Quantitation Report (QT Reviewed)

Data Path : Z:\svoasrv\HPCHEM1\BNA_N\Data\BN101321\
Data File : BN016910.D
Acq On : 12 Oct 2021 22:24
Operator : CG/JU
Sample : SSTDICV0.4
Misc :
ALS Vial : 10 Sample Multiplier: 1

Instrument : BNA_N
ClientSampleId : ICVBN101321

Quant Time: Oct 13 02:23:48 2021
Quant Method : Z:\SVOASRV\HPCHEM1\BNA_N\METHODS\8270-SIM-BN101321.M
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
QLast Update : Wed Oct 13 02:19:57 2021
Response via : Initial Calibration

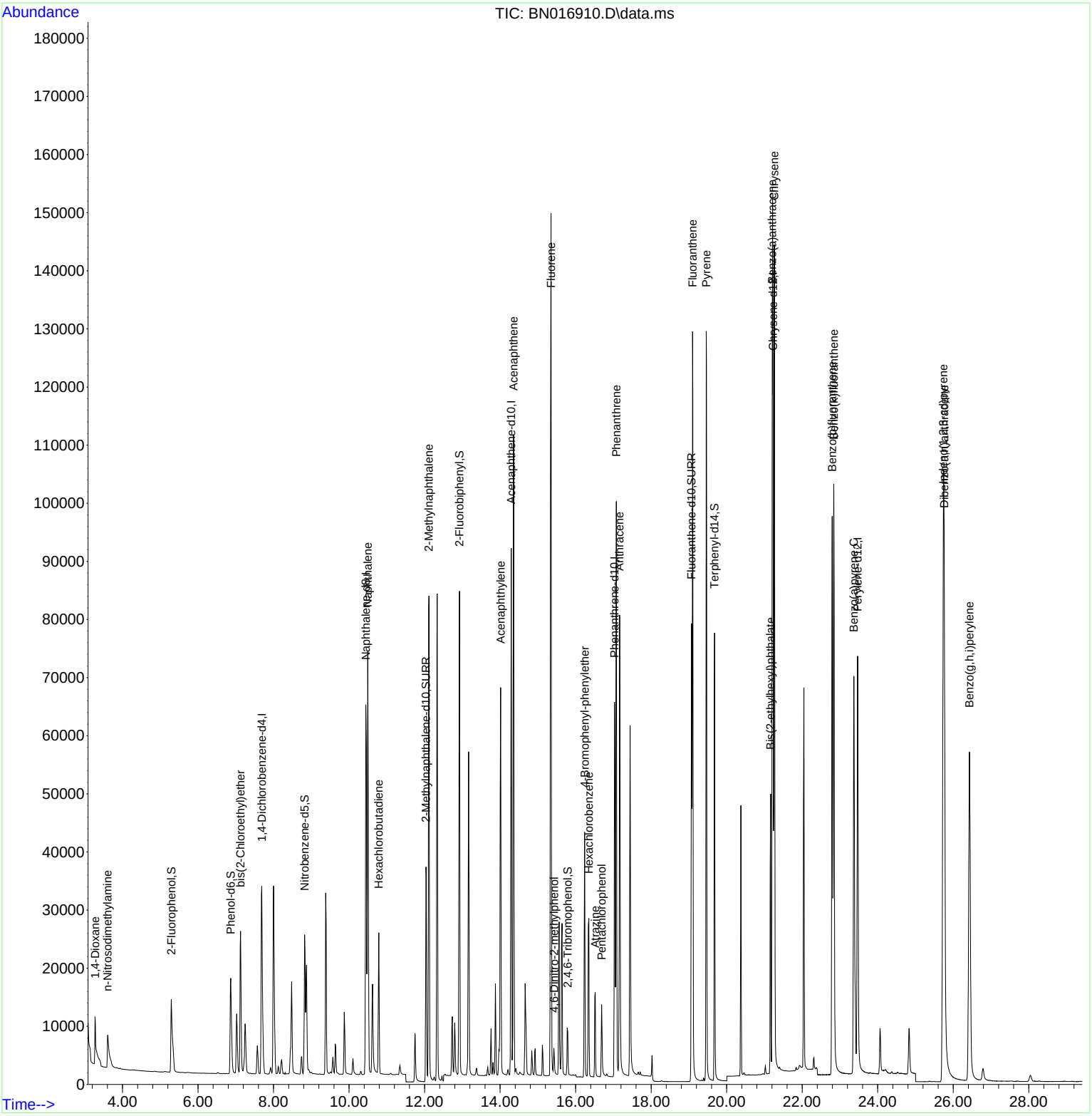
Compound	R.T.	QIon	Response	Conc	Units		Dev(Min)
Internal Standards							
1) 1,4-Dichlorobenzene-d4	7.689	152	21154	0.40	ng		0.00
7) Naphthalene-d8	10.445	136	93735	0.40	ng		#-0.01
13) Acenaphthene-d10	14.294	164	49758	0.40	ng		0.00
19) Phenanthrene-d10	17.030	188	92151	0.40	ng		#-0.01
29) Chrysene-d12	21.228	240	91989	0.40	ng		# 0.00
35) Perylene-d12	23.467	264	96513	0.40	ng		0.00
System Monitoring Compounds							
4) 2-Fluorophenol	5.291	112	19481	0.41	ng		0.00
5) Phenol-d6	6.868	99	21565	0.40	ng		0.00
8) Nitrobenzene-d5	8.823	82	22827	0.38	ng		0.00
11) 2-Methylnaphthalene-d10	12.038	152	51892	0.40	ng		0.00
14) 2,4,6-Tribromophenol	15.791	330	7743	0.34	ng		0.00
15) 2-Fluorobiphenyl	12.924	172	74237	0.39	ng		0.00
27) Fluoranthene-d10	19.068	212	91137	0.39	ng		0.00
31) Terphenyl-d14	19.679	244	79431	0.39	ng		0.00
Target Compounds							Qvalue
2) 1,4-Dioxane	3.281	88	5783	0.41	ng		96
3) n-Nitrosodimethylamine	3.604	42	6468	0.40	ng		99
6) bis(2-Chloroethyl)ether	7.126	93	23211	0.41	ng		100
9) Naphthalene	10.495	128	97034	0.40	ng		100
10) Hexachlorobutadiene	10.787	225	19214	0.40	ng	#	100
12) 2-Methylnaphthalene	12.114	142	62199	0.40	ng		100
16) Acenaphthylene	14.015	152	78073	0.39	ng		100
17) Acenaphthene	14.358	154	53869	0.39	ng		100
18) Fluorene	15.347	166	65475	0.40	ng		100
20) 4,6-Dinitro-2-methylph...	15.436	198	3622	0.38	ng		99
21) 4-Bromophenyl-phenylether	16.239	248	21167	0.39	ng		96
22) Hexachlorobenzene	16.348	284	24874	0.40	ng		100
23) Atrazine	16.519	200	13756	0.39	ng		99
24) Pentachlorophenol	16.689	266	6798	0.42	ng		99
25) Phenanthrene	17.079	178	103535	0.39	ng		100
26) Anthracene	17.164	178	88427	0.40	ng		100
28) Fluoranthene	19.098	202	115714	0.41	ng		100
30) Pyrene	19.460	202	116243	0.40	ng		100
32) Benzo(a)anthracene	21.206	228	111900	0.40	ng		97
33) Chrysene	21.259	228	119714	0.40	ng		97
34) Bis(2-ethylhexyl)phtha...	21.164	149	44650	0.44	ng		100
36) Indeno(1,2,3-cd)pyrene	25.737	276	146131	0.40	ng		100
37) Benzo(b)fluoranthene	22.793	252	119162	0.39	ng		99
38) Benzo(k)fluoranthene	22.838	252	127698	0.42	ng		99
39) Benzo(a)pyrene	23.368	252	112503	0.40	ng		99
40) Dibenzo(a,h)anthracene	25.761	278	119035	0.40	ng		99
41) Benzo(g,h,i)perylene	26.428	276	124869	0.39	ng		100

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

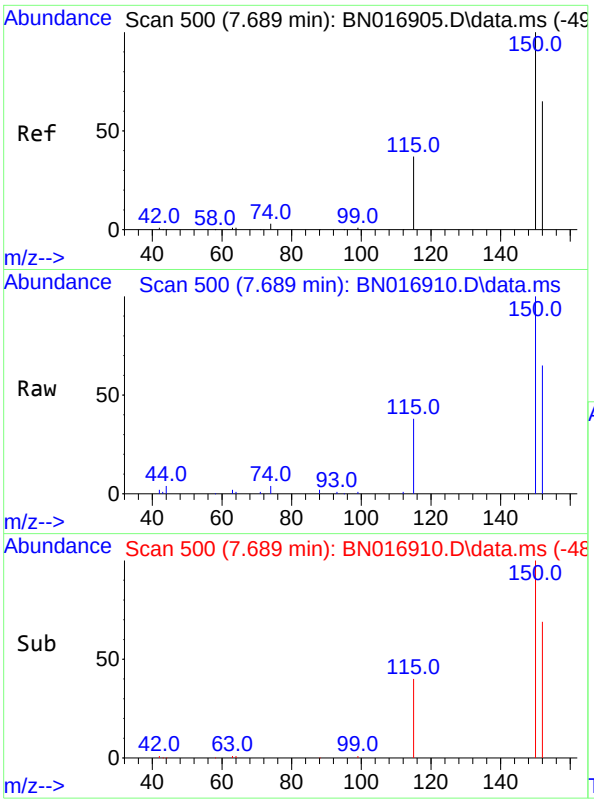
Data Path : Z:\svoasrv\HPCHEM1\BNA_N\Data\BN101321\
Data File : BN016910.D
Acq On : 12 Oct 2021 22:24
Operator : CG/JU
Sample : SSTDICV0.4
Misc :
ALS Vial : 10 Sample Multiplier: 1

Instrument :
BNA_N
ClientSampleId :
ICVBN101321

Quant Time: Oct 13 02:23:48 2021
Quant Method : Z:\SVOASRV\HPCHEM1\BNA_N\METHODS\8270-SIM-BN101321.M
Quant Title : ASP BNA STANDARDS FOR 5 POINT CALIBRATION
QLast Update : Wed Oct 13 02:19:57 2021
Response via : Initial Calibration



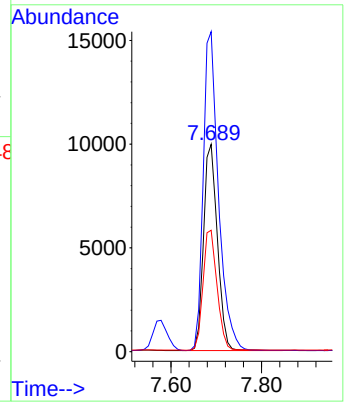
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

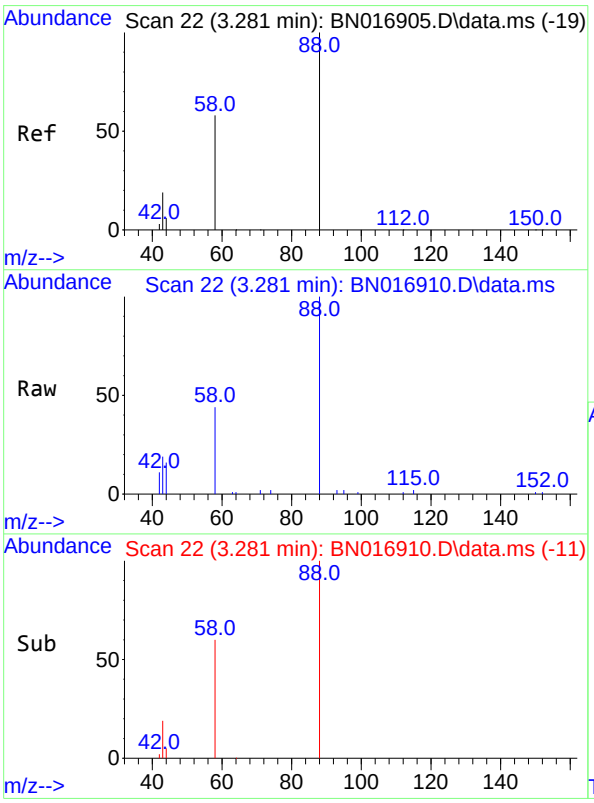


#1
1,4-Dichlorobenzene-d4
Concen: 0.40 ng
RT: 7.689 min Scan# 500
Delta R.T. -0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:152 Resp: 21154

