

Chemoselective Arylation of Phenols with Bromo-nitroarenes: Synthesis of Nitro-biaryl-ols and Their Conversion into Benzofurans and Carbazoles

Amit Kumar, Abhimanyu Yadav, Ajay Verma, Sadhan Jana, Mohammad Sattar, Shailesh Kumar, Ch. Durga Prasad and Sangit Kumar*

Department of Chemistry, Indian Institute of Science Education and Research (IISER) Bhopal,
Indore By-pass Road, Bhauri, Bhopal, Madhya Pradesh, India-462 066

Content

HRMS Spectrum

S2-S42

Display Report

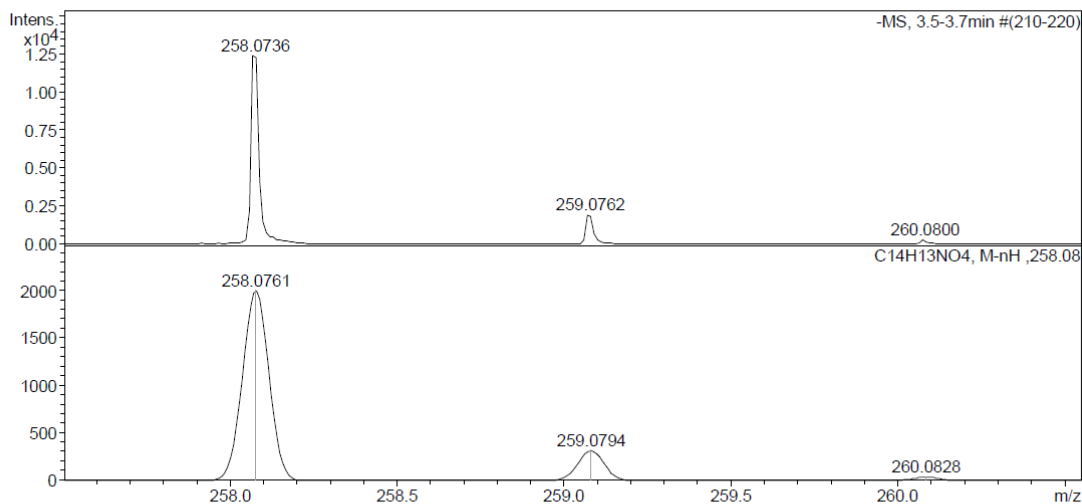
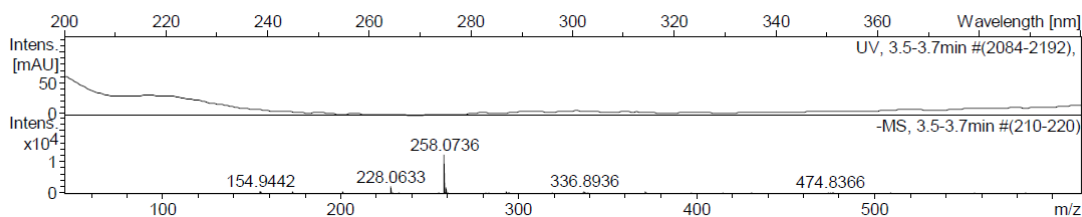
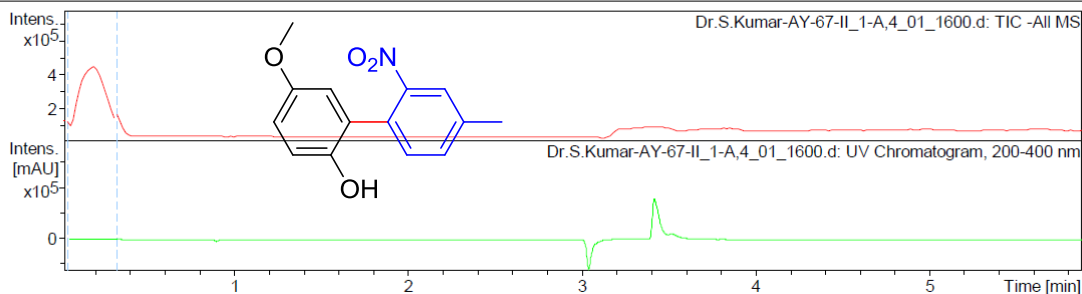
Analysis Info

Analysis Name D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-67-II_1-A,4_01_1600.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-67-II
Comment

Acquisition Date 11/29/2013 12:47:40 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

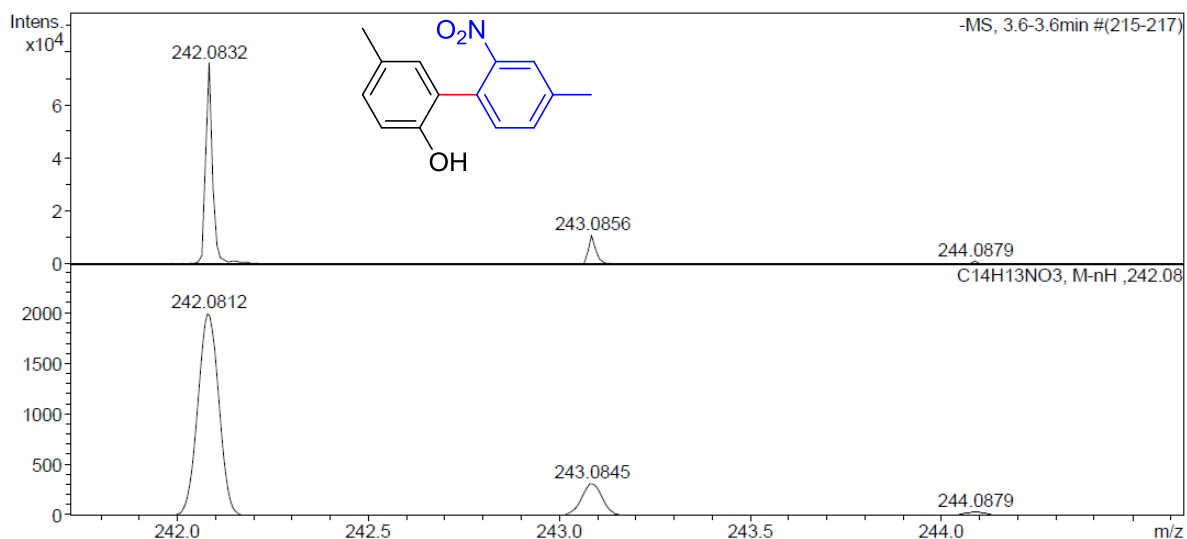
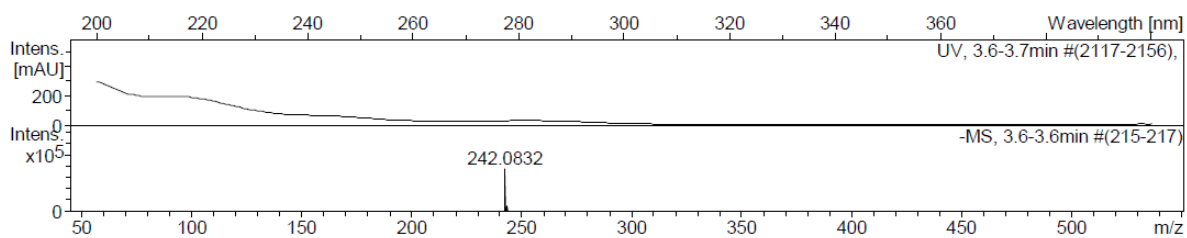
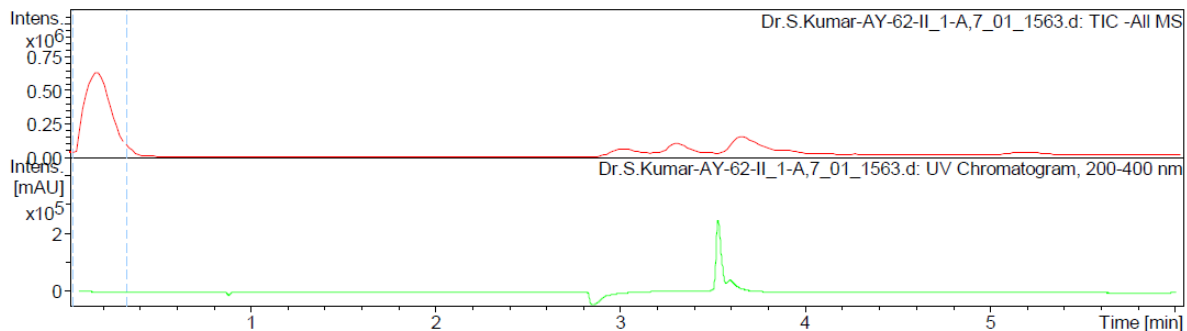
Analysis Info

Analysis Name D:\Data\user data\2013\NOV\27 NOV\Dr.S.Kumar-AY-62-II_1-A,7_01_1563.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-62-II
Comment

Acquisition Date 11/27/2013 12:08:15 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

