
ClientSampleId :

SB-P3WC-09(0-8)DL

Tot Ion:	154	Resp:	418523
Ion Ratio	Lower	Upper	
154	100		
153	114.6	91.4	137.0
152	53.8	43.4	65.2

Manual Integrations
APPROVED

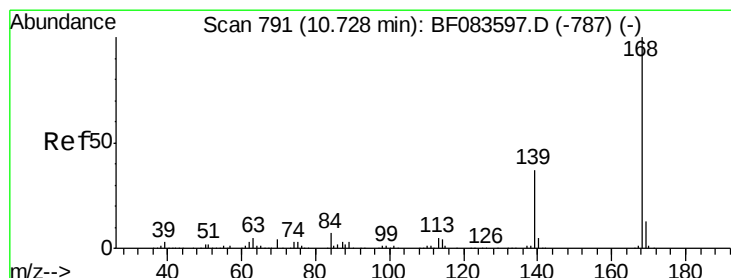
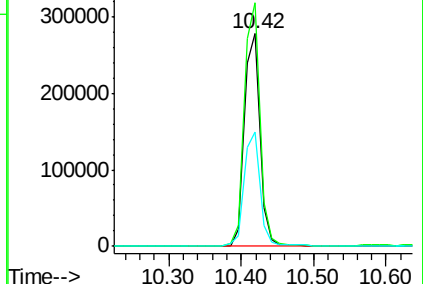
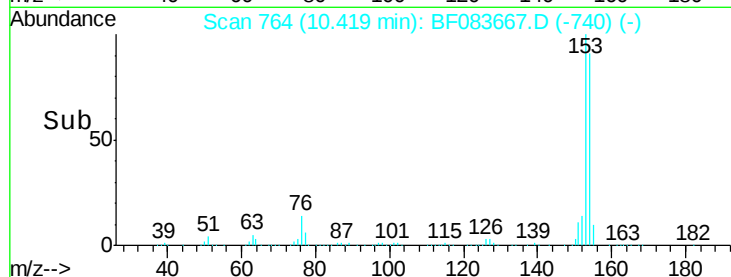
MMdadoda
12/10/2015 5:50:31 PM



Abundance Ion 154.00 (153.70 to 154.70): E

Ion 153.00 (152.70 to 153.70): E

Ion 152.00 (151.70 to 152.70): E



#54

Dibenzofuran

Concen: 2.31 ng

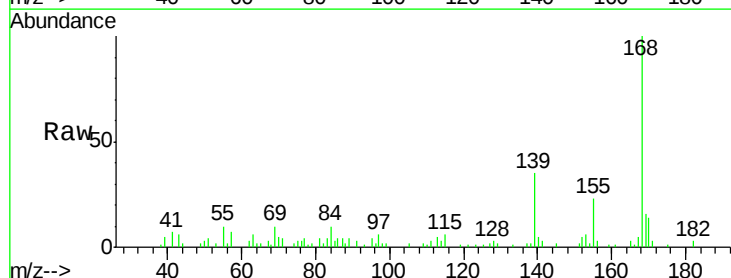
RT: 10.72 min Scan# 790

Delta R.T. -0.01 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

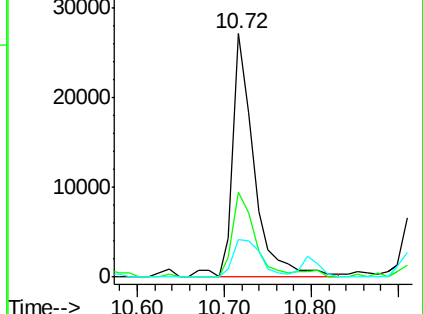
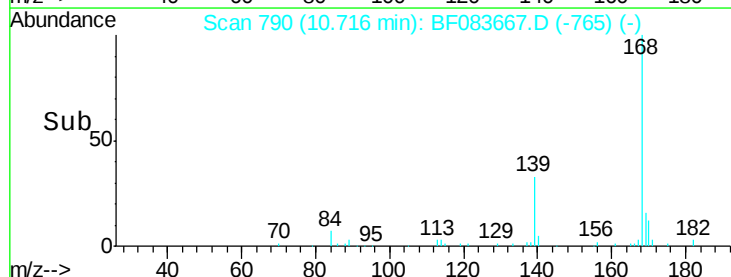
Tgt Ion:	168	Resp:	46596
Ion Ratio	Lower	Upper	
168	100		
139	34.9	28.0	42.0
169	15.7	10.8	16.2

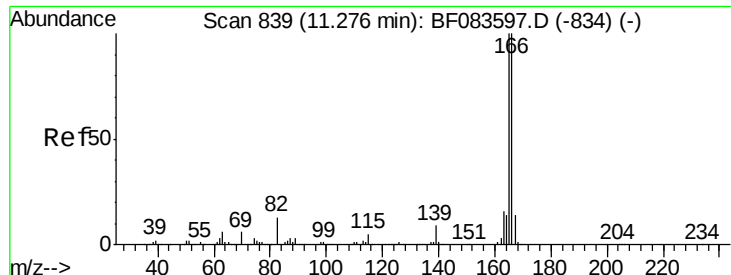


Abundance Ion 168.00 (167.70 to 168.70): E

Ion 139.00 (138.70 to 139.70): E

Ion 169.00 (168.70 to 169.70): E





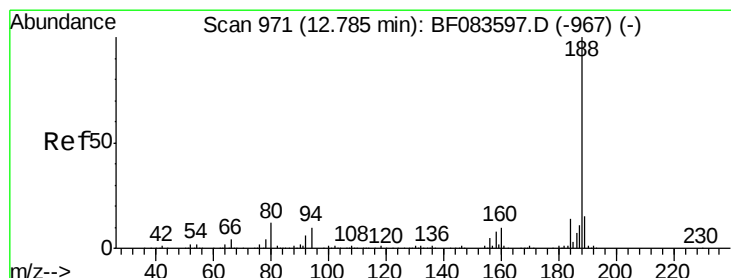
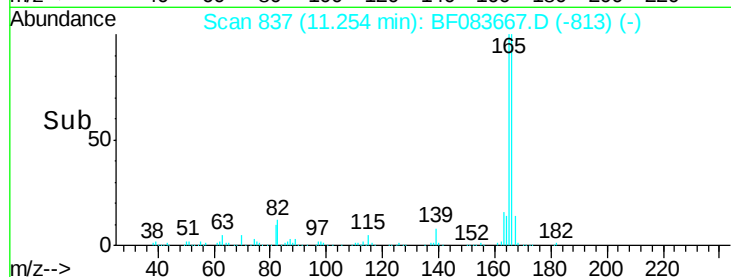
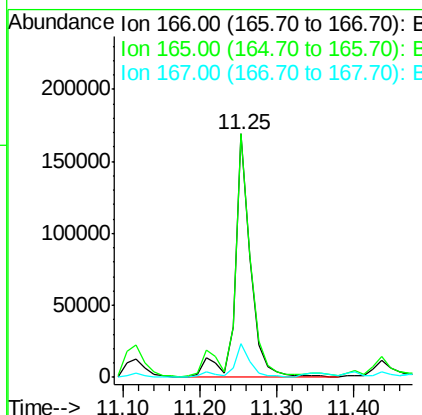
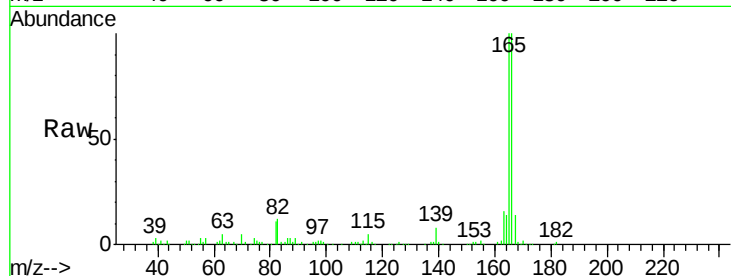
#57
Fluorene
 Concen: 13.73 ng
 RT: 11.25 min Scan# 837
 Delta R.T. -0.02 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Instrument :
 BNA_F
 ClientSampleId :
 SB-P3WC-09(0-8)DL