Ion	Ratio	Lower	Upper
152	100		
150	154.4	122.6	183.8
115	58.6	46.1	69.1

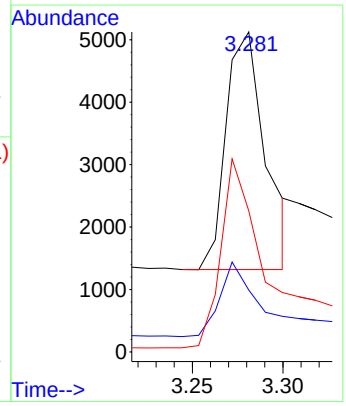




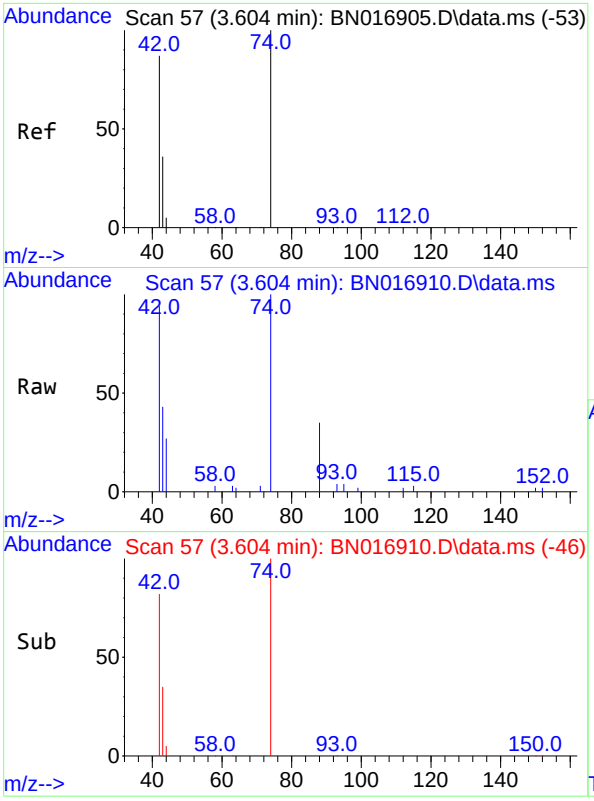
#2
1,4-Dioxane
Concen: 0.41 ng
RT: 3.281 min Scan# 22
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion: 88 Resp: 5783

Ion	Ratio	Lower	Upper
88	100		
43	29.5	24.3	36.5
58	77.1	65.2	97.8



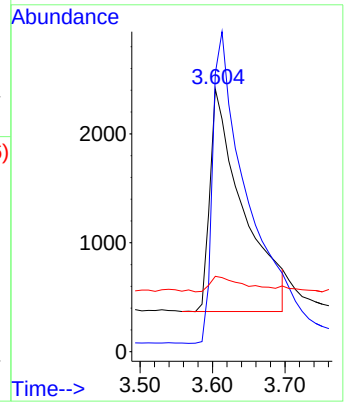
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

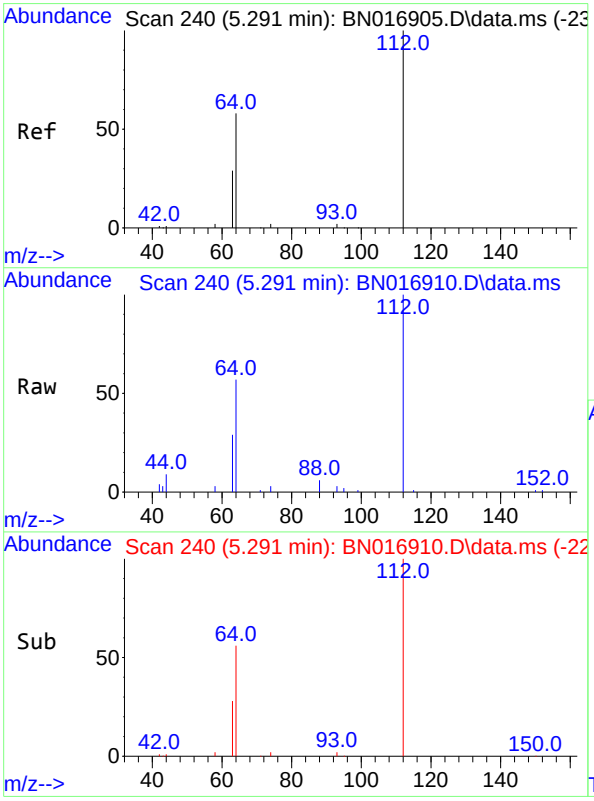


#3
n-Nitrosodimethylamine
Concen: 0.40 ng
RT: 3.604 min Scan# 57
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion: 42 Resp: 6468

Ion	Ratio	Lower	Upper
42	100		
74	144.7	114.4	171.6
44	7.1	5.7	8.5

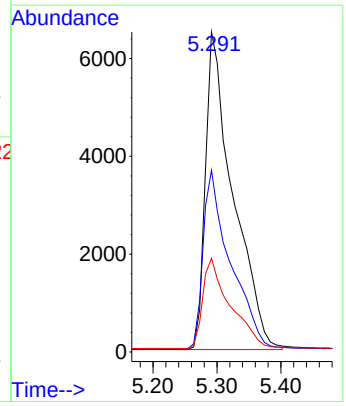




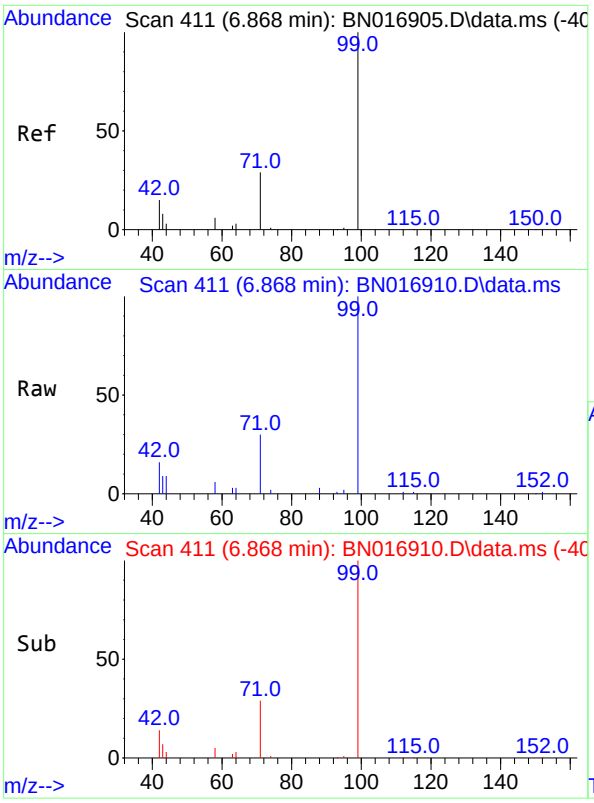
#4
2-Fluorophenol
Concen: 0.41 ng
RT: 5.291 min Scan# 240
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:112 Resp: 19481

Ion	Ratio	Lower	Upper
112	100		
64	56.0	45.0	67.4
63	28.3	22.6	33.8



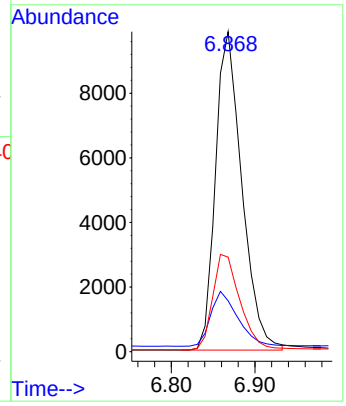
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

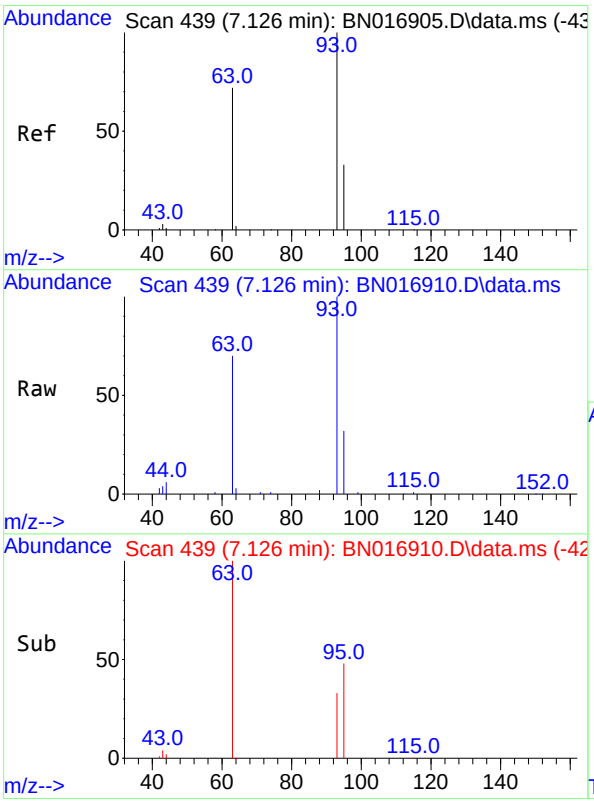


#5
Phenol-d6
Concen: 0.40 ng
RT: 6.868 min Scan# 411
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion: 99 Resp: 21565

Ion	Ratio	Lower	Upper
99	100		
42	17.7	14.2	21.4
71	30.9	24.5	36.7

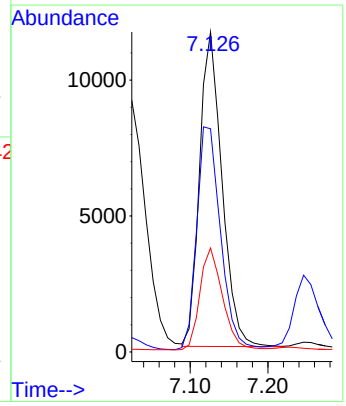




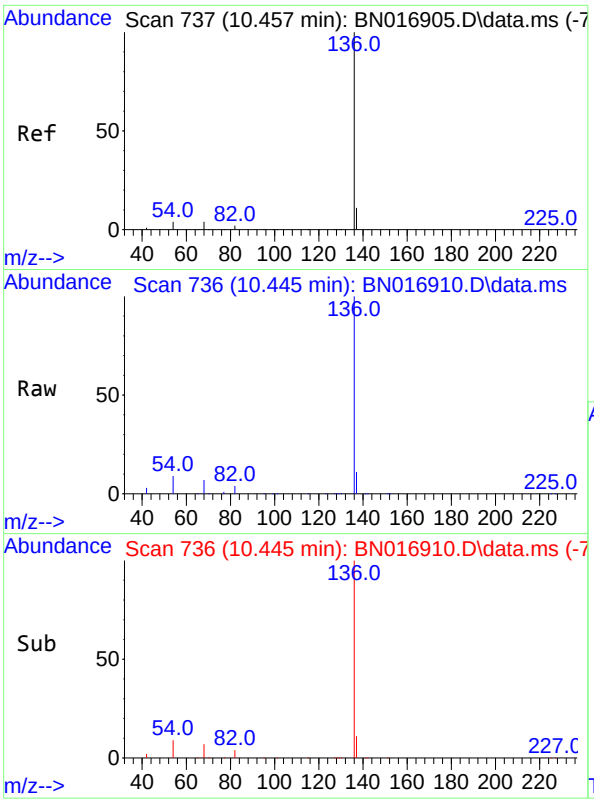
#6
bis(2-Chloroethyl)ether
Concen: 0.41 ng
RT: 7.126 min Scan# 439
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion: 93 Resp: 23211

Ion	Ratio	Lower	Upper
93	100		
63	75.5	60.3	90.5
95	32.8	26.2	39.4



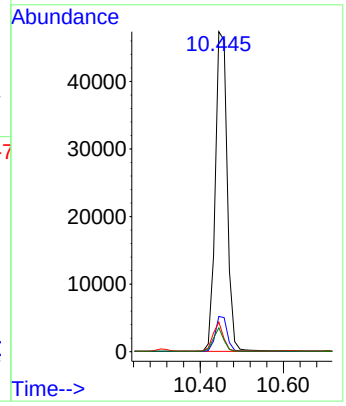
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

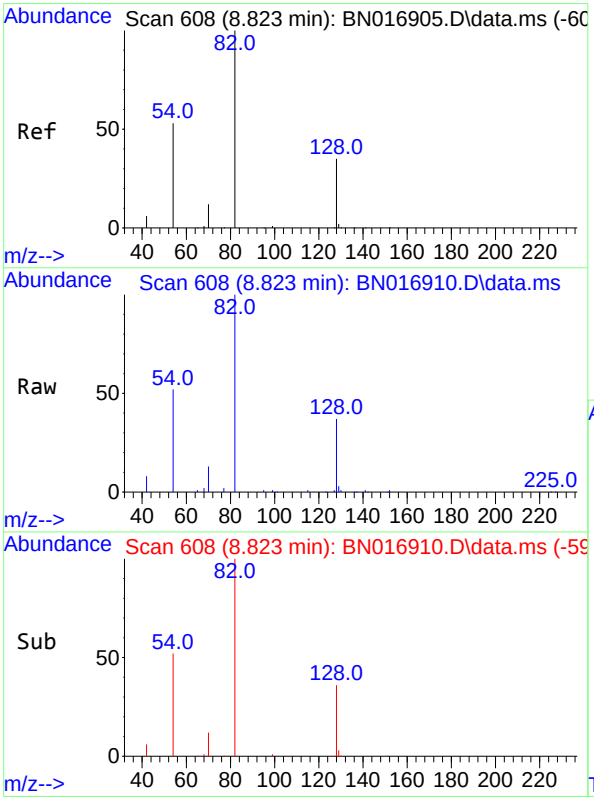


#7
Naphthalene-d8
Concen: 0.40 ng
RT: 10.445 min Scan# 736
Delta R.T. -0.012 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:136 Resp: 93735