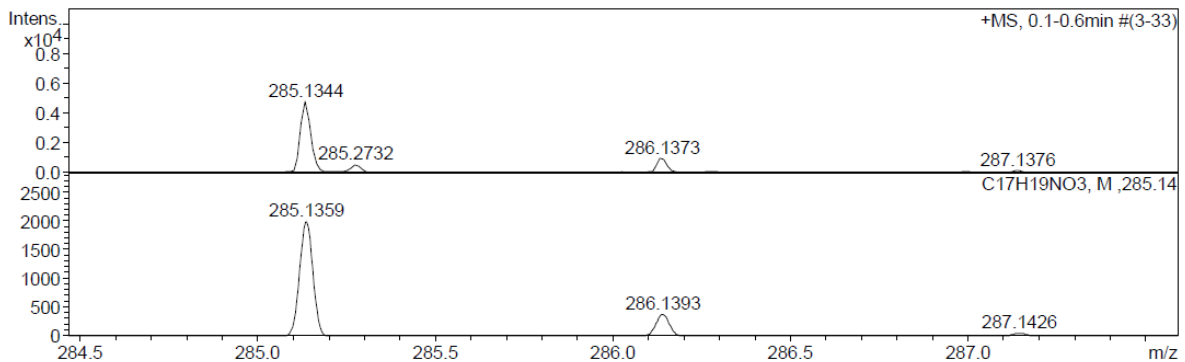
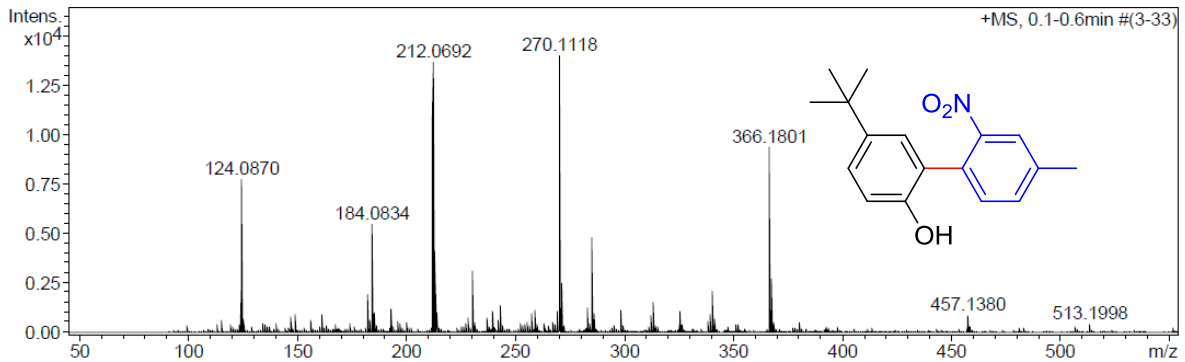
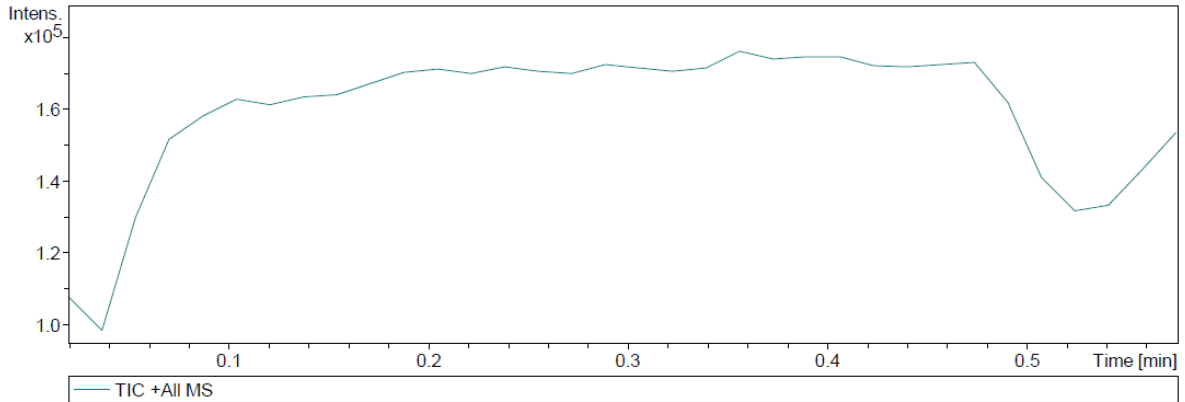
Analysis Info

Analysis Name D:\Data\user data\2013\DEC\27 dec\Dr.S.Kumar-AK-4-28R.d
Method tune_low.m
Sample Name AK-4-28R
Comment

Acquisition Date 12/27/2013 12:42:41 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	APCI	Ion Polarity	Positive	Set Nebulizer	1.6 Bar
Focus	Not active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	8.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



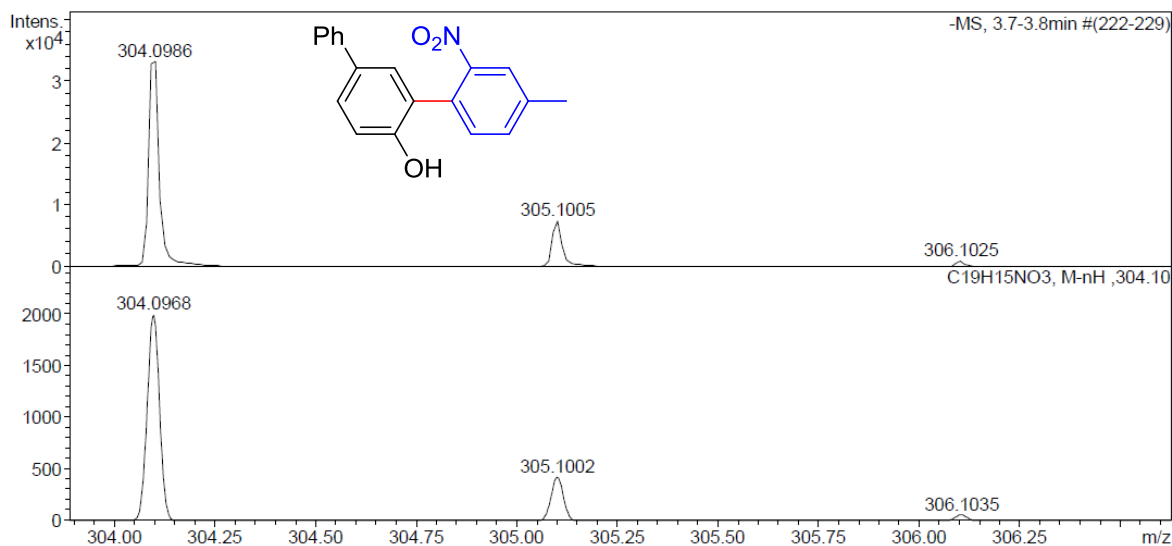
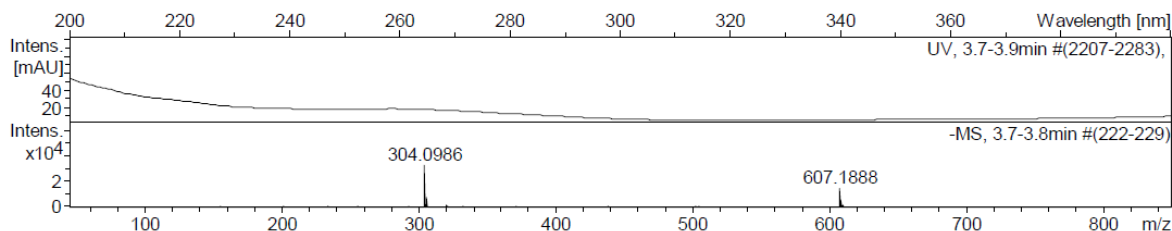
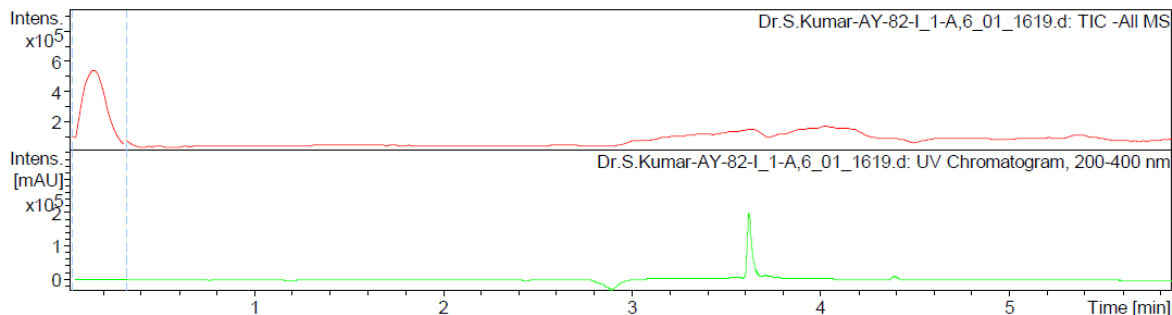
Display Report

Analysis Info

Analysis Name D:\Data\user data\2013\DEC\02 DEC\Dr.S.Kumar-AY-82-I_1-A,6_01_1619.d Acquisition Date 12/2/2013 12:56:06 PM
Method HRLCMS-6 FEB.m Operator Amit
Sample Name Dr.S.Kumar-AY-82-I Instrument micrOTOF-Q II 10330
Comment