Tot Ion	Ion	Ratio	Resp	Lower	Upper
166	100		241218		
165	100.2	80.0	120.0		
167	13.9	10.6	16.0		

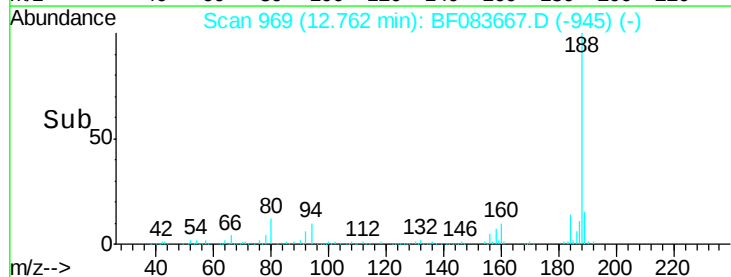
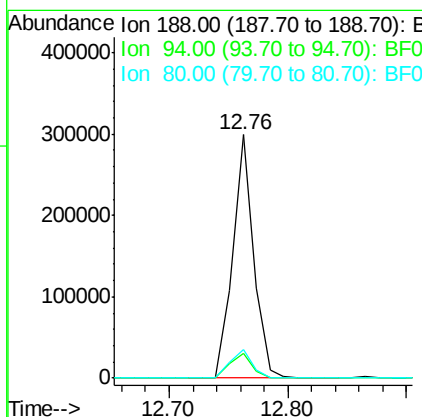
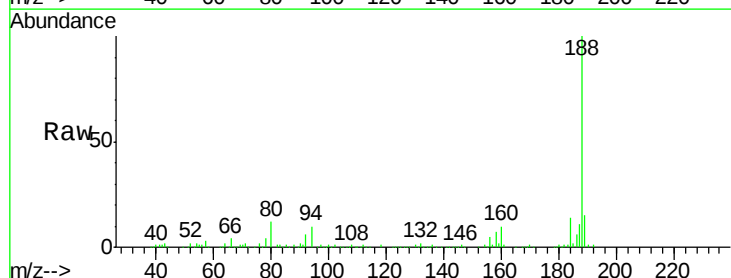
Manual Integrations
 APPROVED

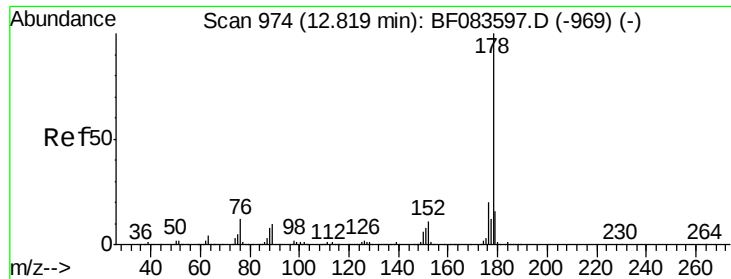
MMdadoda
 12/10/2015 5:50:31 PM



#63
Phenanthrene-d10
 Concen: 20.00 ng
 RT: 12.76 min Scan# 969
 Delta R.T. -0.02 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Tgt Ion	Ion	Ratio	Resp	Lower	Upper
188	100		366201		
94	10.0	9.4	14.2		
80	11.8	10.6	16.0		





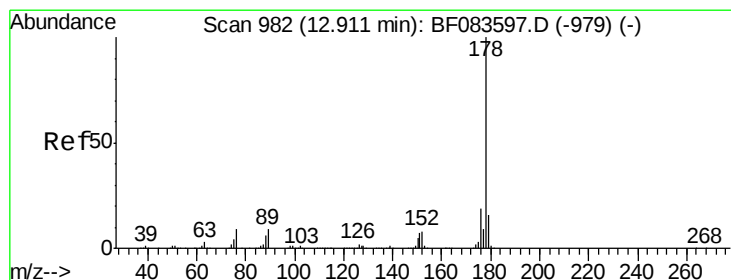
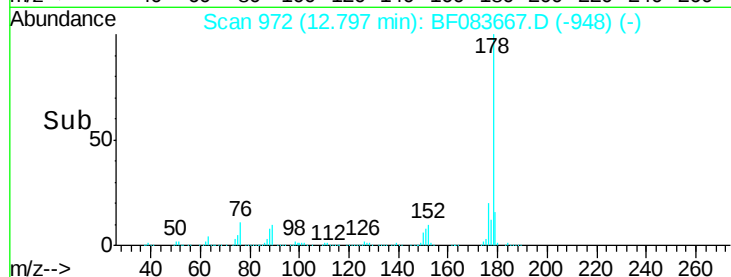
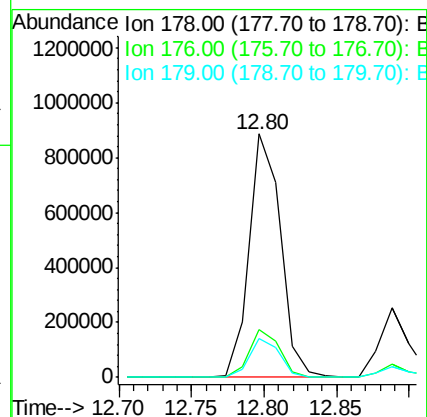
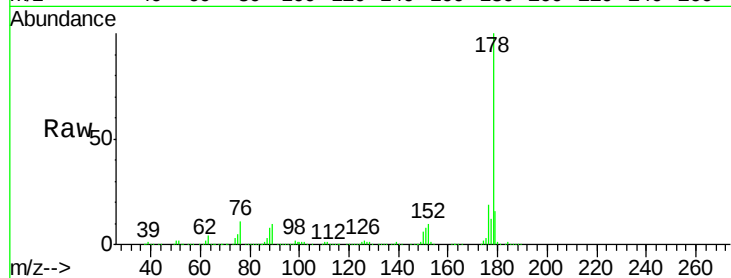
#70
Phenanthrene
Concen: 63.48 ng
RT: 12.80 min Scan# 972
Delta R.T. -0.02 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Tot Ion	Ion	Ratio	Lower	Upper
178	100			
176	19.5	15.7	23.5	
179	16.1	12.2	18.4	