Ion	Ratio	Lower	Upper
136	100		
137	11.0	8.7	13.1
54	9.2	3.7	5.5#
68	7.4	3.2	4.8#

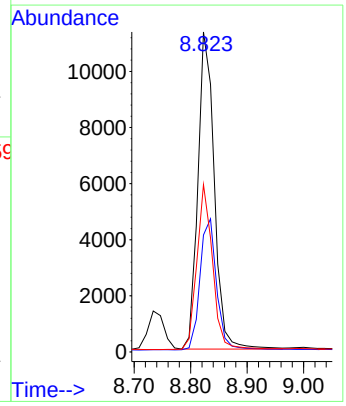




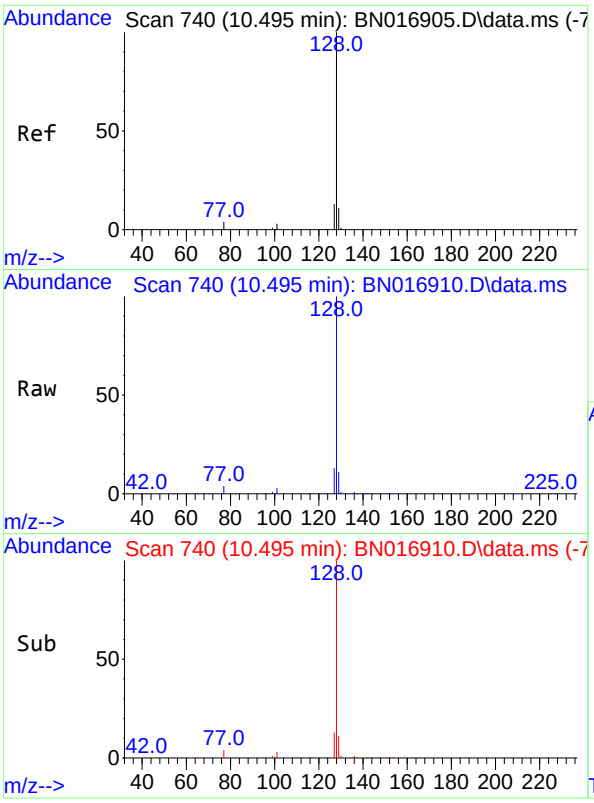
#8
Nitrobenzene-d5
Concen: 0.38 ng
RT: 8.823 min Scan# 608
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion: 82 Resp: 22827

Ion	Ratio	Lower	Upper
82	100		
128	36.5	28.3	42.5
54	52.3	43.0	64.4



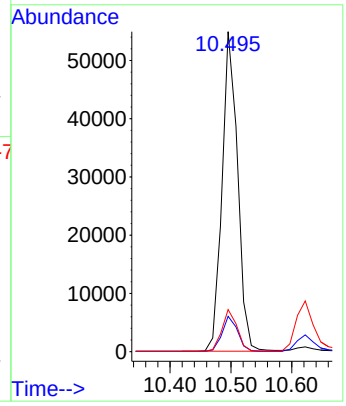
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

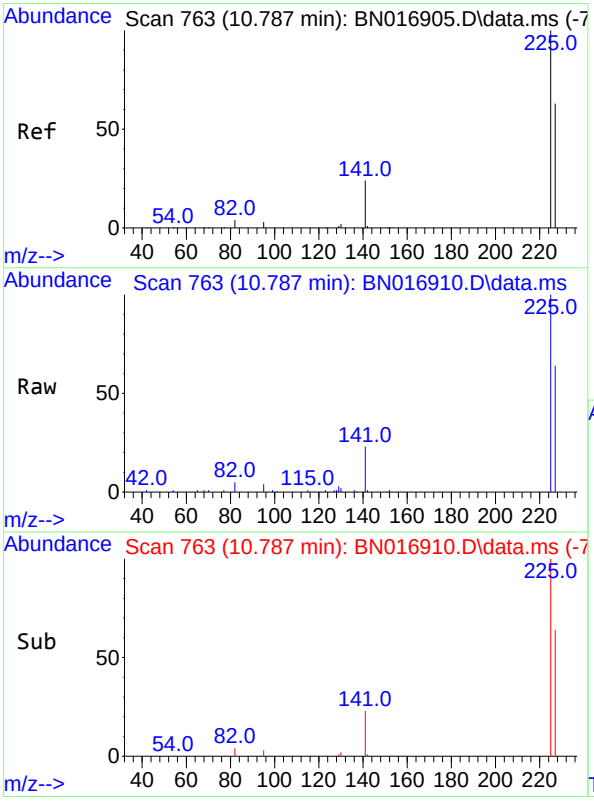


#9
Naphthalene
Concen: 0.40 ng
RT: 10.495 min Scan# 740
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:128 Resp: 97034

Ion	Ratio	Lower	Upper
128	100		
129	11.1	8.7	13.1
127	13.2	10.6	16.0

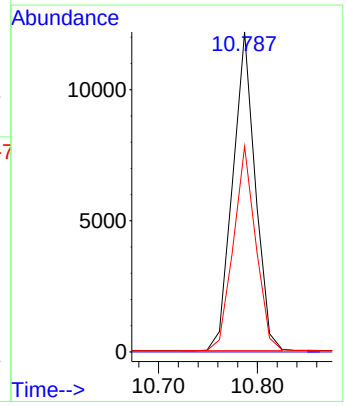


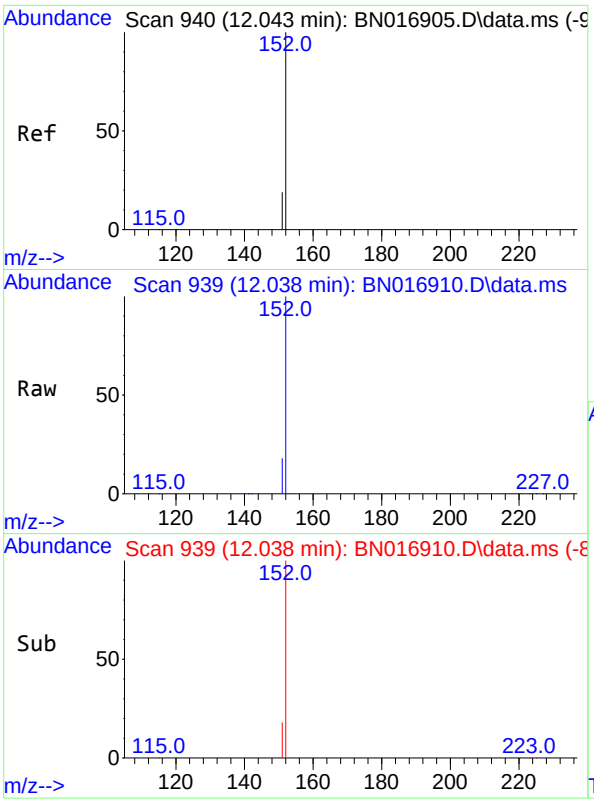


#10
Hexachlorobutadiene
Concen: 0.40 ng
RT: 10.787 min Scan# 763
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:225 Resp: 19214

Ion	Ratio	Lower	Upper
225	100		
223	0.0	0.0	0.0
227	63.8	51.1	76.7

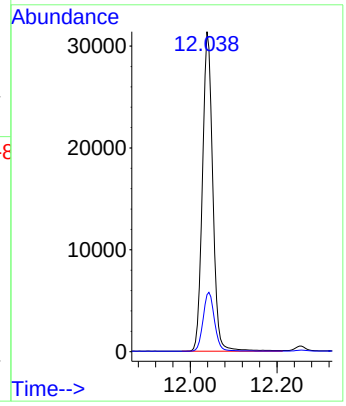




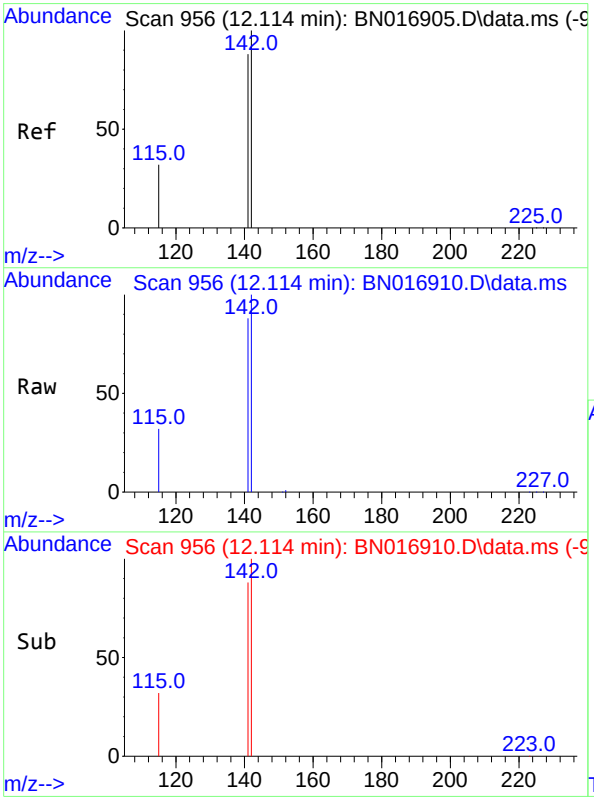
#11
2-Methylnaphthalene-d10
Concen: 0.40 ng
RT: 12.038 min Scan# 939
Delta R.T. -0.004 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:152 Resp: 51892

Ion	Ratio	Lower	Upper
152	100		
151	20.5	16.2	24.4



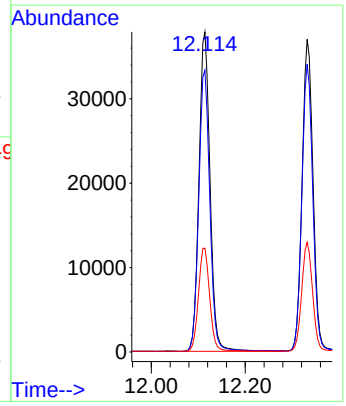
Instrument :
BNA_N
ClientSampleId :
ICVBN101321



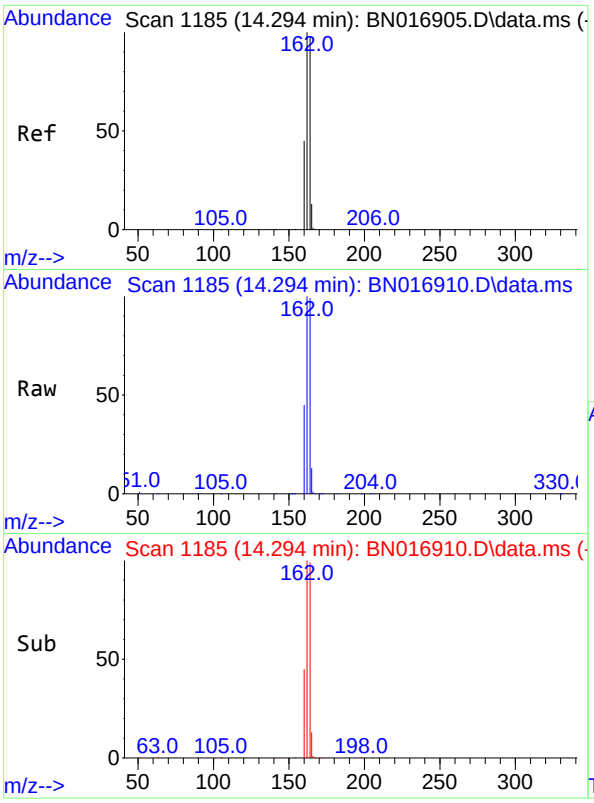
#12
2-Methylnaphthalene
Concen: 0.40 ng
RT: 12.114 min Scan# 956
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:142 Resp: 62199

Ion	Ratio	Lower	Upper
142	100		
141	88.1	70.5	105.7
115	32.5	26.0	39.0



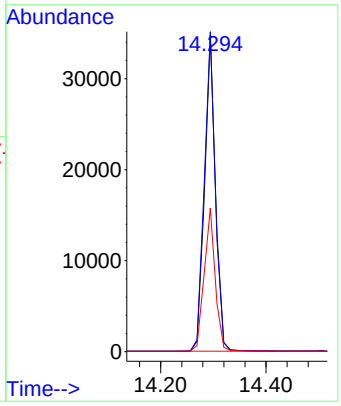
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