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

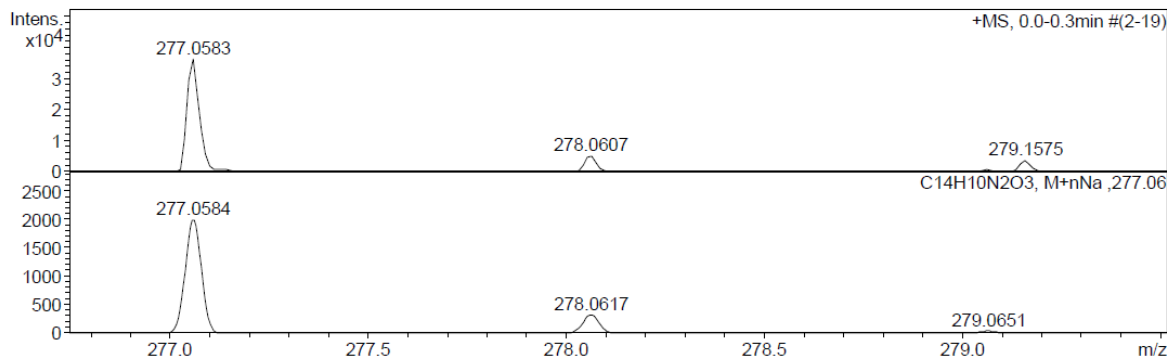
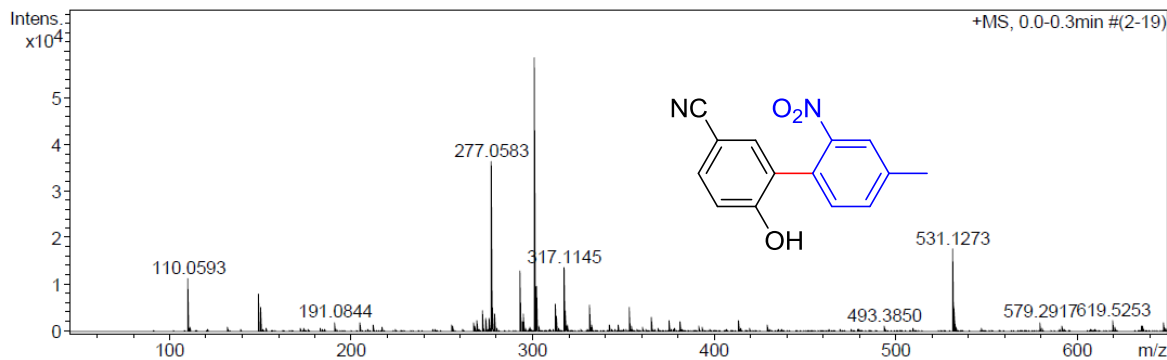
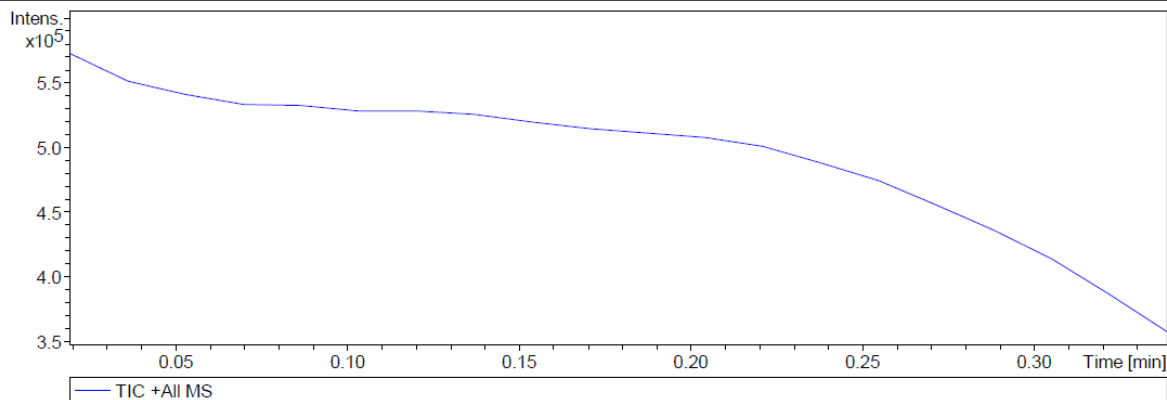
Analysis Name D:\Data\user data\2014\JAN\03 jan\Dr.S.Kumar-AY-42-2.d
Method tune_low.m
Sample Name AY-42
Comment

Acquisition Date 1/3/2014 1:10:23 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

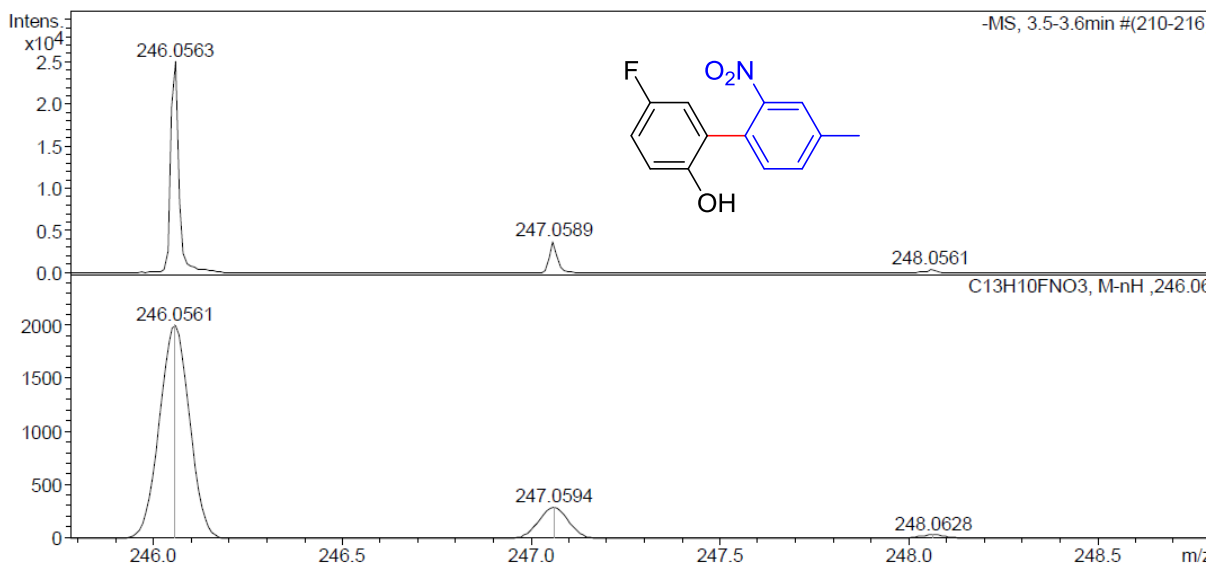
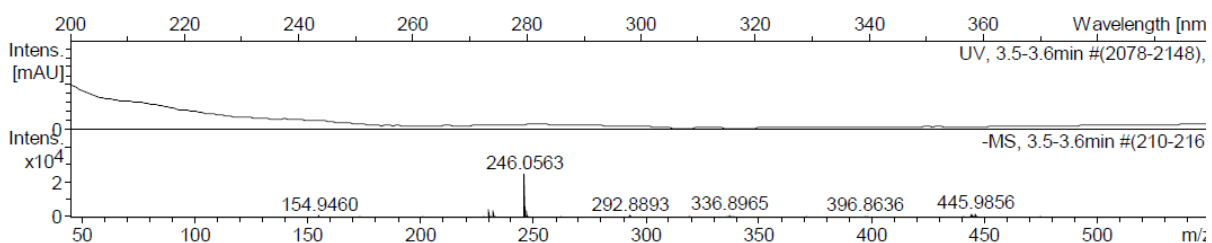
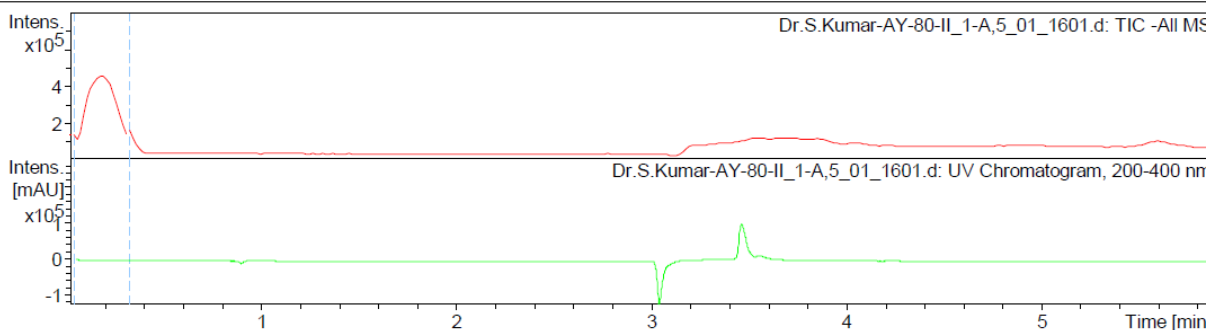
Analysis Name D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-80-II_1-A,5_01_1601.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-80-II
Comment

Acquisition Date 11/29/2013 12:54:47 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