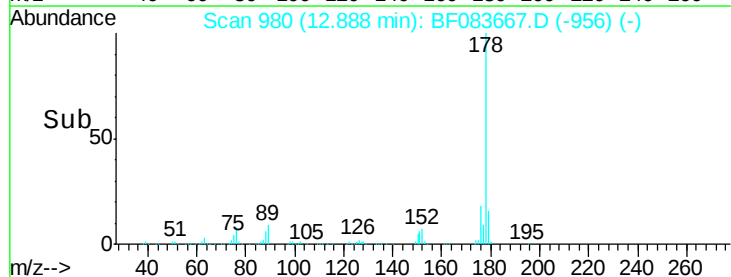
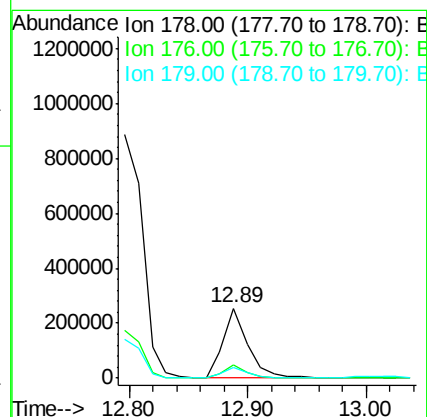
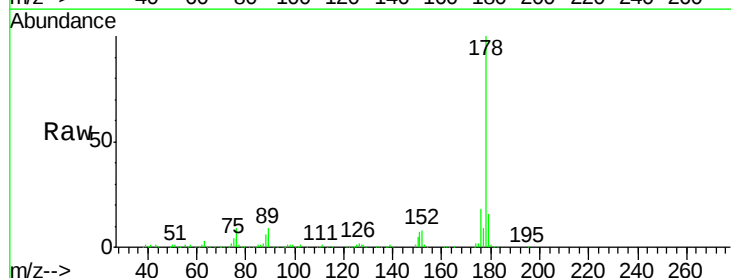
Manual Integrations
APPROVED

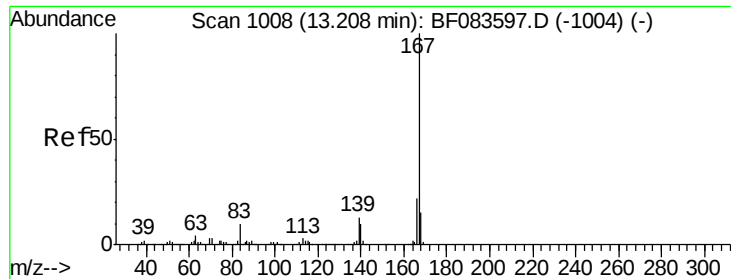
MMdadoda
12/10/2015 5:50:31 PM



#71
Anthracene
Concen: 16.69 ng
RT: 12.89 min Scan# 980
Delta R.T. -0.02 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Tgt Ion	Ion	Ratio	Lower	Upper
178	100			
176	18.2	15.2	22.8	
179	16.0	12.6	18.8	





#72

Carbazole

Concen: 2.07 ng

RT: 13.21 min Scan# 1008

Delta R.T. 0.00 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

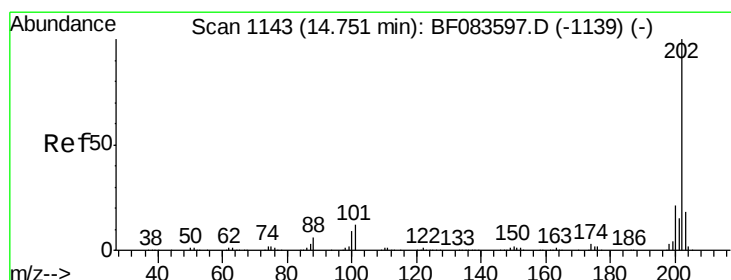
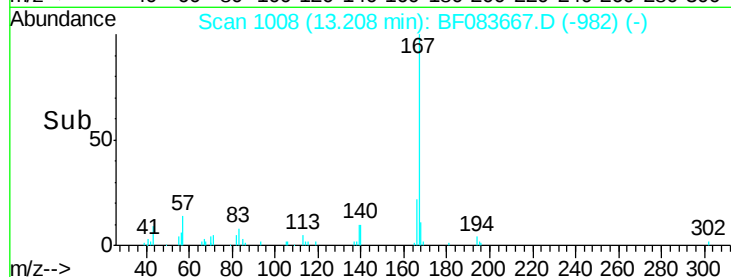
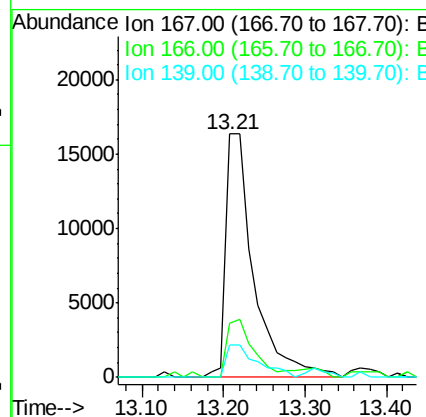
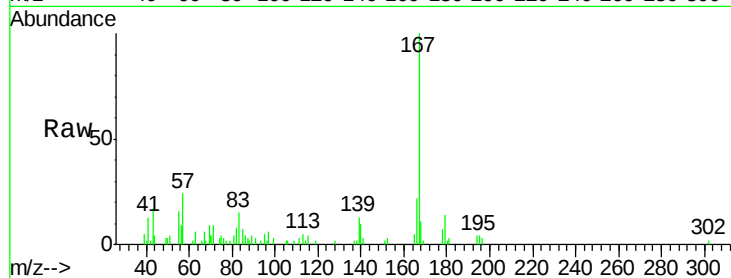
ClientSampleId :

SB-P3WC-09(0-8)DL

Tot Ion:	167	Resp:	38768
Ion Ratio	Lower	Upper	
167	100		
166	22.1	17.2	25.8
139	13.2	9.3	13.9