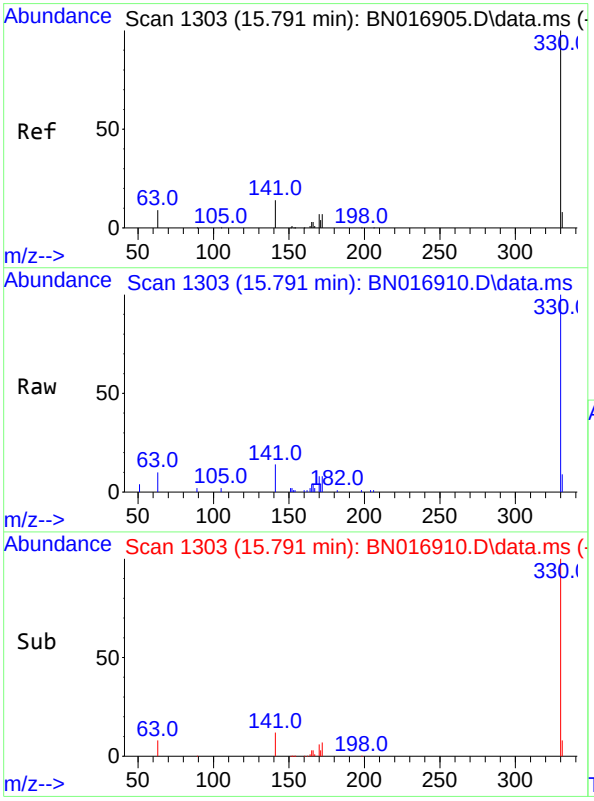


#13
Acenaphthene-d10
Concen: 0.40 ng
RT: 14.294 min Scan# 1185
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:164 Resp: 49758

Ion	Ratio	Lower	Upper
164	100		
162	101.1	81.4	122.0
160	45.4	37.0	55.4

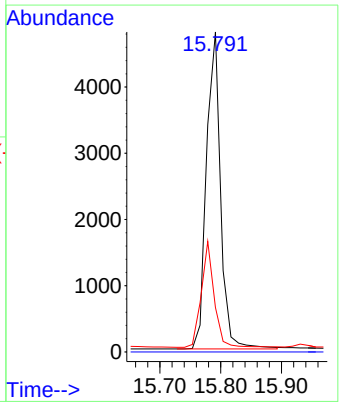




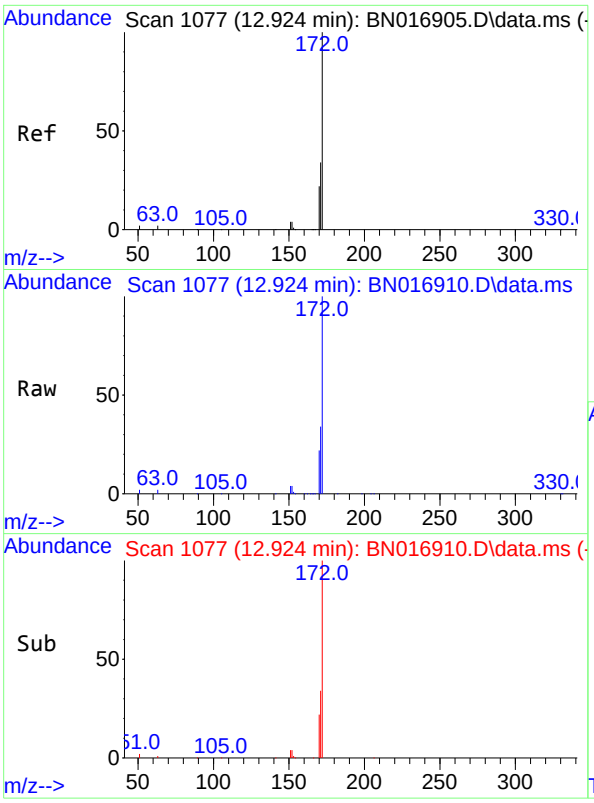
#14
2,4,6-Tribromophenol
Concen: 0.34 ng
RT: 15.791 min Scan# 1303
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:330 Resp: 7743

Ion	Ratio	Lower	Upper
330	100		
332	0.0	0.0	0.0
141	30.4	24.4	36.6



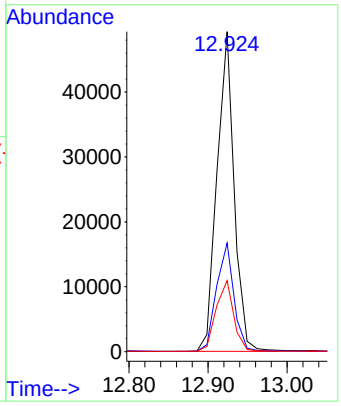
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

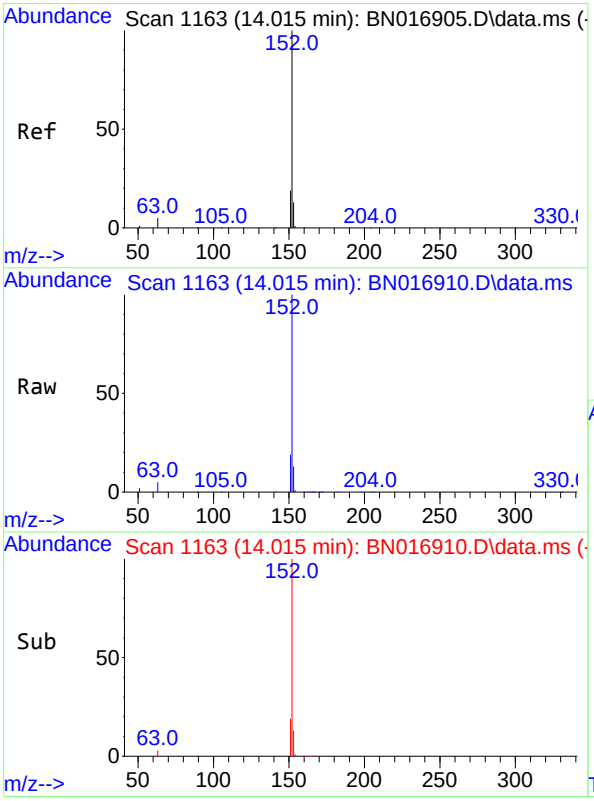


#15
2-Fluorobiphenyl
Concen: 0.39 ng
RT: 12.924 min Scan# 1077
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:172 Resp: 74237

Ion	Ratio	Lower	Upper
172	100		
171	34.0	27.4	41.0
170	22.2	18.1	27.1

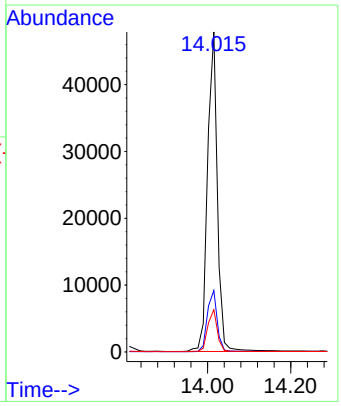




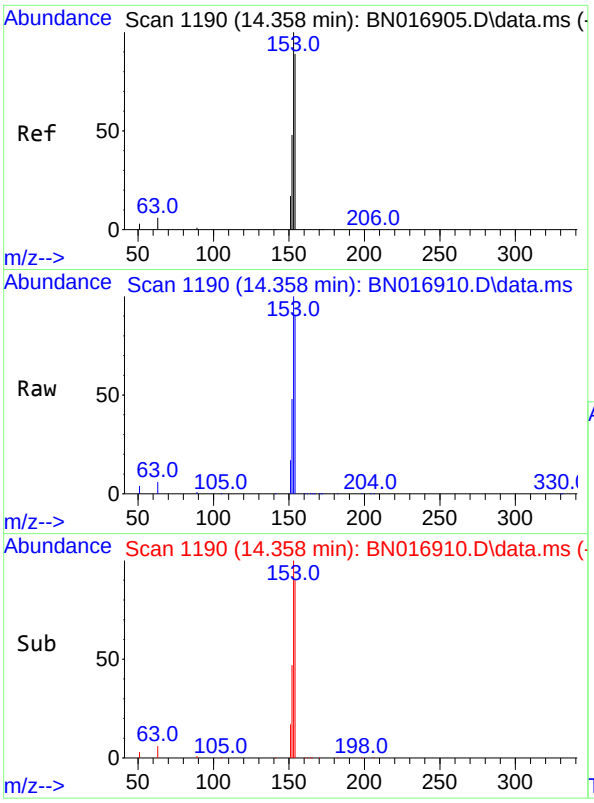
#16
Acenaphthylene
Concen: 0.39 ng
RT: 14.015 min Scan# 1163
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:152 Resp: 78073

Ion	Ratio	Lower	Upper
152	100		
151	19.4	15.5	23.3
153	13.0	10.3	15.5



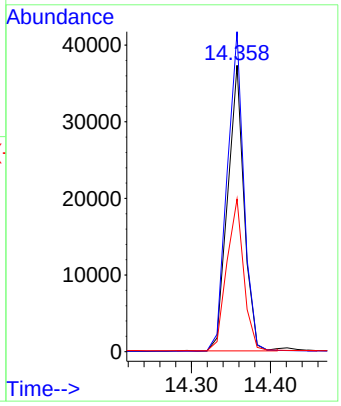
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

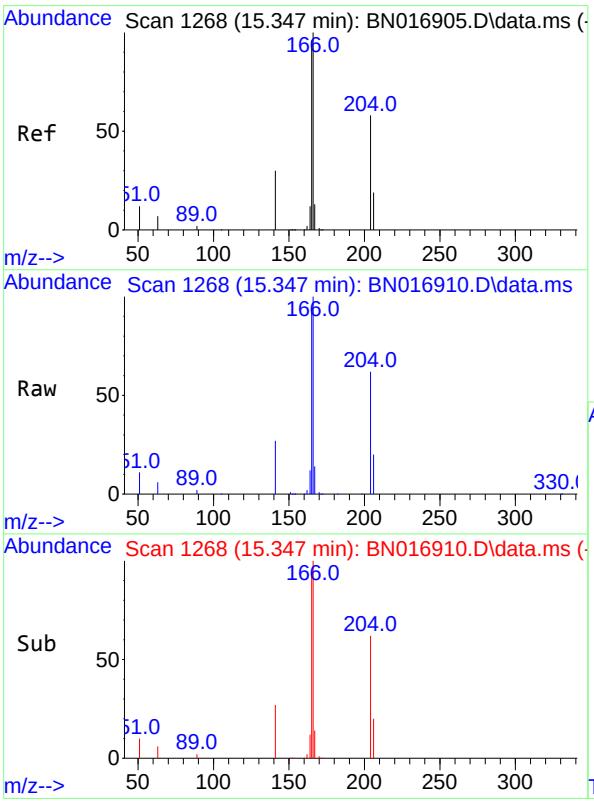


#17
Acenaphthene
Concen: 0.39 ng
RT: 14.358 min Scan# 1190
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:154 Resp: 53869

Ion	Ratio	Lower	Upper
154	100		
153	113.9	91.2	136.8
152	55.1	44.4	66.6

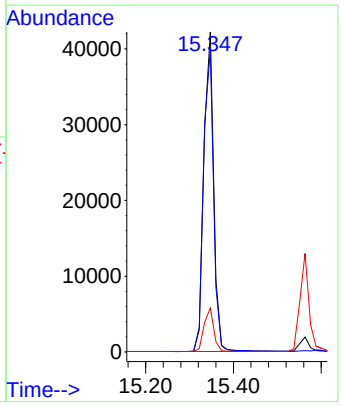




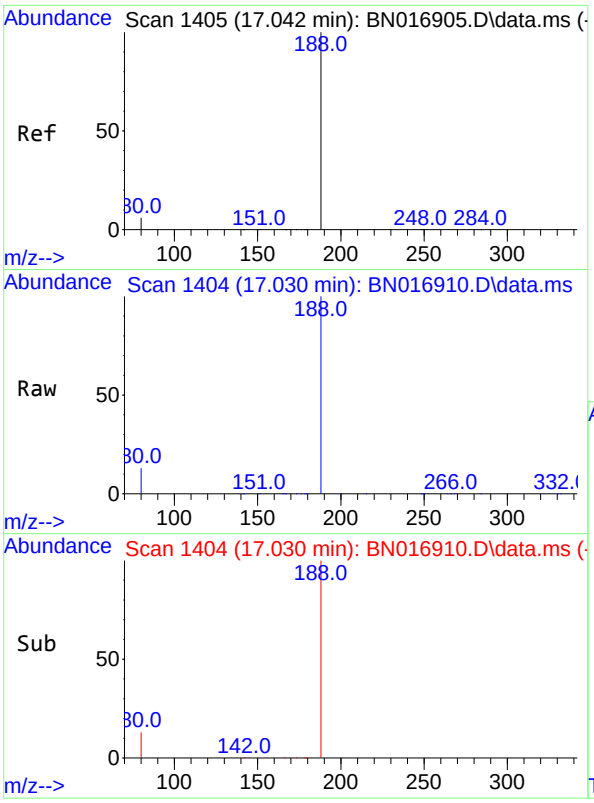
#18
Fluorene
Concen: 0.40 ng
RT: 15.347 min Scan# 1268
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:166 Resp: 65475