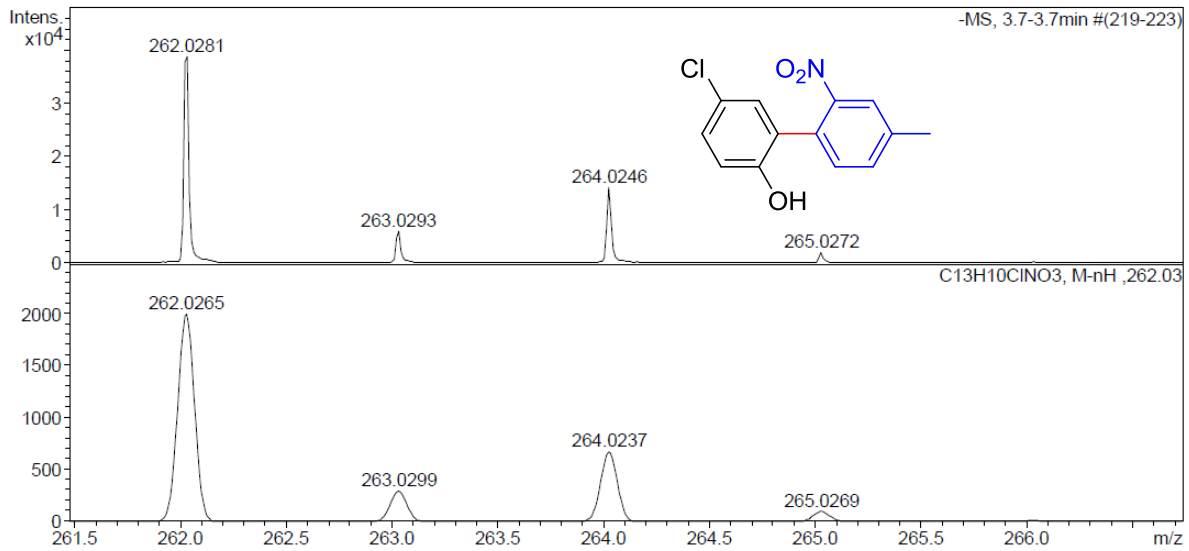
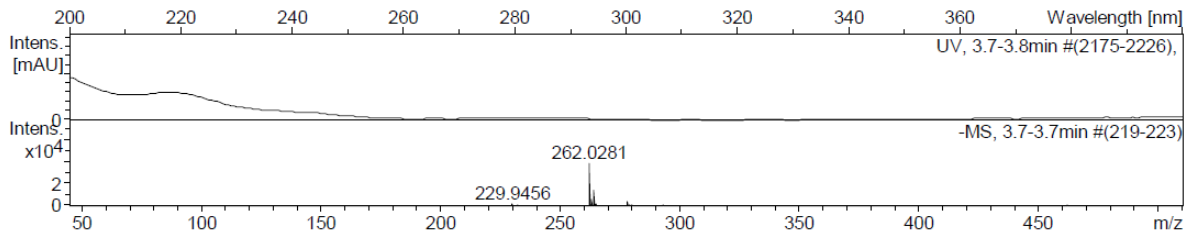
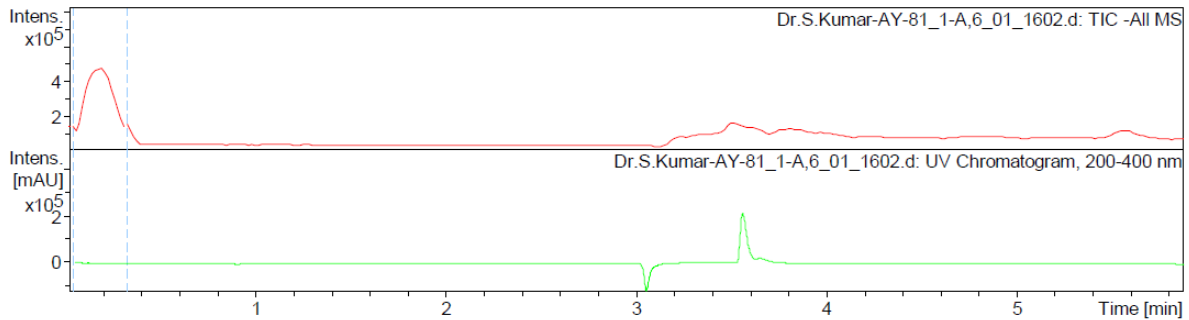
Analysis Info

Analysis Name D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-81_1-A,6_01_1602.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-81
Comment

Acquisition Date 11/29/2013 1:01:57 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

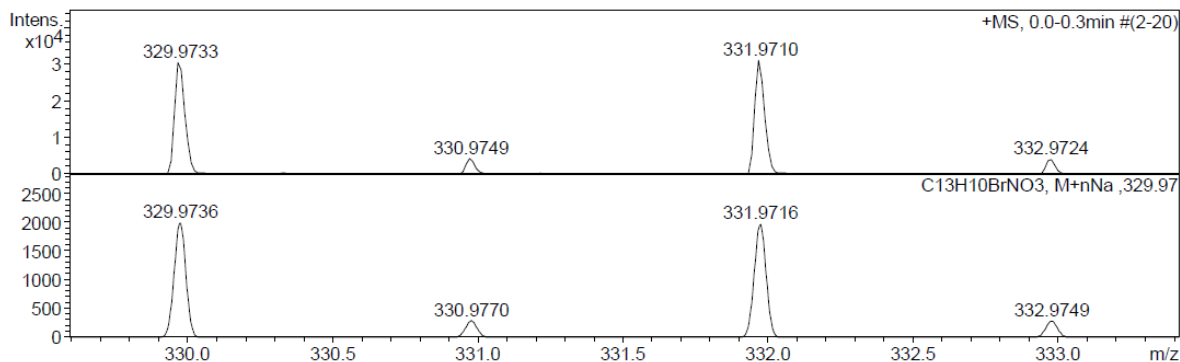
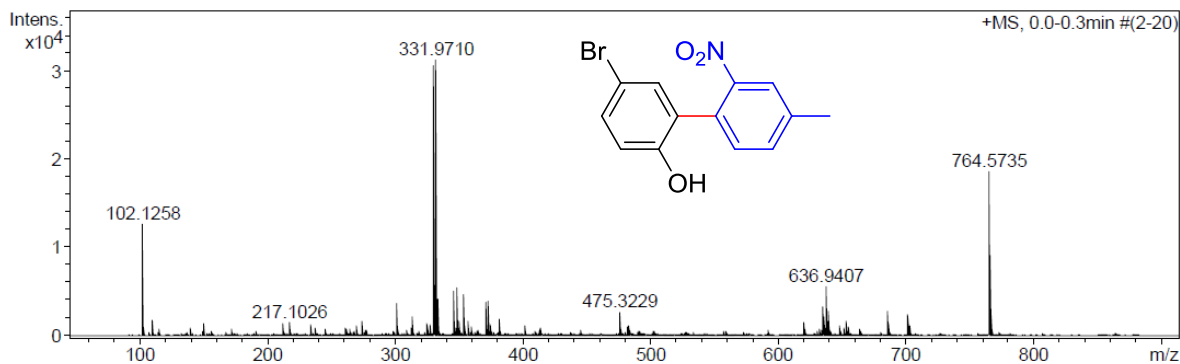
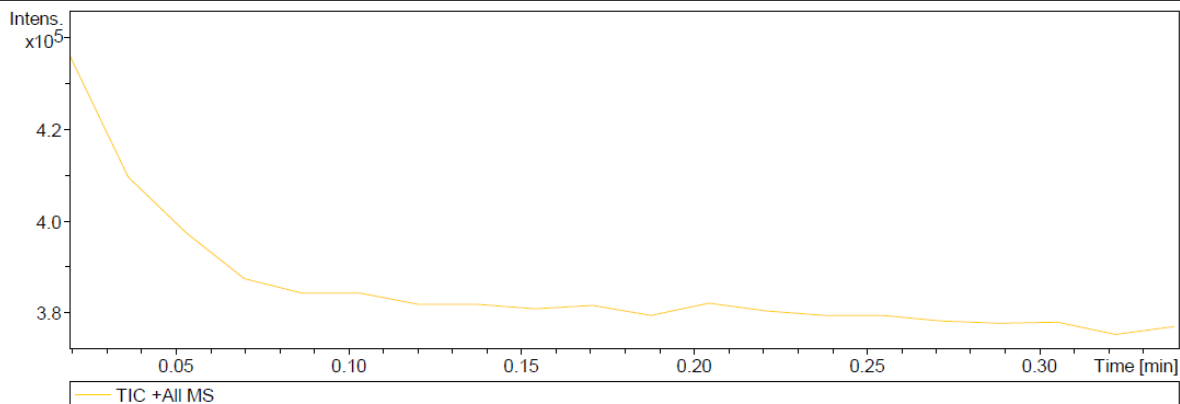
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\03 jan\Dr.S.Kumar-AY-52-1.d
Method tune_low.m
Sample Name AY-52
Comment

Acquisition Date 1/3/2014 1:14:46 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