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM



#74

Fluoranthene

Concen: 36.05 ng

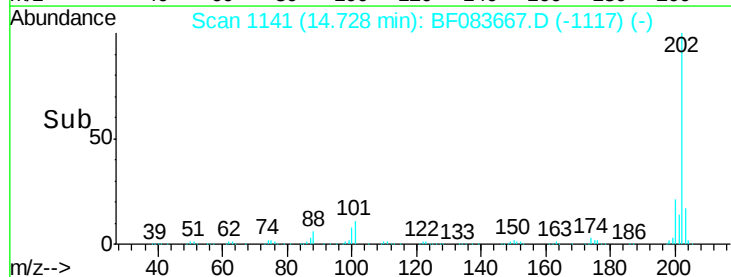
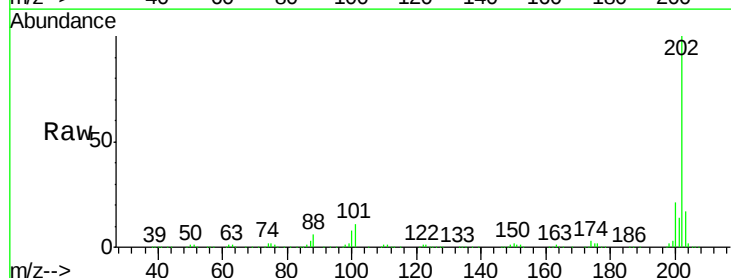
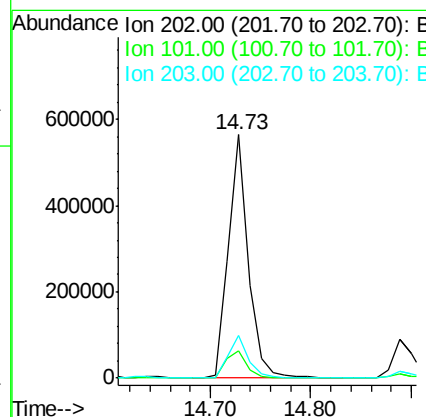
RT: 14.73 min Scan# 1141

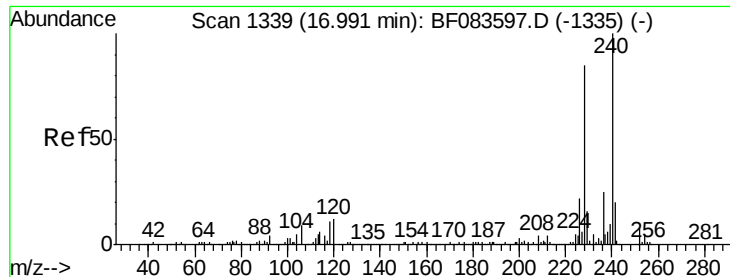
Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Tgt Ion:	202	Resp:	776019
Ion Ratio	Lower	Upper	
202	100		
101	11.0	0.0	31.5
203	17.5	0.0	37.6





#75

Chrysene-d12

Concen: 20.00 ng

RT: 16.97 min Scan# 1337

Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Instrument :

BNA_F

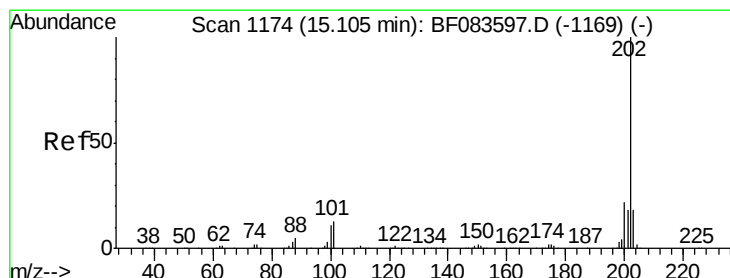
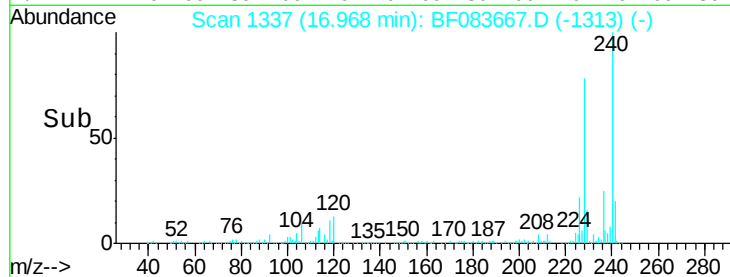
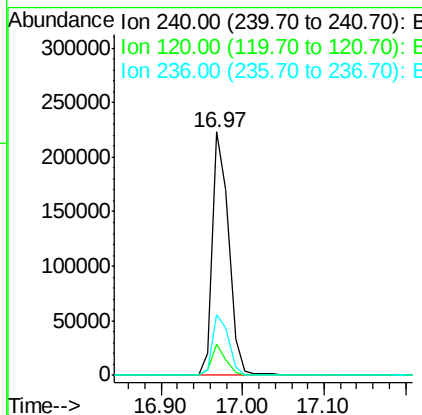
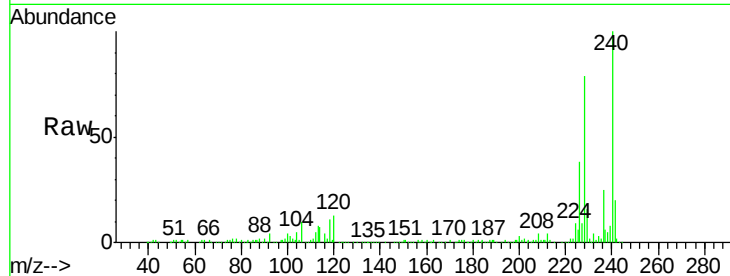
ClientSampleId :

SB-P3WC-09(0-8)DL

Tot Ion:	240	Resp:	314184
Ion Ratio	Lower	Upper	
240	100		
120	12.8	8.1	12.1#
236	24.8	20.8	31.2

Manual Integrations
APPROVED

MMdadoda
12/10/2015 5:50:31 PM



#77

Pyrene

Concen: 39.50 ng

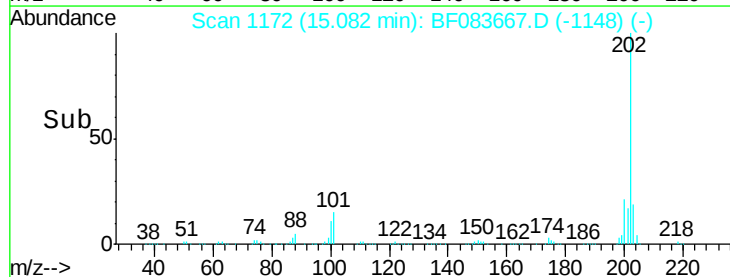
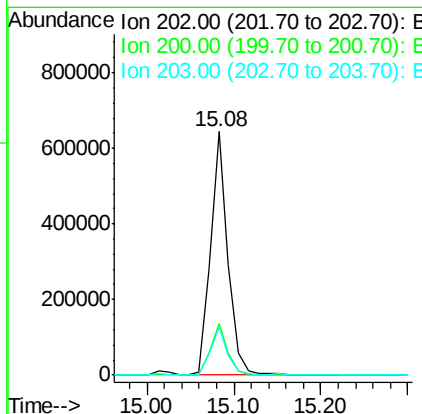
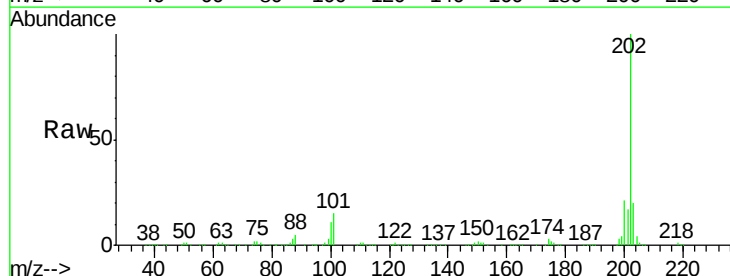
RT: 15.08 min Scan# 1172