Ion	Ratio	Lower	Upper
166	100		
165	97.2	78.1	117.1
167	13.5	10.7	16.1



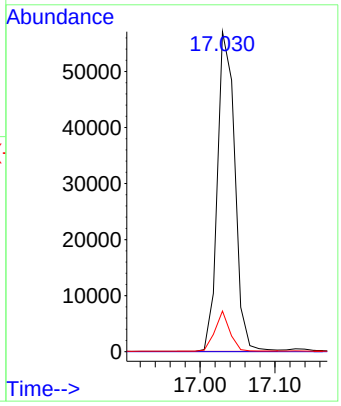
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

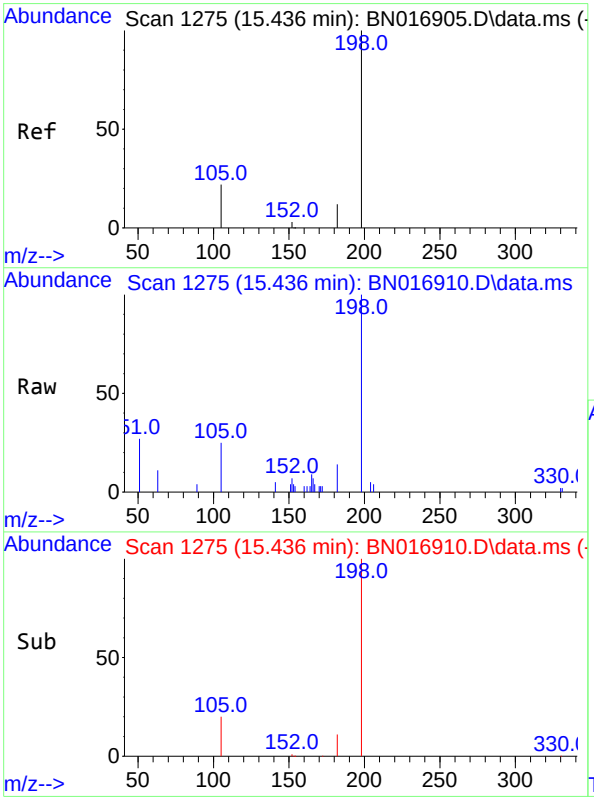


#19
Phenanthrene-d10
Concen: 0.40 ng
RT: 17.030 min Scan# 1404
Delta R.T. -0.012 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:188 Resp: 92151

Ion	Ratio	Lower	Upper
188	100		
94	0.0	0.0	0.0
80	12.7	4.9	7.3#

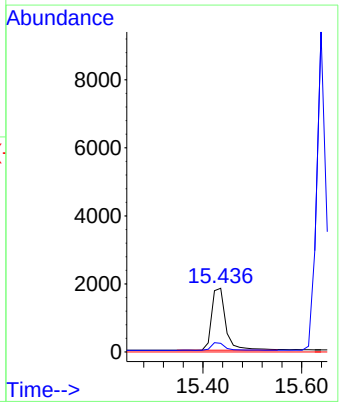




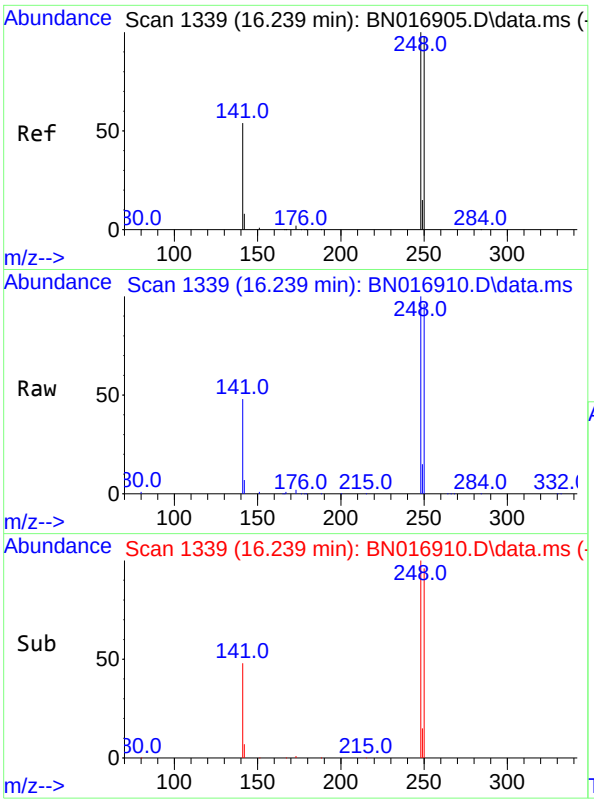
#20
4,6-Dinitro-2-methylphenol
Concen: 0.38 ng
RT: 15.436 min Scan# 1275
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:198 Resp: 3622

Ion	Ratio	Lower	Upper
198	100		
182	13.6	11.0	16.6
77	0.0	0.0	0.0



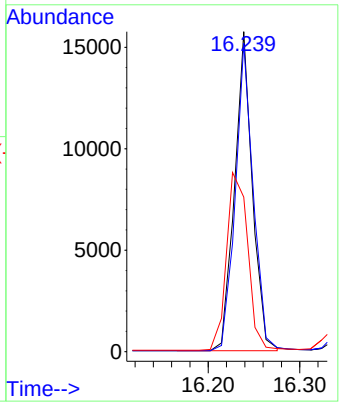
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

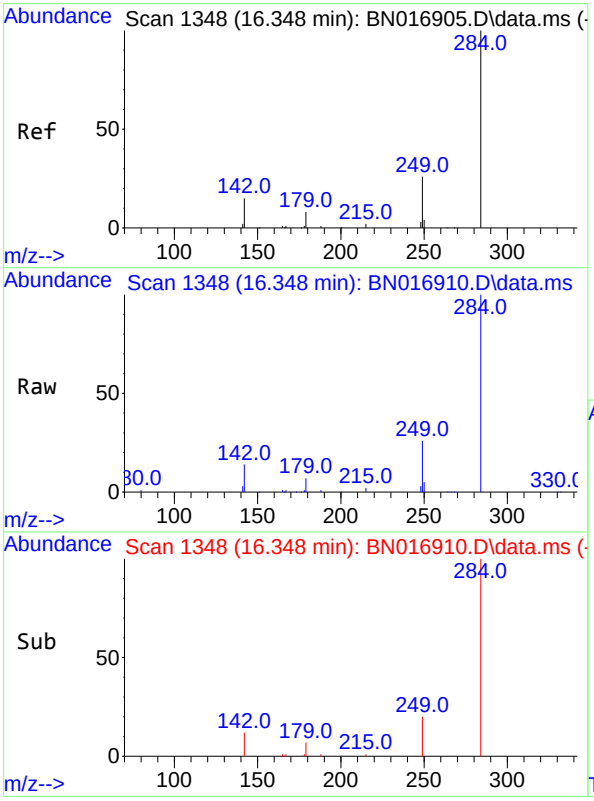


#21
4-Bromophenyl-phenylether
Concen: 0.39 ng
RT: 16.239 min Scan# 1339
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:248 Resp: 21167

Ion	Ratio	Lower	Upper
248	100		
250	96.4	78.2	117.2
141	48.3	43.1	64.7

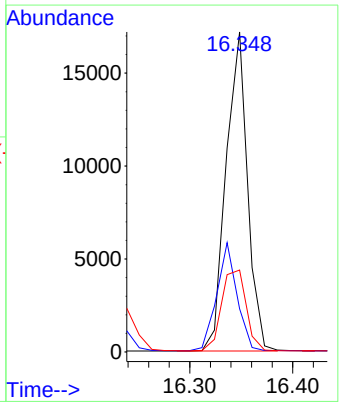




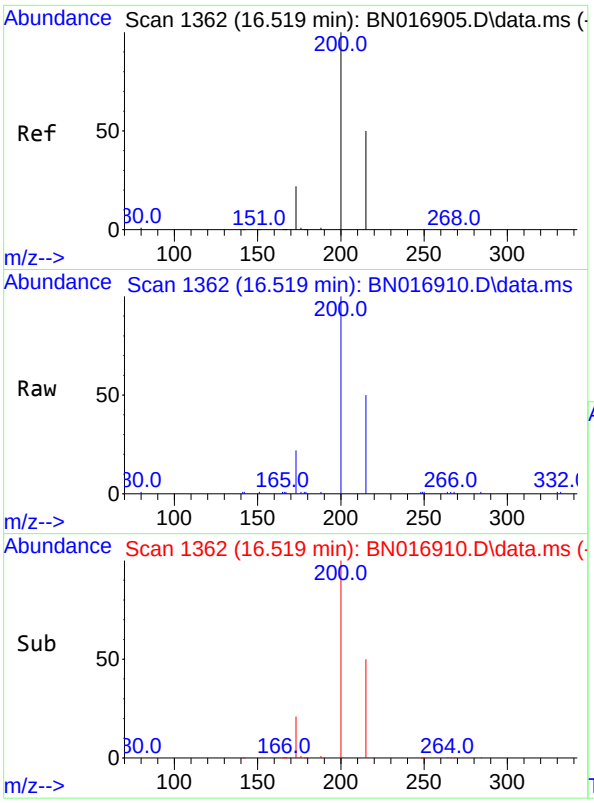
#22
Hexachlorobenzene
Concen: 0.40 ng
RT: 16.348 min Scan# 1348
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:284 Resp: 24874

Ion	Ratio	Lower	Upper
284	100		
142	31.8	25.1	37.7
249	29.1	23.2	34.8



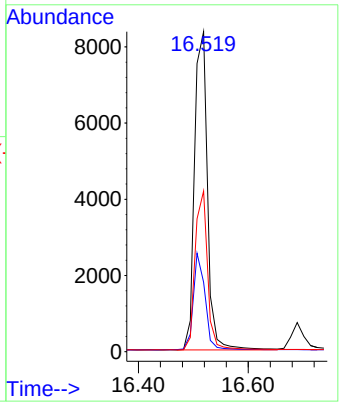
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

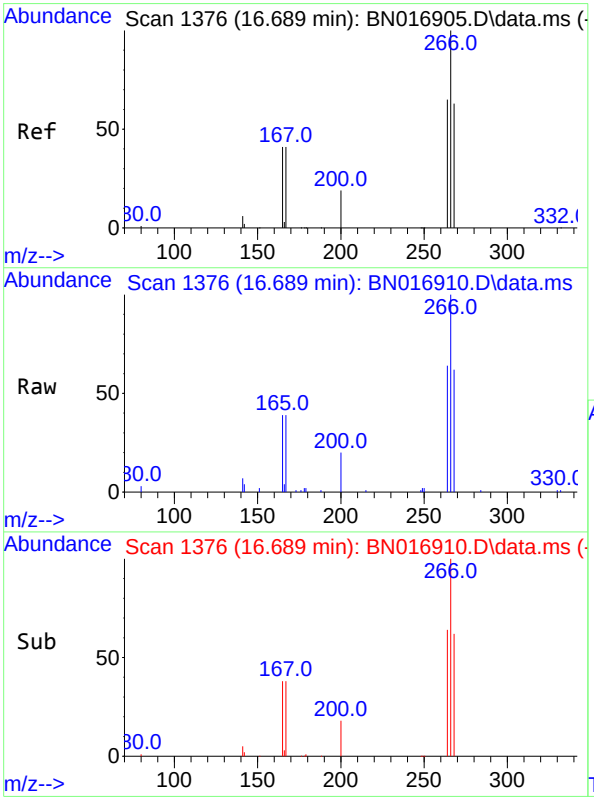


#23
Atrazine
Concen: 0.39 ng
RT: 16.519 min Scan# 1362
Delta R.T. -0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:200 Resp: 13756

Ion	Ratio	Lower	Upper
200	100		
173	21.7	18.0	27.0
215	50.2	40.0	60.0

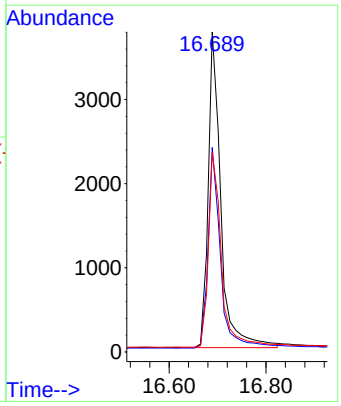




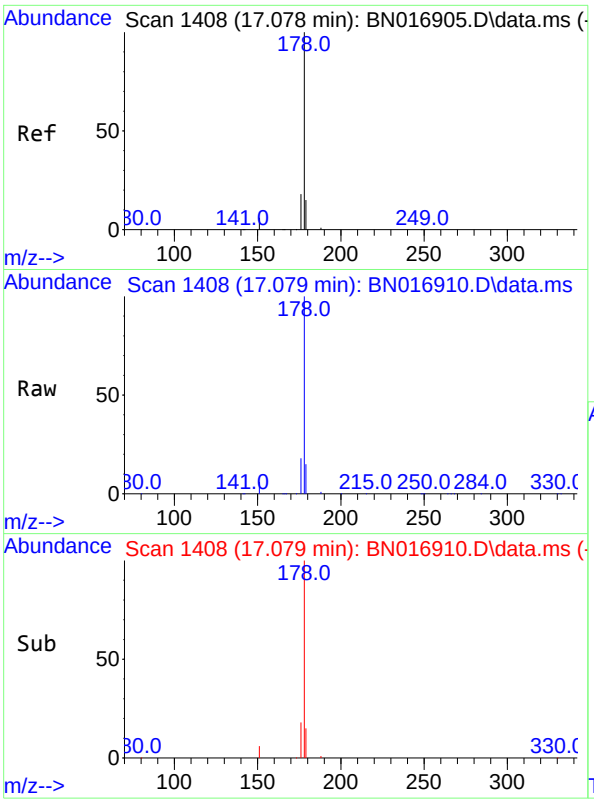
#24
Pentachlorophenol
Concen: 0.42 ng
RT: 16.689 min Scan# 1376
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:266 Resp: 6798