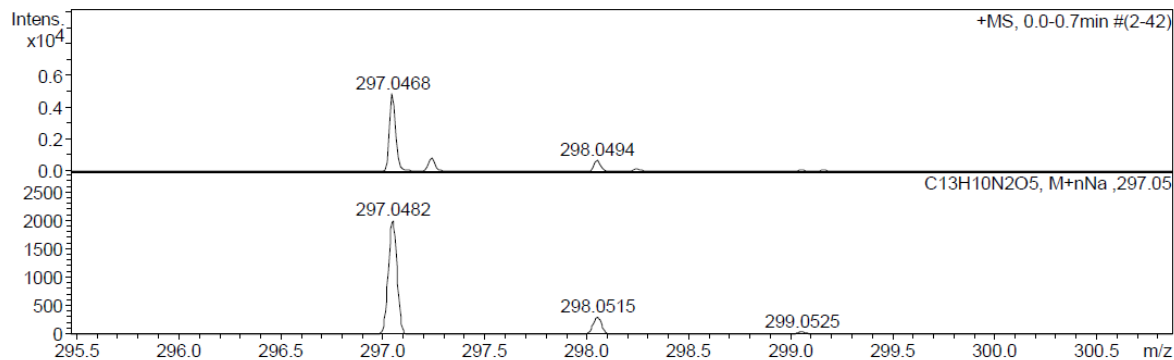
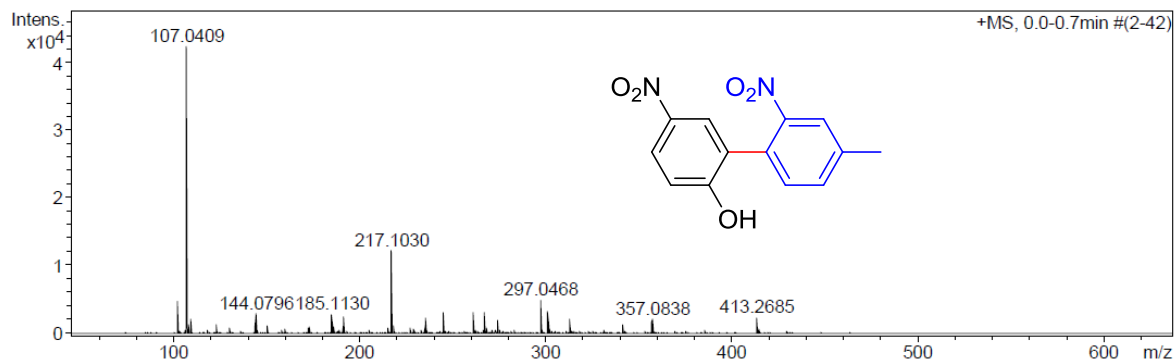
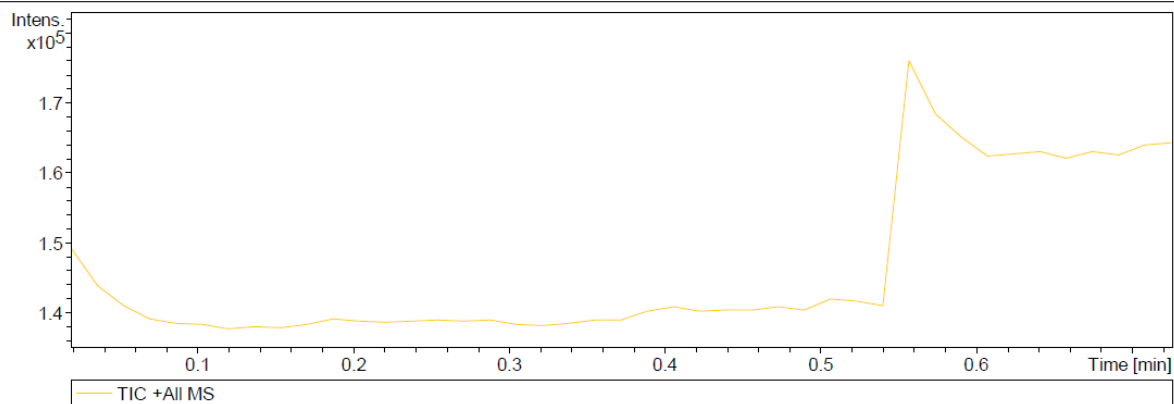
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\01jan\Dr.S.kumar-AY-91.d
Method tune_low.m
Sample Name AY-91
Comment

Acquisition Date 1/1/2014 2:59:21 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	100.0 Vpp	Set Divert Valve	Waste



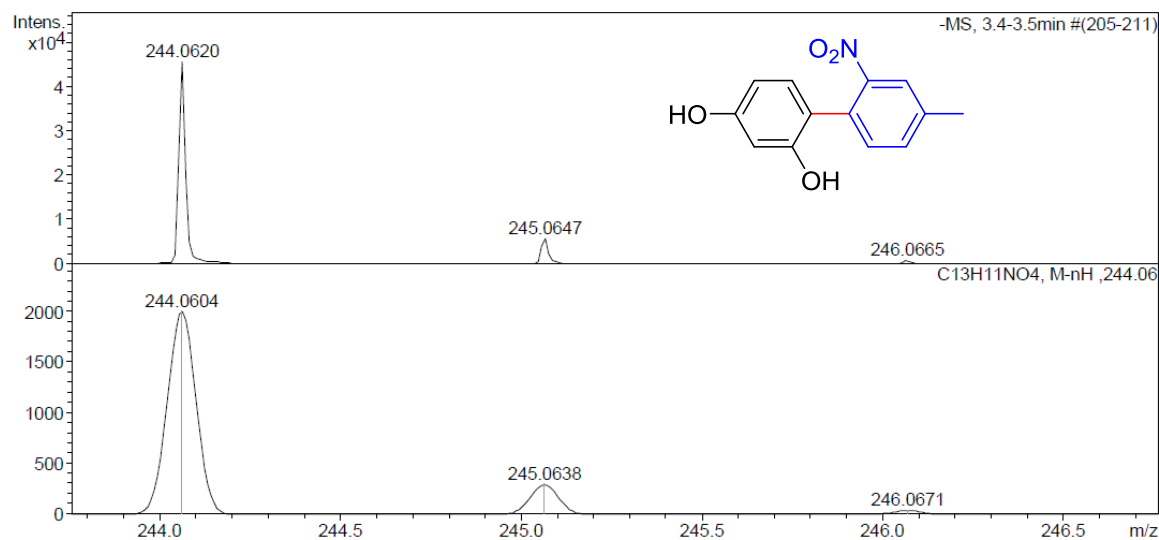
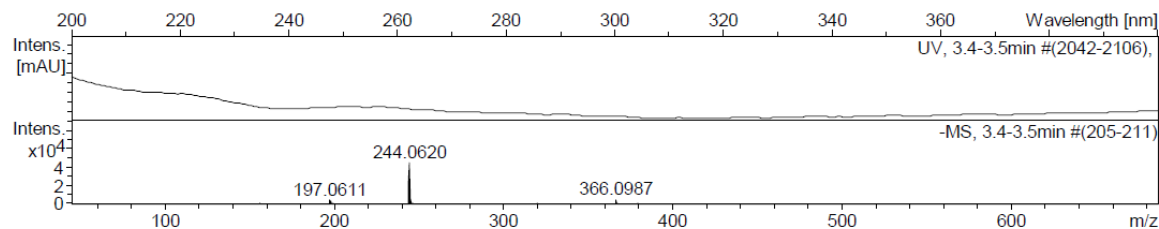
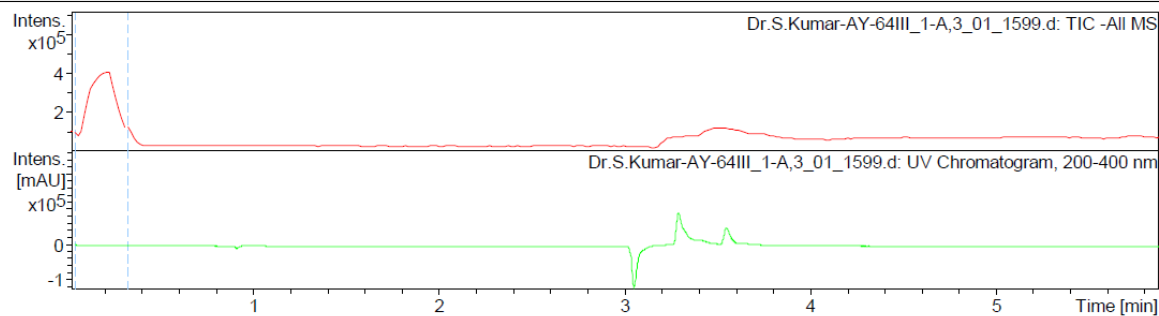
Display Report

Analysis Info

Analysis Name D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-64III_1-A,3_01_1599.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-64III
Comment
Acquisition Date 11/29/2013 12:40:31 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