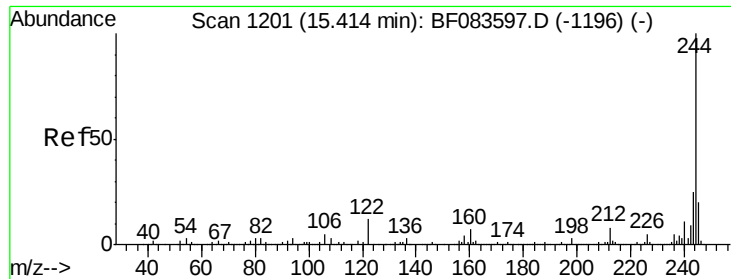
Delta R.T. -0.02 min

Lab File: BF083667.D

Acq: 10 Dec 2015 5:45

Tgt Ion:	202	Resp:	893501
Ion Ratio	Lower	Upper	
202	100		
200	21.4	16.7	25.1
203	19.5	14.3	21.5





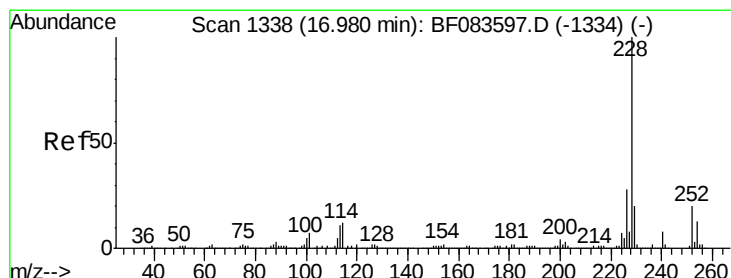
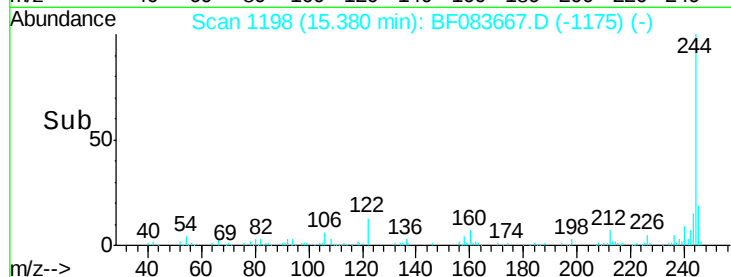
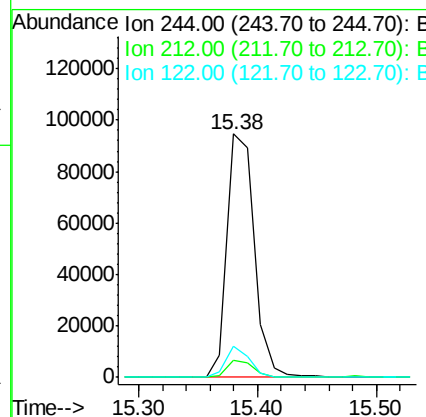
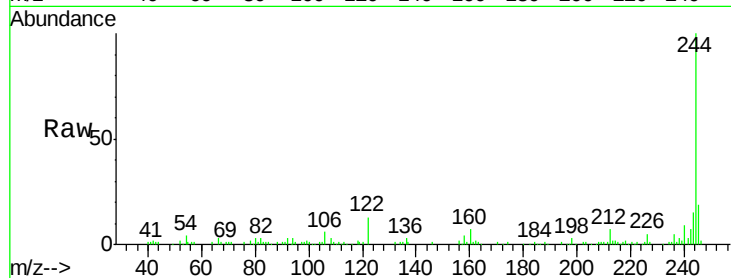
#78
 Terphenyl-d14
 Concen: 11.23 ng
 RT: 15.38 min Scan# 1198
 Delta R.T. -0.03 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Instrument :
 BNA_F
 ClientSampleId :
 SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Lower	Upper
244	100		
212	7.1	6.1	9.1
122	12.7	11.0	16.6

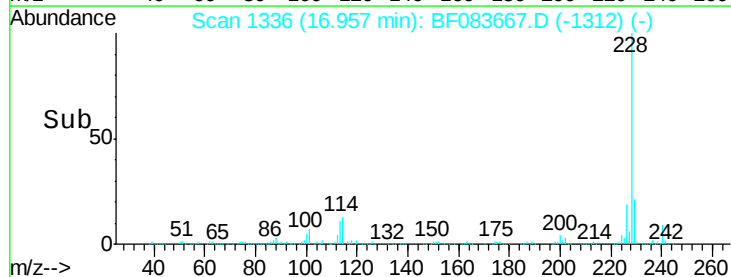
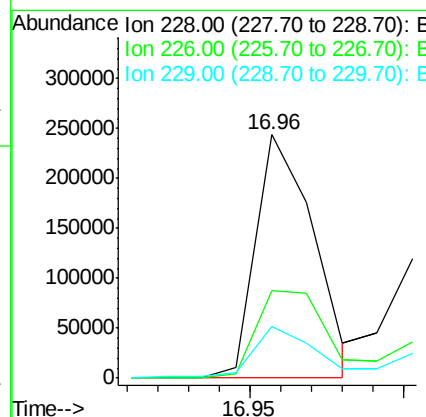
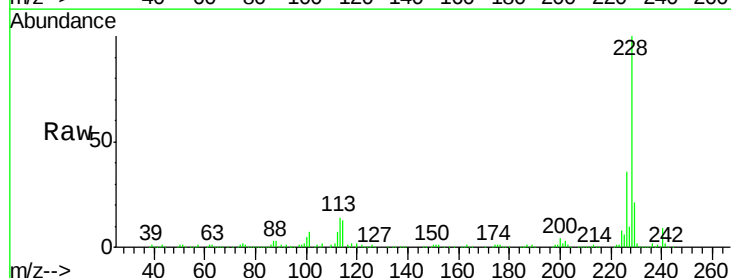
Manual Integrations
 APPROVED