Ion	Ratio	Lower	Upper
266	100		
264	62.4	50.5	75.7
268	63.7	51.2	76.8



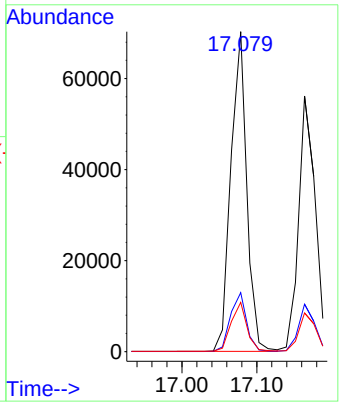
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

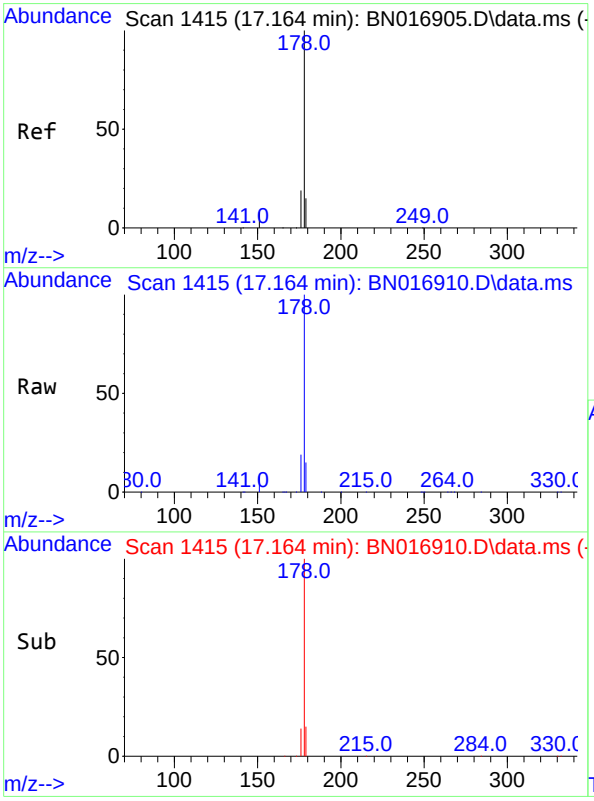


#25
Phenanthrene
Concen: 0.39 ng
RT: 17.079 min Scan# 1408
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:178 Resp: 103535

Ion	Ratio	Lower	Upper
178	100		
176	18.7	15.0	22.4
179	15.5	12.3	18.5

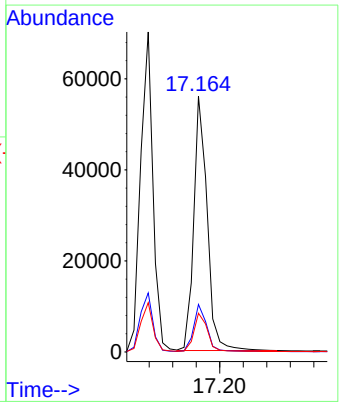




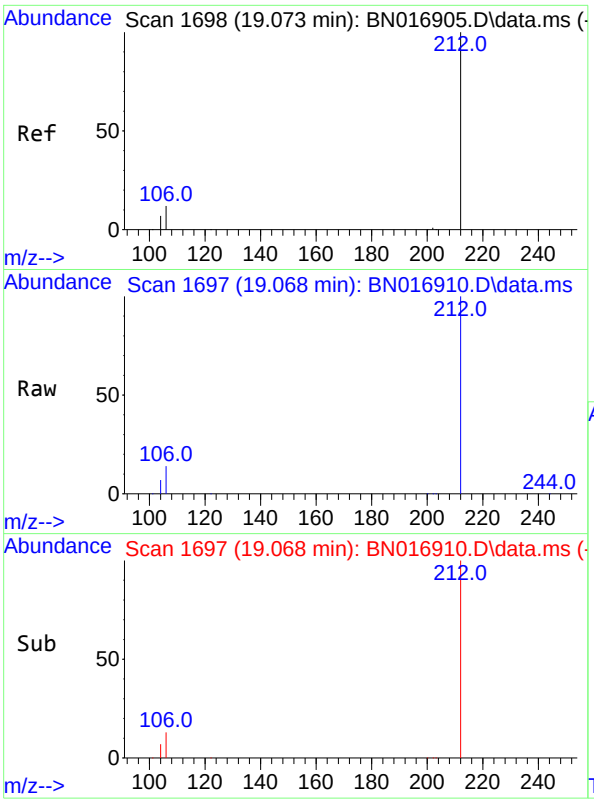
#26
Anthracene
Concen: 0.40 ng
RT: 17.164 min Scan# 1415
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:178 Resp: 88427

Ion	Ratio	Lower	Upper
178	100		
176	18.2	14.6	21.8
179	15.3	12.2	18.4



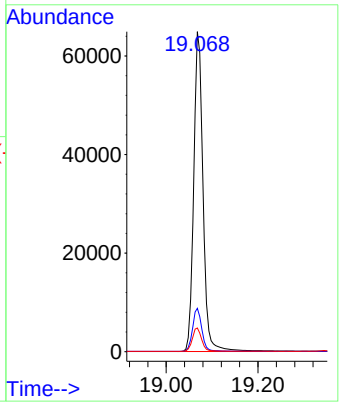
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

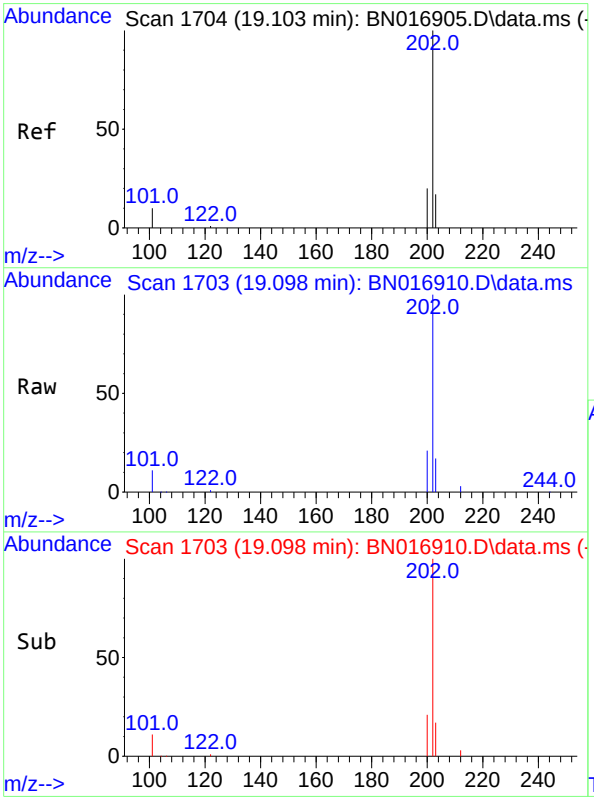


#27
Fluoranthene-d10
Concen: 0.39 ng
RT: 19.068 min Scan# 1697
Delta R.T. -0.005 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:212 Resp: 91137

Ion	Ratio	Lower	Upper
212	100		
106	13.5	10.7	16.1
104	7.4	5.8	8.8

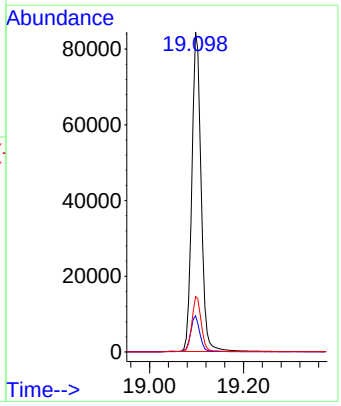




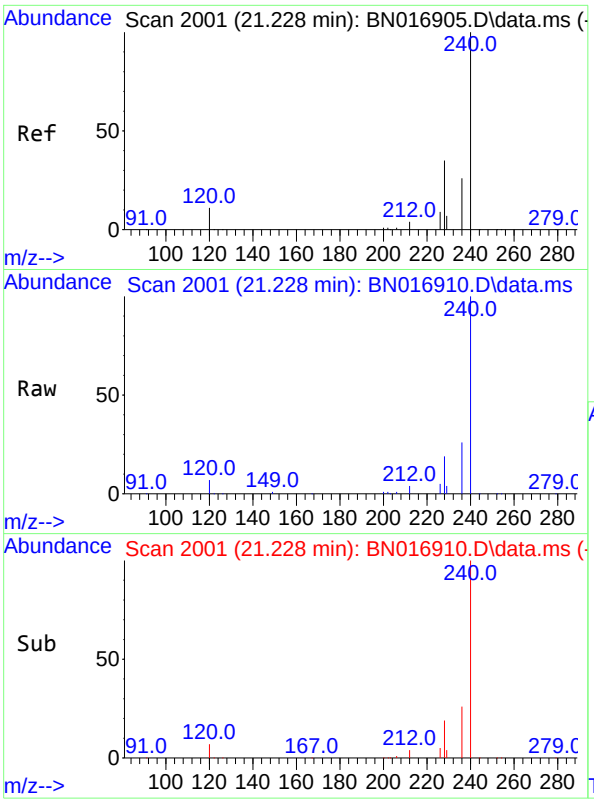
#28
Fluoranthene
Concen: 0.41 ng
RT: 19.098 min Scan# 1703
Delta R.T. -0.005 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:202 Resp: 115714

Ion	Ratio	Lower	Upper
202	100		
101	11.4	9.0	13.4
203	17.3	13.8	20.8



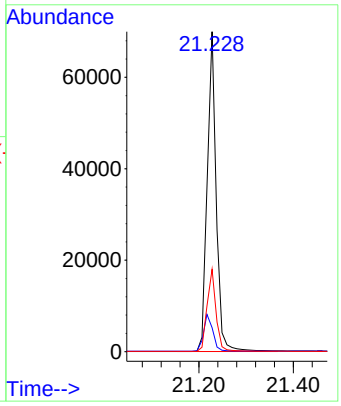
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

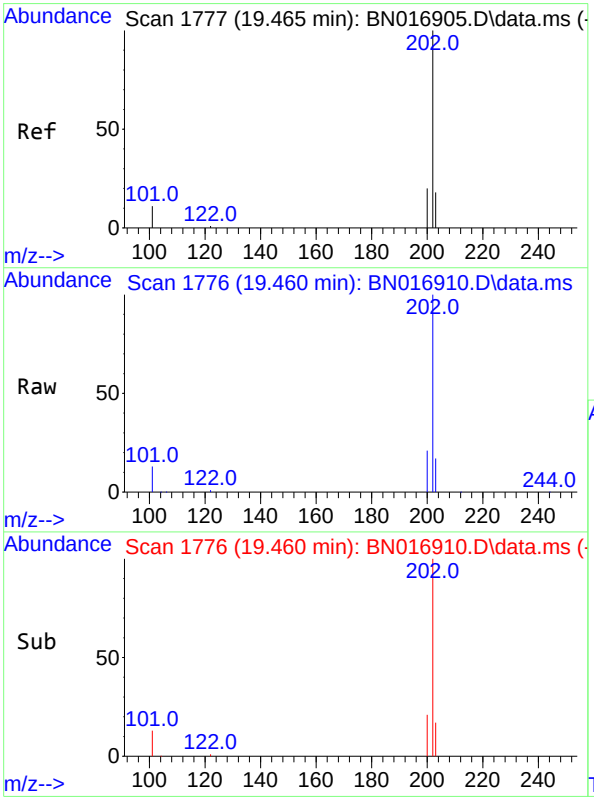


#29
Chrysene-d12
Concen: 0.40 ng
RT: 21.228 min Scan# 2001
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:240 Resp: 91989