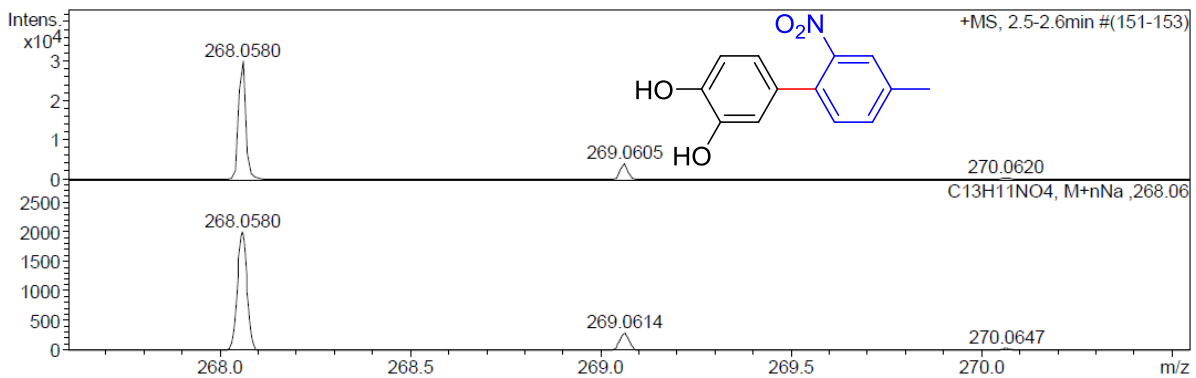
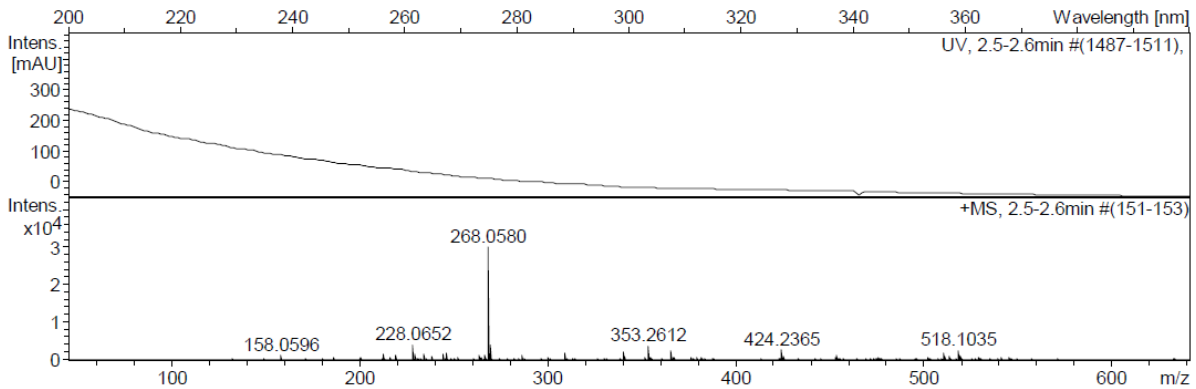
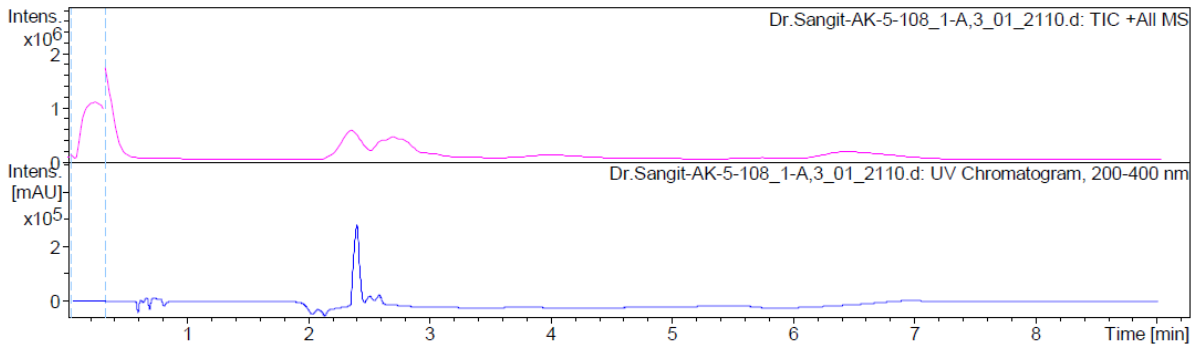
Display Report

Analysis Info

Analysis Name	D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-5-108_1-A,3_01_2110.d	Acquisition Date	3/18/2014 12:14:45 PM
Method	HRLCMS-20 Sept.m	Operator	Amit
Sample Name	Dr.Sangit-AK-5-108	Instrument	micrOTOF-Q II 10330
Comment			

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

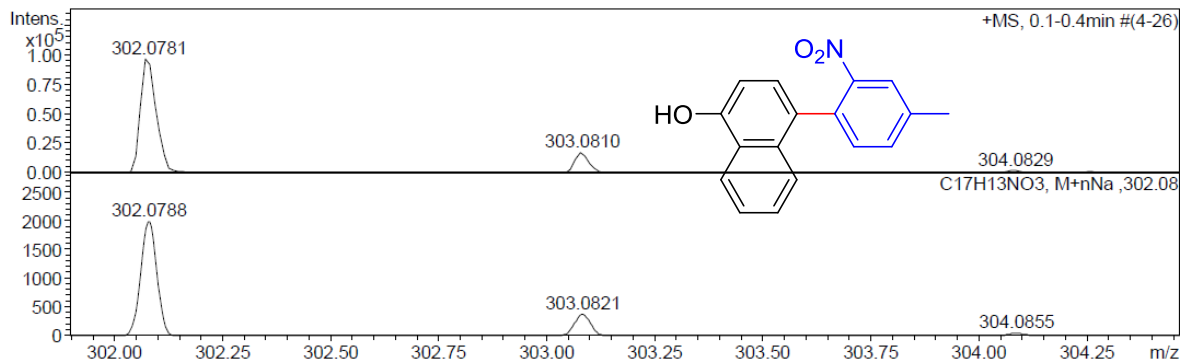
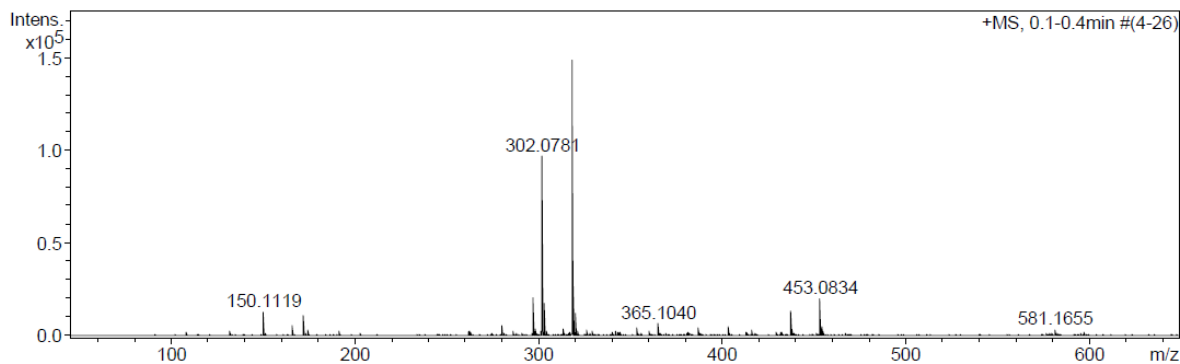
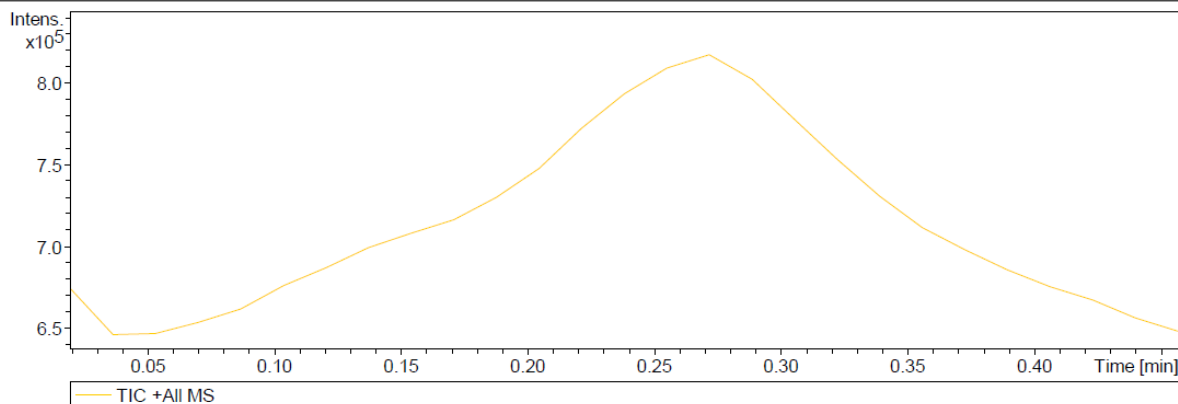
Analysis Name D:\Data\user data\2013\DEC\27 dec\Dr. S.Kumar-AK-4-40(II).d
Method tune_low.m
Sample Name AK-4-40(II)
Comment

Acquisition Date 12/30/2013 12:01:20 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