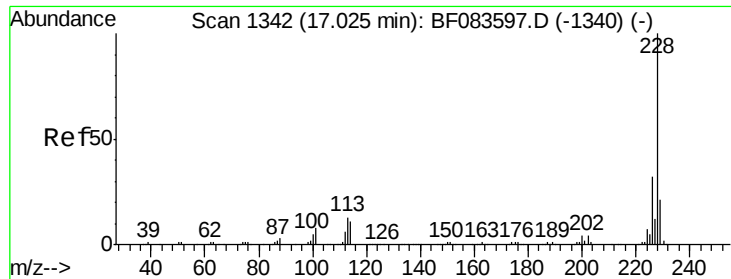
MMdadoda
 12/10/2015 5:50:31 PM



#80
 Benzo(a)anthracene
 Concen: 17.38 ng m
 RT: 16.96 min Scan# 1336
 Delta R.T. -0.02 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Lower	Upper
228	100		
226	35.7	22.3	33.5#
229	21.3	15.7	23.5





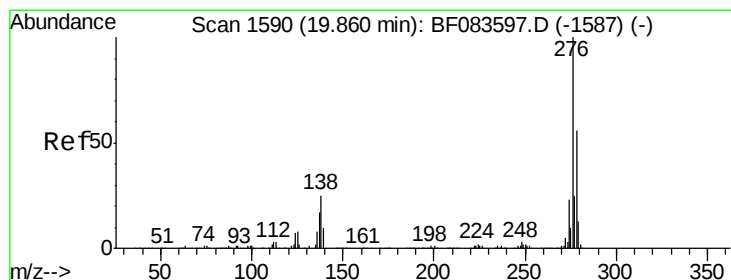
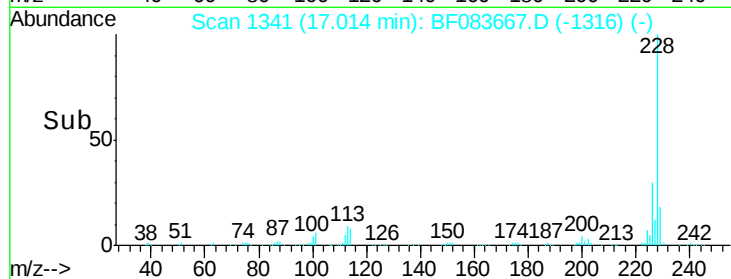
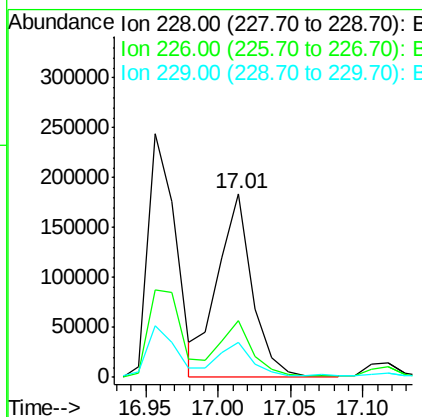
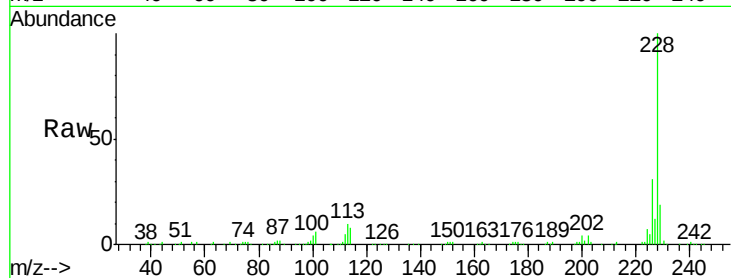
#82
Chrysene
Concen: 16.50 ng
RT: 17.01 min Scan# 1341
Delta R.T. -0.01 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Lower	Upper
228	100		
226	30.7	24.7	37.1
229	18.9	16.3	24.5

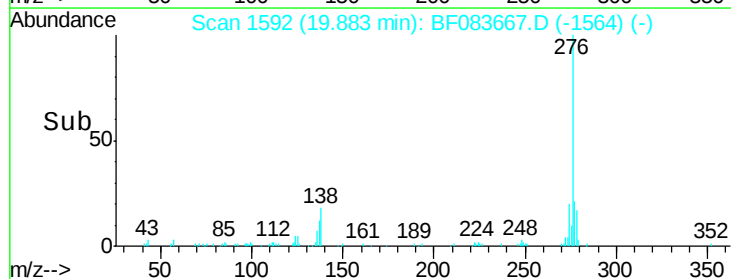
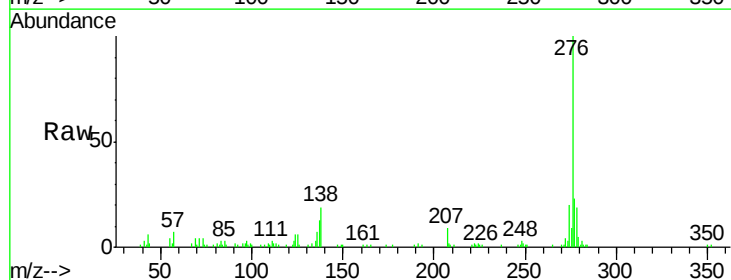
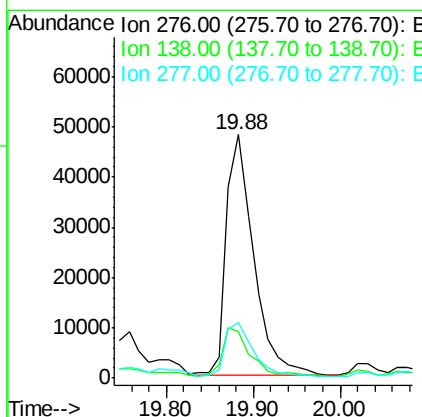
Manual Integrations
APPROVED

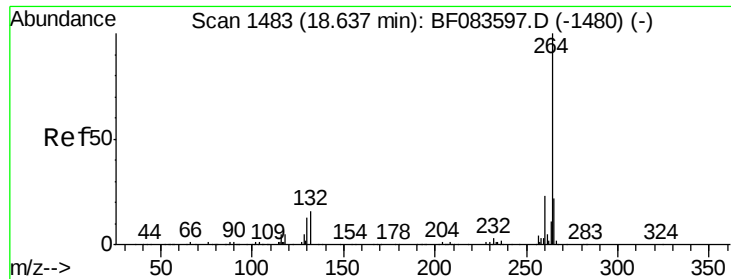
MMdadoda
12/10/2015 5:50:31 PM



#85
Indeno(1,2,3-cd)pyrene
Concen: 8.50 ng
RT: 19.88 min Scan# 1592
Delta R.T. 0.02 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Lower	Upper
276	100		
138	21.1	0.0	0.0#
277	22.8	0.0	0.0#