Ion	Ratio	Lower	Upper
240	100		
120	7.5	8.6	12.8#
236	25.8	21.0	31.4

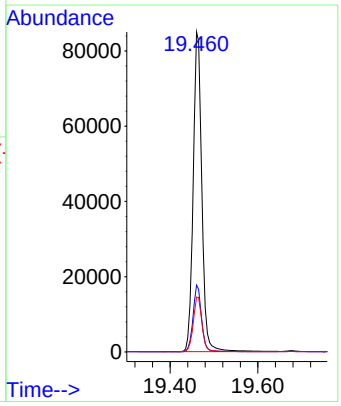




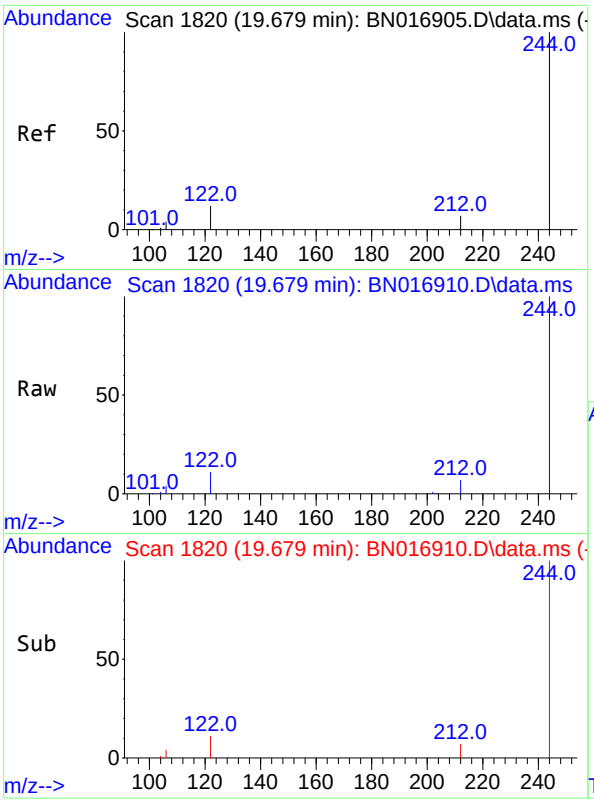
#30
Pyrene
Concen: 0.40 ng
RT: 19.460 min Scan# 1776
Delta R.T. -0.005 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:202 Resp: 116243

Ion	Ratio	Lower	Upper
202	100		
200	20.5	16.5	24.7
203	17.5	14.0	21.0



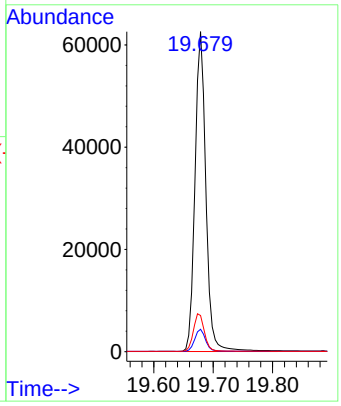
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

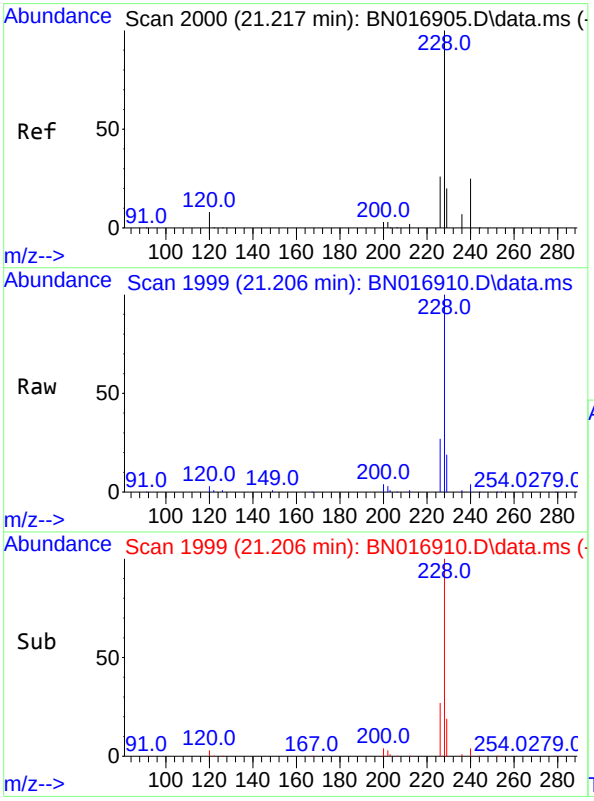


#31
Terphenyl-d14
Concen: 0.39 ng
RT: 19.679 min Scan# 1820
Delta R.T. 0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:244 Resp: 79431

Ion	Ratio	Lower	Upper
244	100		
212	7.0	5.7	8.5
122	11.3	9.8	14.6

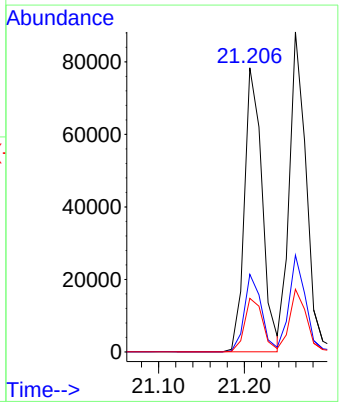




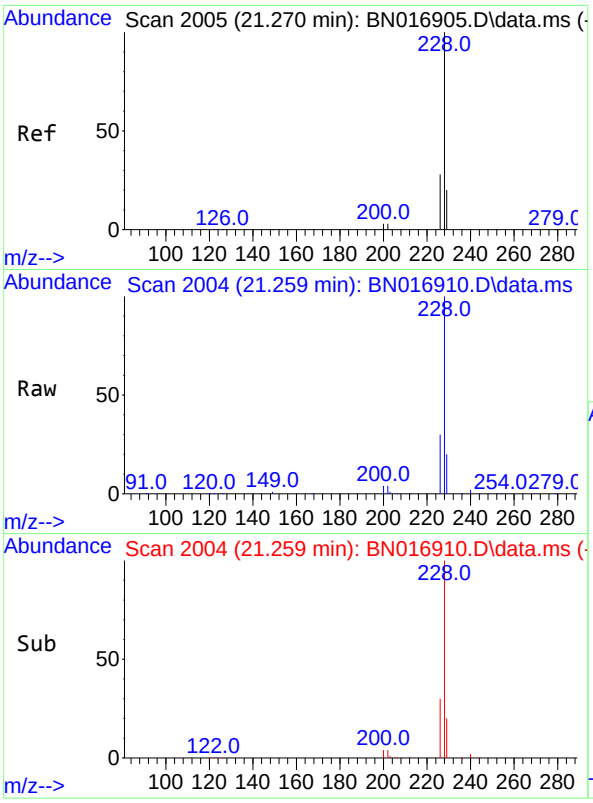
#32
Benzo(a)anthracene
Concen: 0.40 ng
RT: 21.206 min Scan# 1999
Delta R.T. -0.011 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:228 Resp: 111900

Ion	Ratio	Lower	Upper
228	100		
226	27.3	20.6	31.0
229	18.9	15.8	23.8



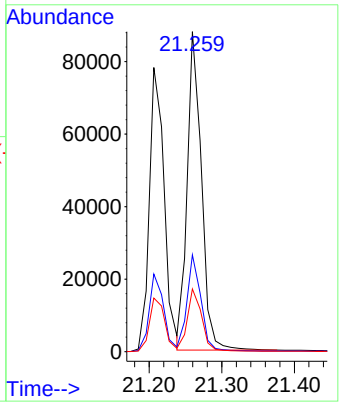
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

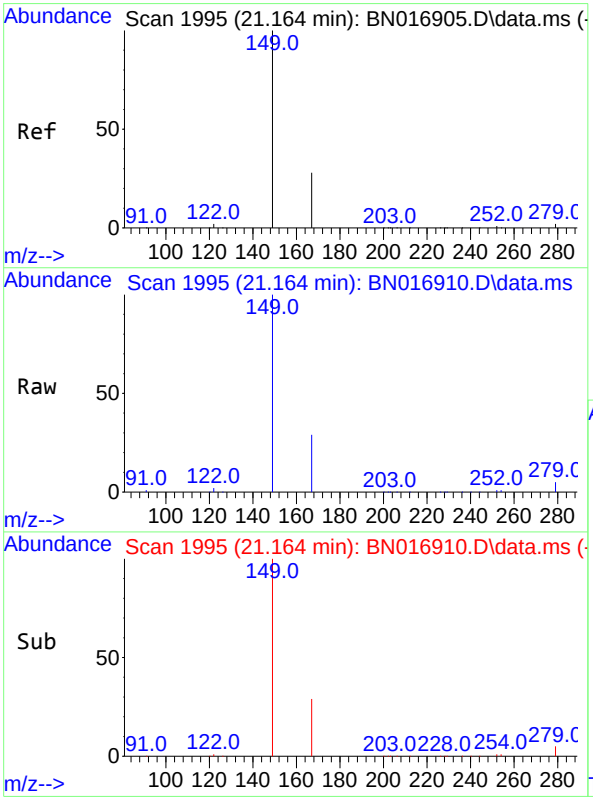


#33
Chrysene
Concen: 0.40 ng
RT: 21.259 min Scan# 2004
Delta R.T. -0.011 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:228 Resp: 119714

Ion	Ratio	Lower	Upper
228	100		
226	30.3	22.6	34.0
229	19.6	16.0	24.0

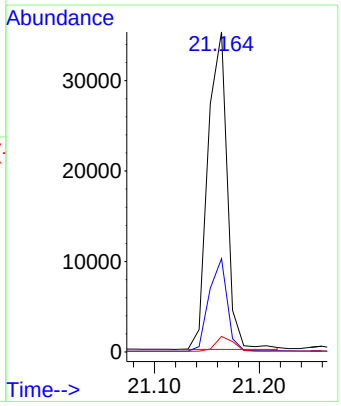




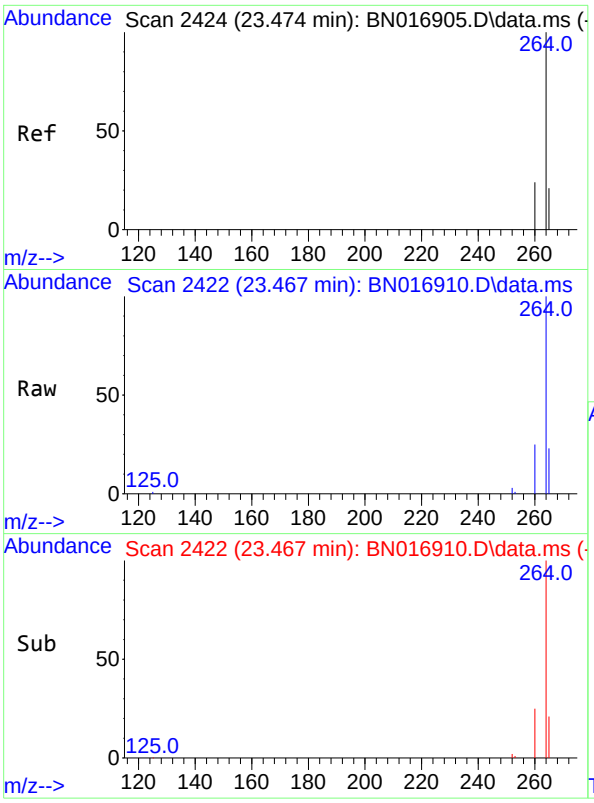
#34
Bis(2-ethylhexyl)phthalate
Concen: 0.44 ng
RT: 21.164 min Scan# 1995
Delta R.T. -0.000 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:149 Resp: 44650

Ion	Ratio	Lower	Upper
149	100		
167	27.6	22.1	33.1
279	4.4	3.4	5.0



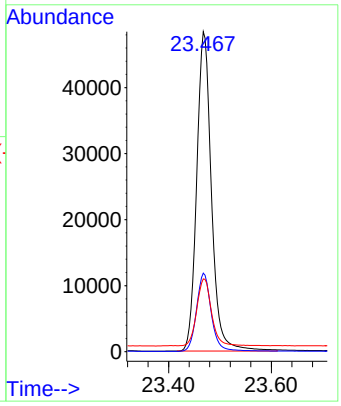
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

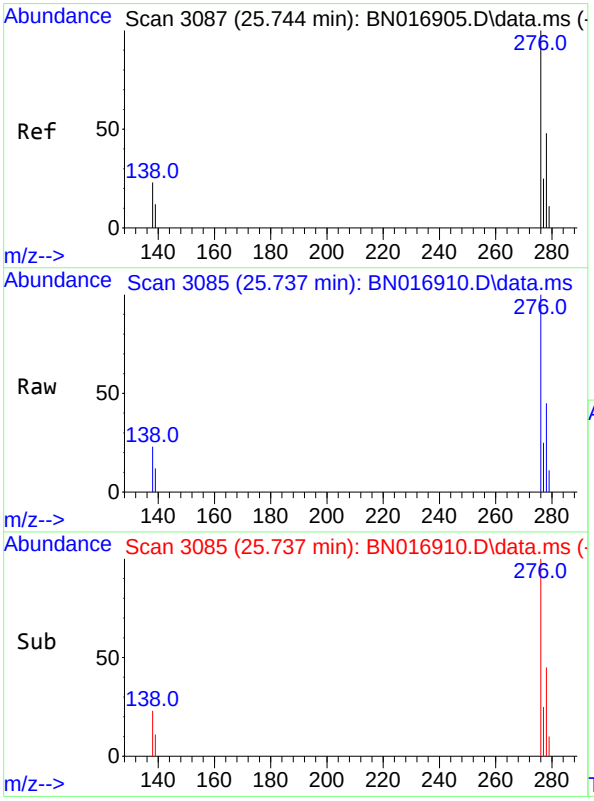


#35
Perylene-d12
Concen: 0.40 ng
RT: 23.467 min Scan# 2422
Delta R.T. -0.007 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:264 Resp: 96513