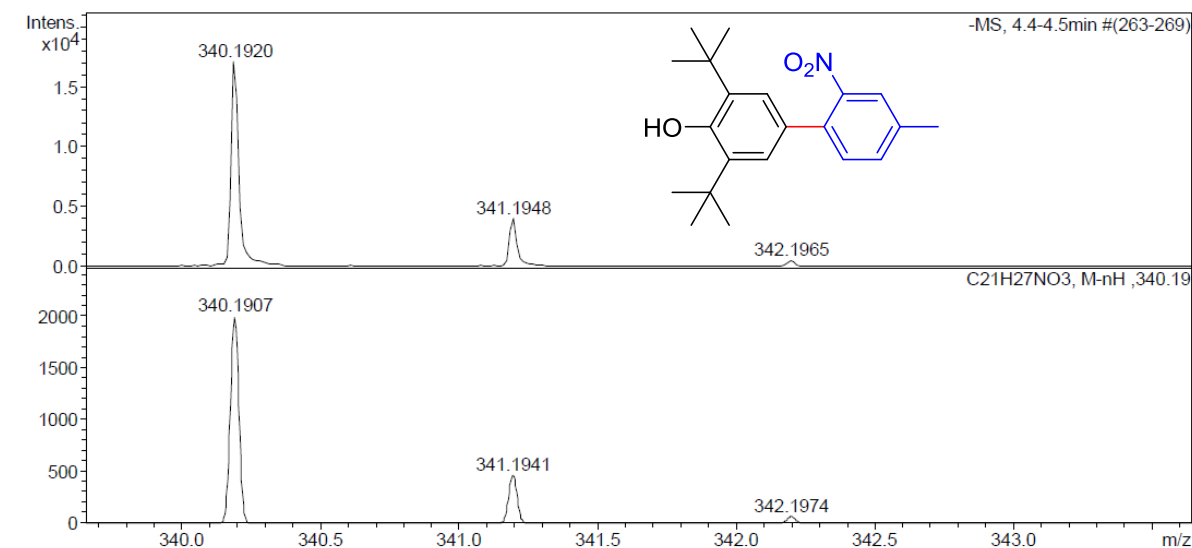
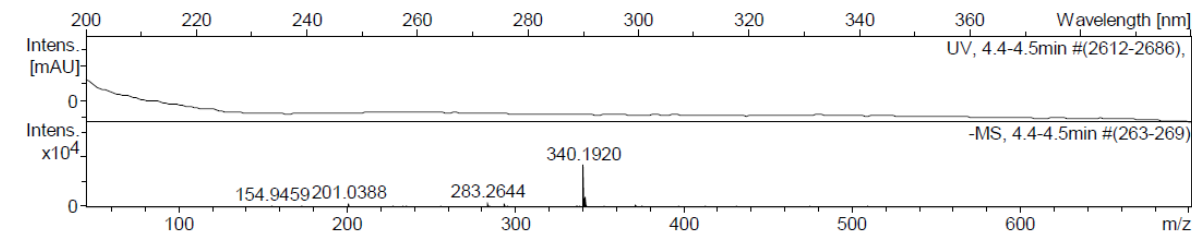
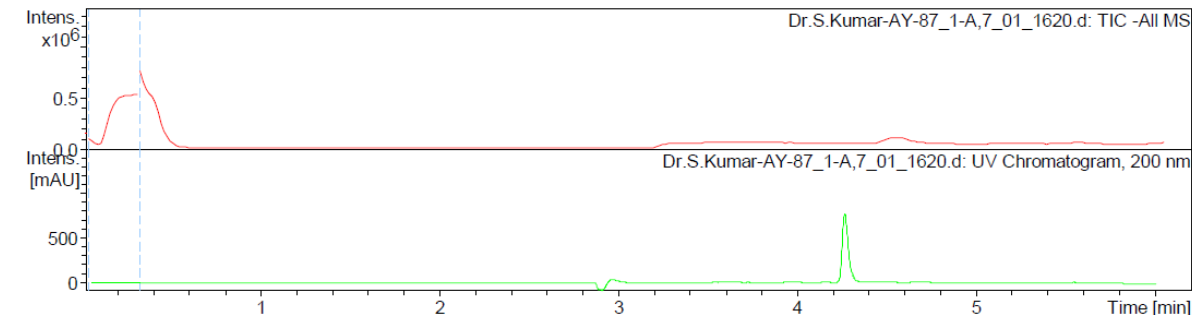
Display Report

Analysis Info

Analysis Name D:\Data\user data\2013\DEC\02 DEC\Dr.S.Kumar-AY-87_1-A,7_01_1620.d Acquisition Date 12/2/2013 1:03:17 PM
Method HRLCMS-6 FEB.m Operator Amit
Sample Name Dr.S.Kumar-AY-87 Instrument micrOTOF-Q II 10330
Comment

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

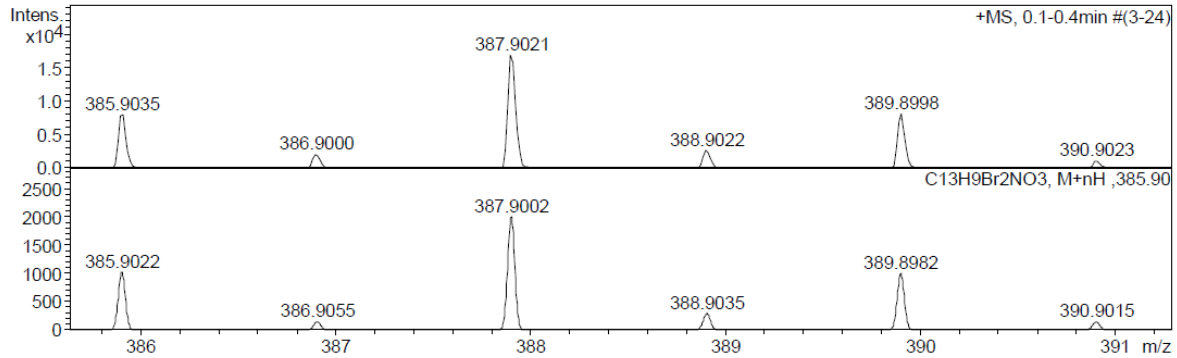
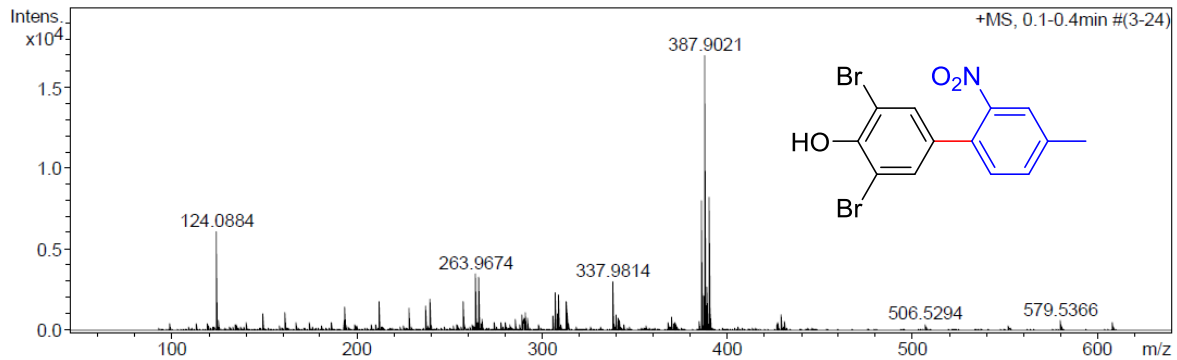
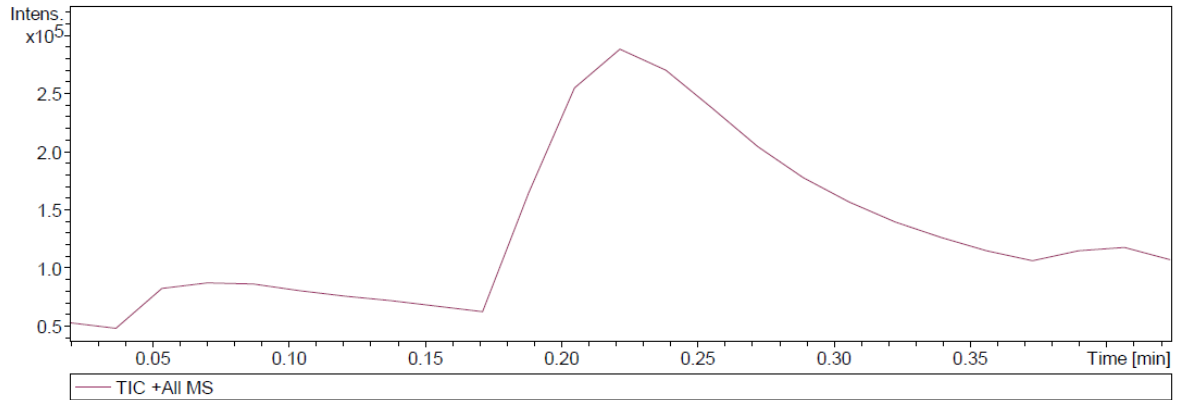
Analysis Name D:\Data\user data\2013\DEC\27 dec\Dr.S.Kumar-AK-4-87.d
Method tune_low.m
Sample Name AK-4-87
Comment

Acquisition Date 12/27/2013 12:37:07 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	APCI	Ion Polarity	Positive	Set Nebulizer	1.6 Bar
Focus	Not active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	8.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