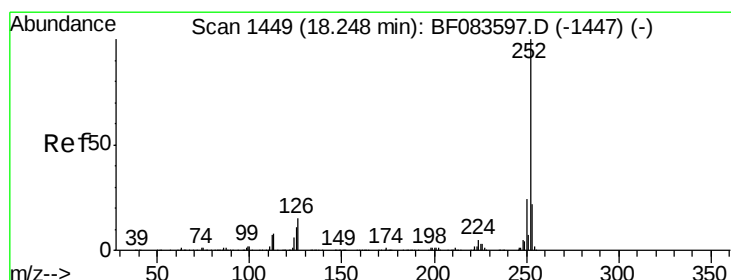
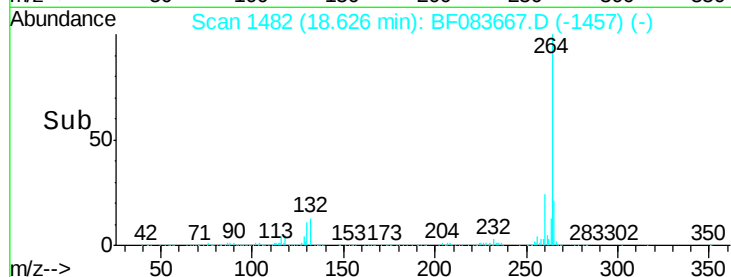
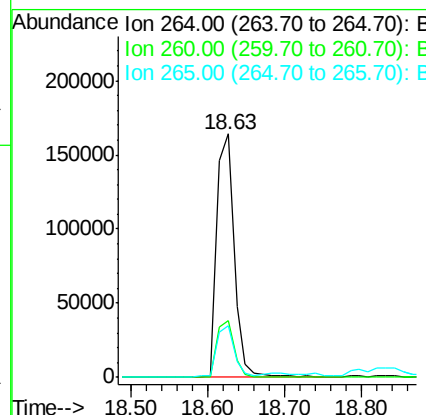
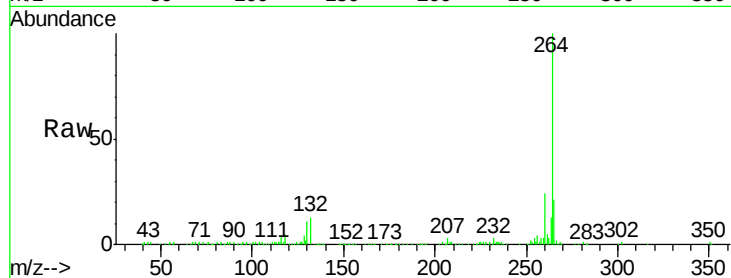
#86
Pervlene-d12
Concen: 20.00 ng
RT: 18.63 min Scan# 1482
Delta R.T. -0.01 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Lower	Upper
264	100		
260	23.5	19.4	29.0
265	21.2	17.8	26.6

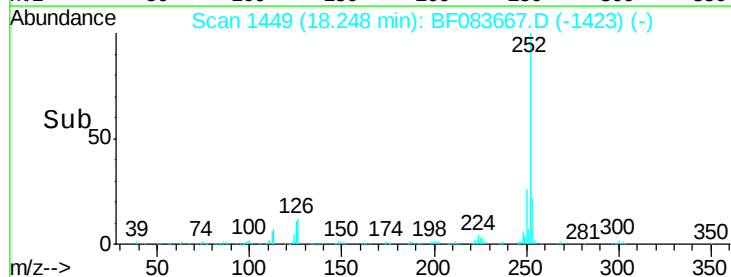
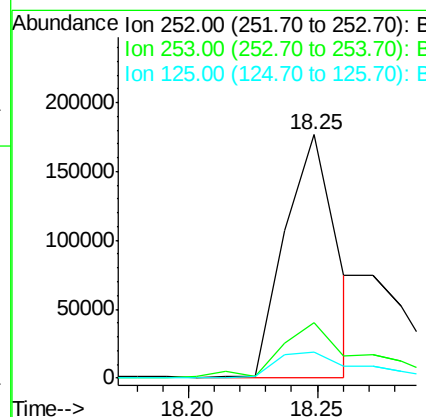
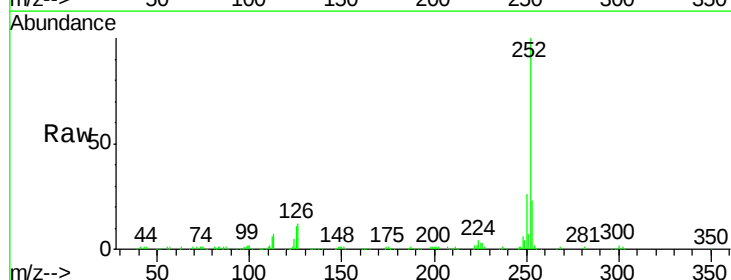
Manual Integrations
APPROVED

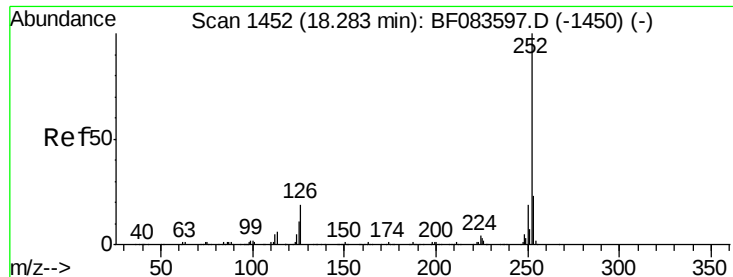
MMdadoda
12/10/2015 5:50:31 PM



#87
Benzo(b)fluoranthene
Concen: 16.74 ng m
RT: 18.25 min Scan# 1449
Delta R.T. 0.00 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Lower	Upper
252	100		
253	22.7	18.2	27.4
125	10.9	8.2	12.4