Ion	Ratio	Lower	Upper
264	100		
260	24.6	19.4	29.2
265	22.8	18.6	27.8

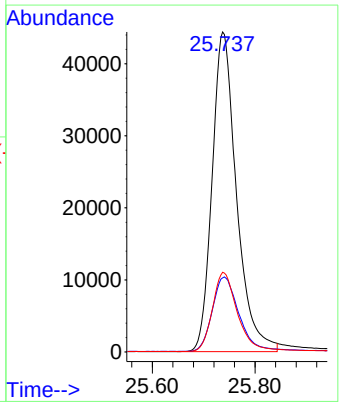




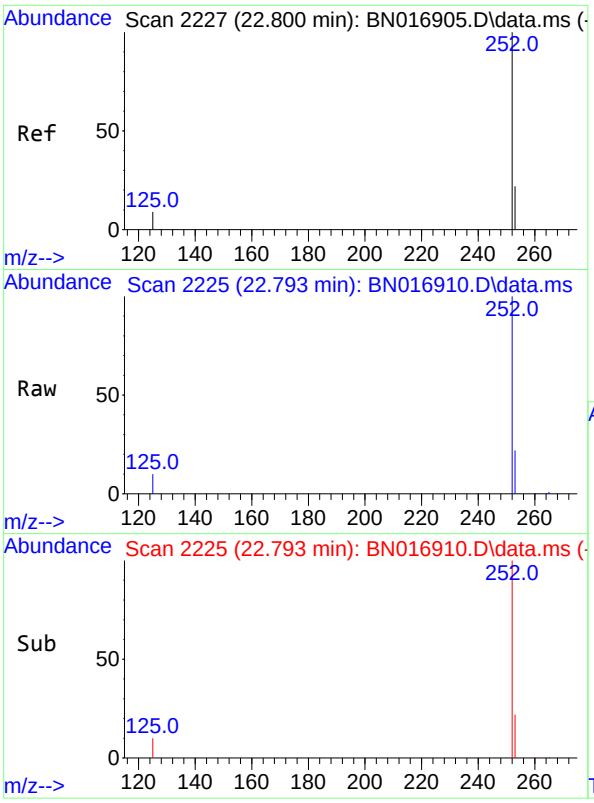
#36
Indeno(1,2,3-cd)pyrene
Concen: 0.40 ng
RT: 25.737 min Scan# 3085
Delta R.T. -0.007 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:276 Resp: 146131

Ion	Ratio	Lower	Upper
276	100		
138	25.3	20.2	30.4
277	25.3	20.2	30.4



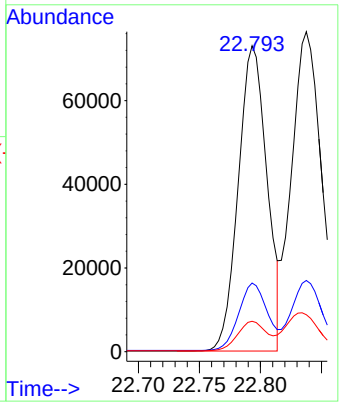
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

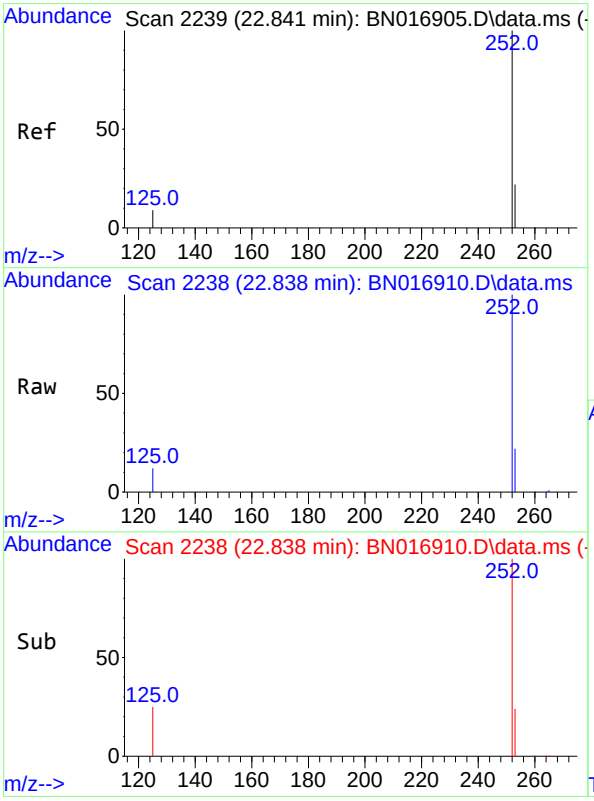


#37
Benzo(b)fluoranthene
Concen: 0.39 ng
RT: 22.793 min Scan# 2225
Delta R.T. -0.007 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:252 Resp: 119162

Ion	Ratio	Lower	Upper
252	100		
253	22.4	17.7	26.5
125	10.0	7.8	11.8

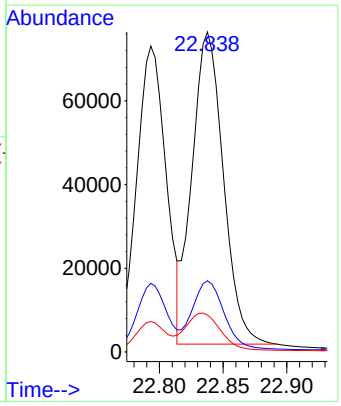




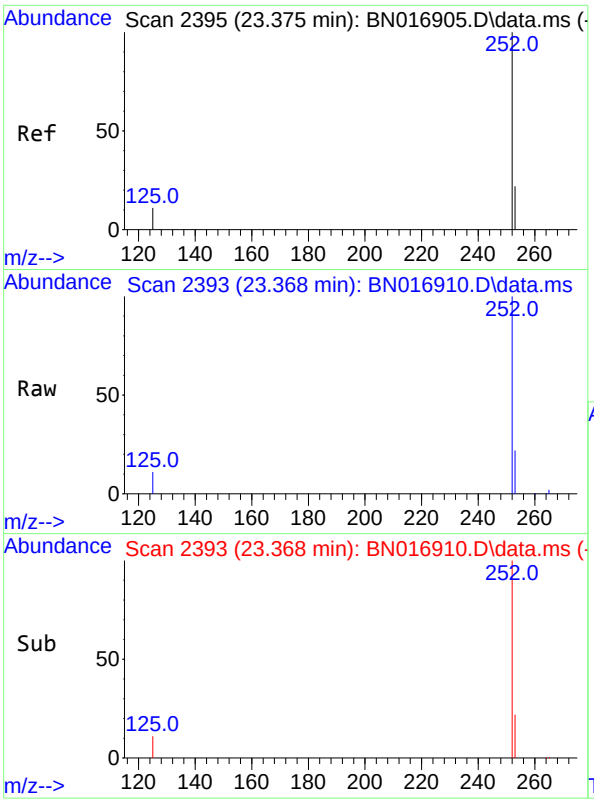
#38
Benzo(k)fluoranthene
Concen: 0.42 ng
RT: 22.838 min Scan# 2238
Delta R.T. -0.003 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:252 Resp: 127698

Ion	Ratio	Lower	Upper
252	100		
253	22.3	18.1	27.1
125	11.5	9.8	14.8



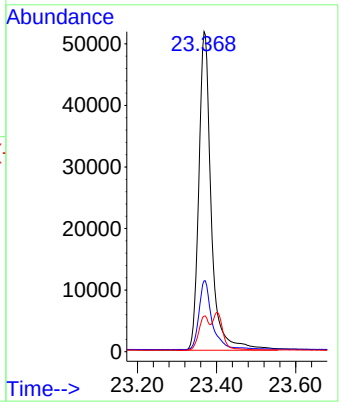
Instrument :
BNA_N
ClientSampleId :
ICVBN101321

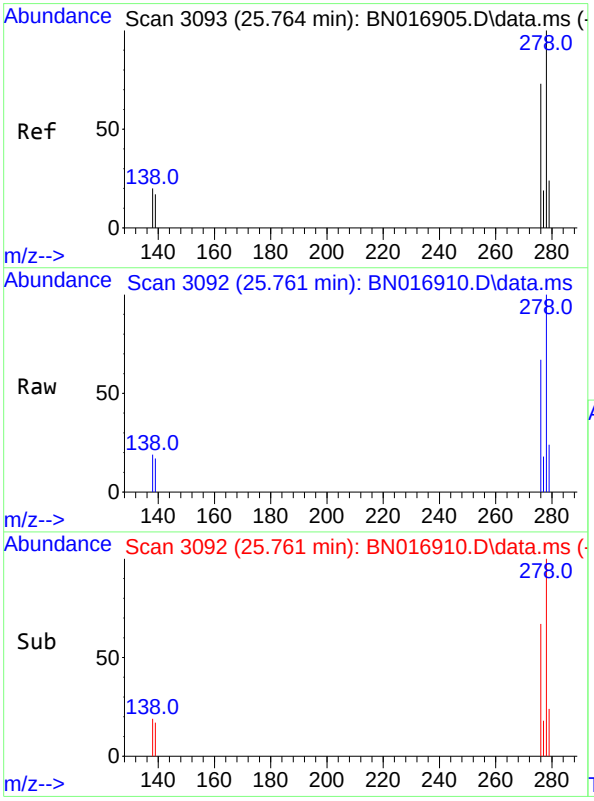


#39
Benzo(a)pyrene
Concen: 0.40 ng
RT: 23.368 min Scan# 2393
Delta R.T. -0.007 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:252 Resp: 112503

Ion	Ratio	Lower	Upper
252	100		
253	22.2	18.1	27.1
125	11.1	9.0	13.4

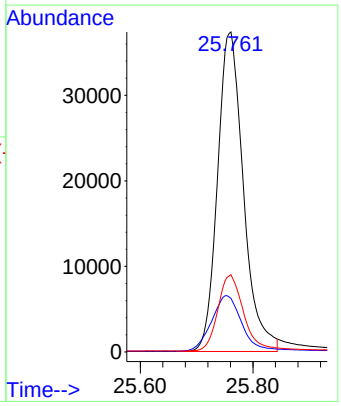


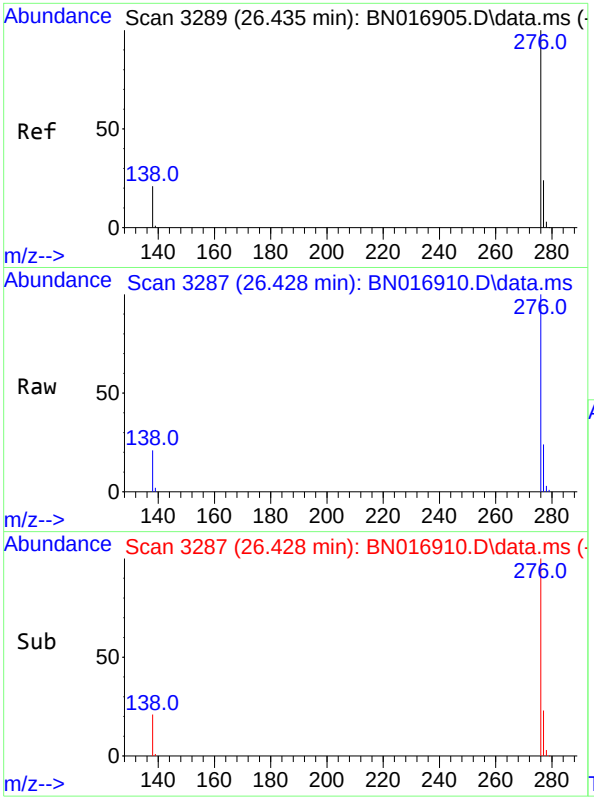


#40
Dibenzo(a,h)anthracene
Concen: 0.40 ng
RT: 25.761 min Scan# 3092
Delta R.T. -0.003 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:278 Resp: 119035

Ion	Ratio	Lower	Upper
278	100		
139	16.7	13.8	20.6
279	24.1	19.0	28.6

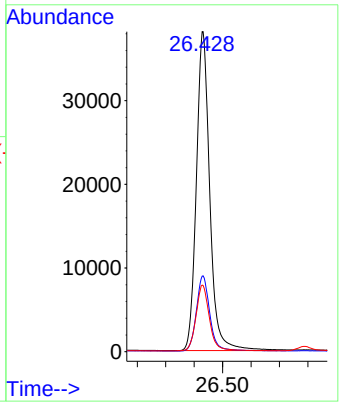




#41
Benzo(g,h,i)perylene
Concen: 0.39 ng
RT: 26.428 min Scan# 3287
Delta R.T. -0.007 min
Lab File: BN016910.D
Acq: 12 Oct 2021 22:24

Tgt Ion:276 Resp: 124869

Ion	Ratio	Lower	Upper
276	100		
277	23.6	19.1	28.7
138	20.8	16.6	24.8



Instrument :
BNA_N
ClientSampleId :
ICVBN101321