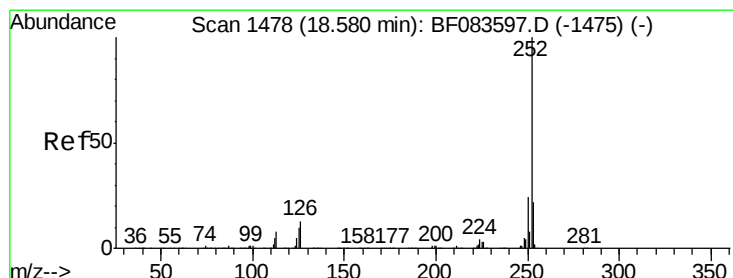
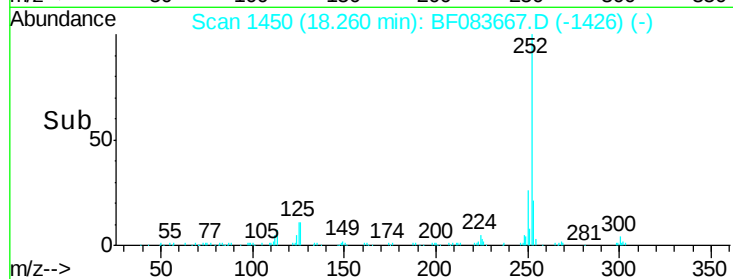
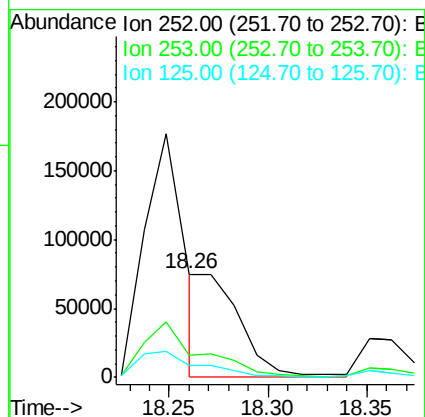
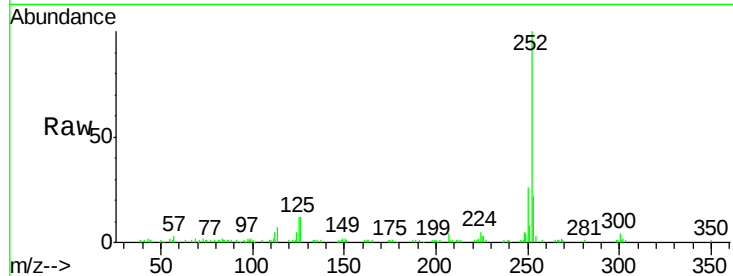
#88
Benzo(k)fluoranthene
Concen: 6.47 ng m
RT: 18.26 min Scan# 1450
Delta R.T. -0.02 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Instrument :
BNA_F
ClientSampleId :
SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Lower	Upper
252	100		
253	21.5	18.6	27.8
125	11.9	11.5	17.3

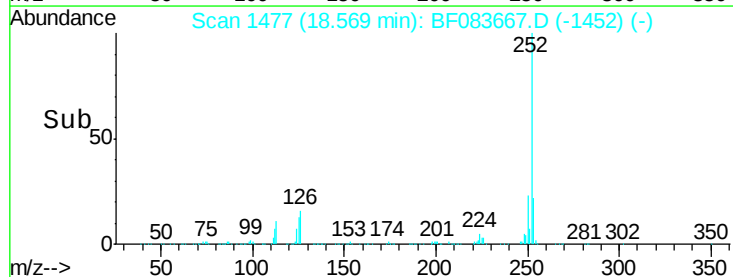
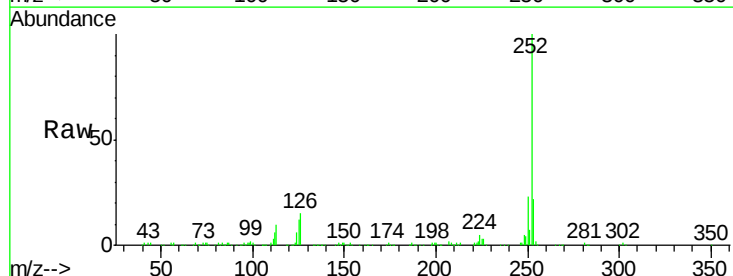
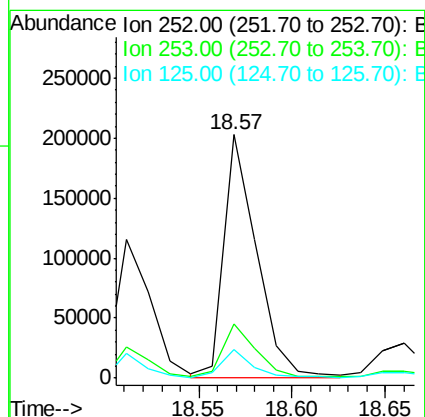
Manual Integrations
APPROVED

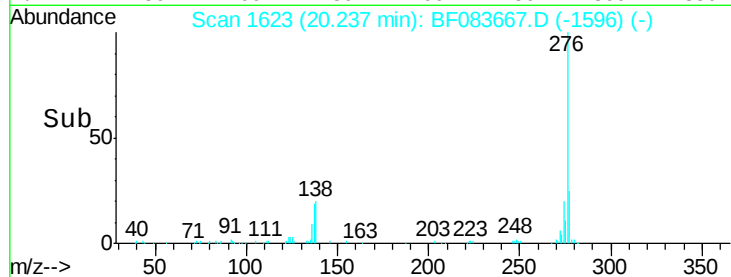
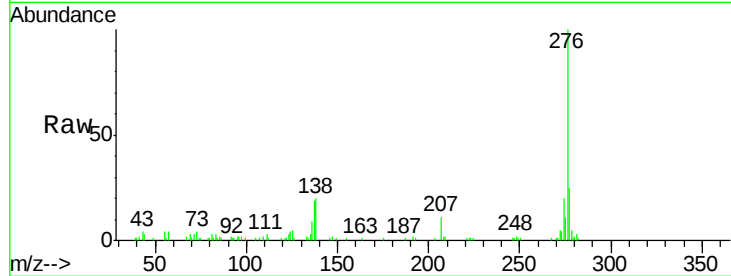
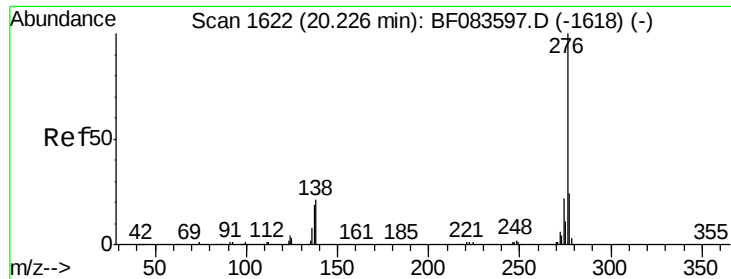
MMdadoda
12/10/2015 5:50:31 PM



#89
Benzo(a)pyrene
Concen: 17.14 ng
RT: 18.57 min Scan# 1477
Delta R.T. -0.01 min
Lab File: BF083667.D
Acq: 10 Dec 2015 5:45

Tgt Ion	Ratio	Lower	Upper
252	100		
253	22.1	17.5	26.3
125	11.9	11.0	16.6





#91
 Benzo(a,h,i)perylene
 Concen: 10.17 ng
 RT: 20.24 min Scan# 1623
 Delta R.T. 0.01 min
 Lab File: BF083667.D
 Acq: 10 Dec 2015 5:45

Instrument :
 BNA_F
 ClientSampleId :
 SB-P3WC-09(0-8)DL

Tot Ion	Ratio	Lower	Upper
276	100		
277	24.6	19.2	28.8
138	19.8	19.5	29.3

Manual Integrations
 APPROVED

MMdadoda
 12/10/2015 5:50:31 PM