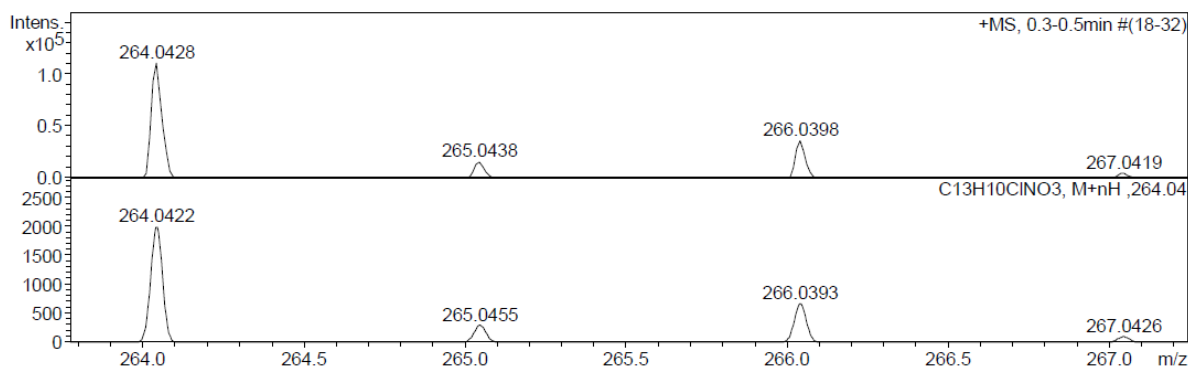
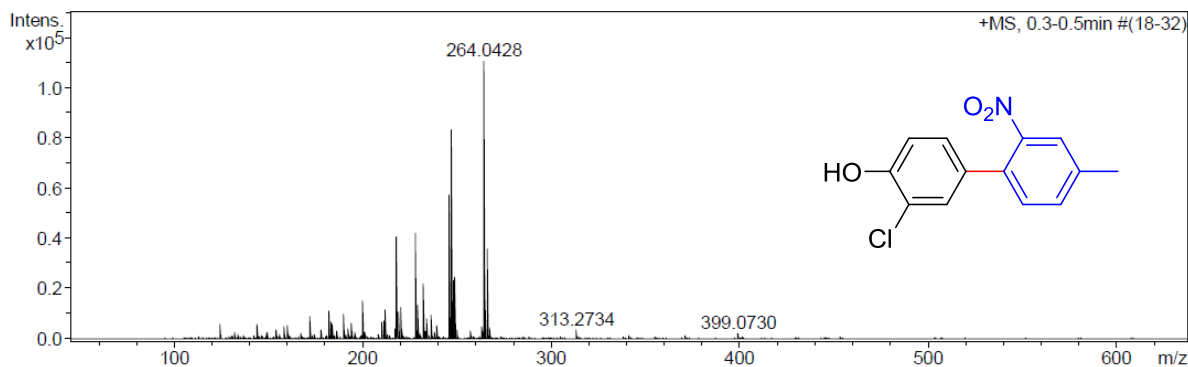
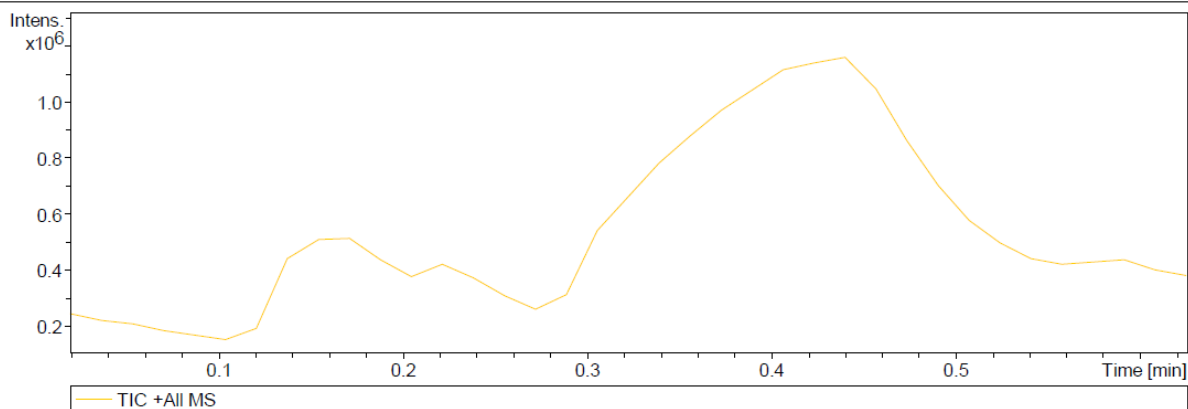
Analysis Name D:\Data\user data\2013\DEC\27 dec\Dr.S.Kumar-AK-4-182II.d
Method tune_low.m
Sample Name AK-4-182II
Comment

Acquisition Date 12/27/2013 12:49:36 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	APCI	Ion Polarity	Positive	Set Nebulizer	1.6 Bar
Focus	Not active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	8.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

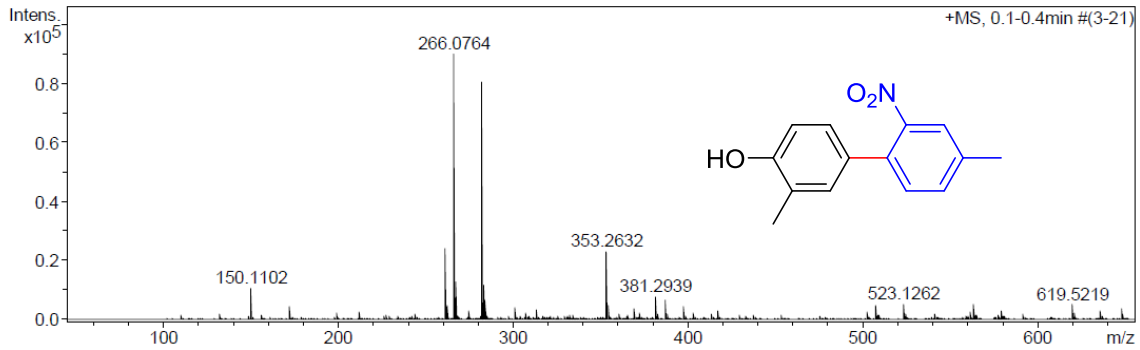
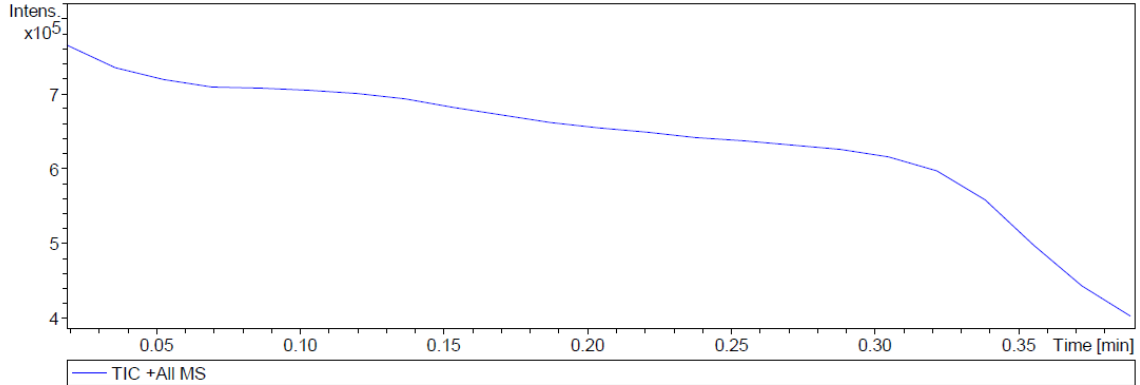
Analysis Name D:\Data\user data\2014\JAN\01jan\Dr.S.kumar-AY-58II.d
Method tune_low.m
Sample Name AY-58II
Comment

Acquisition Date 1/1/2014 2:52:34 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste

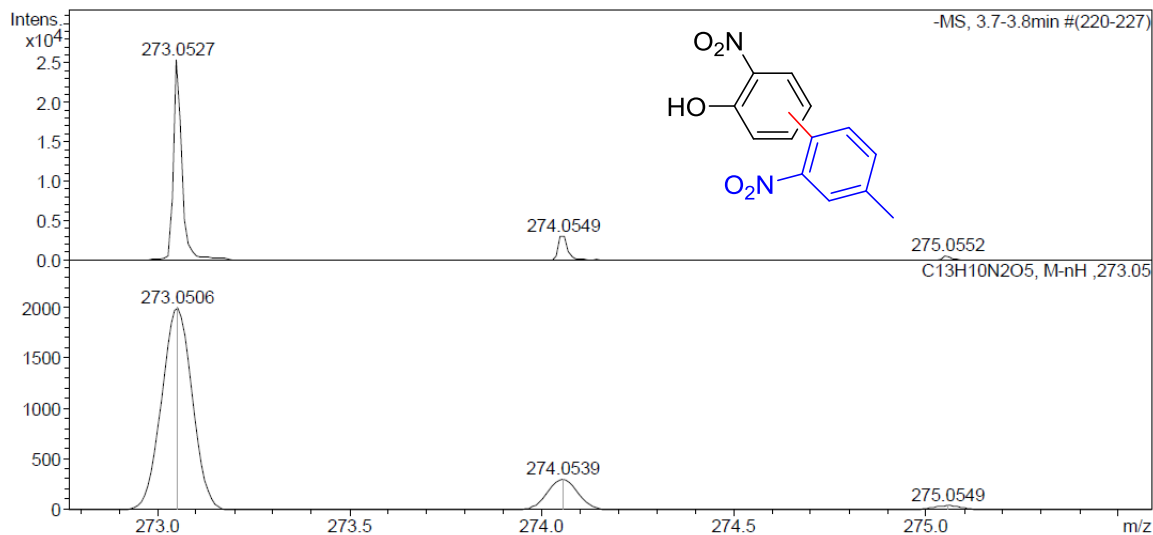
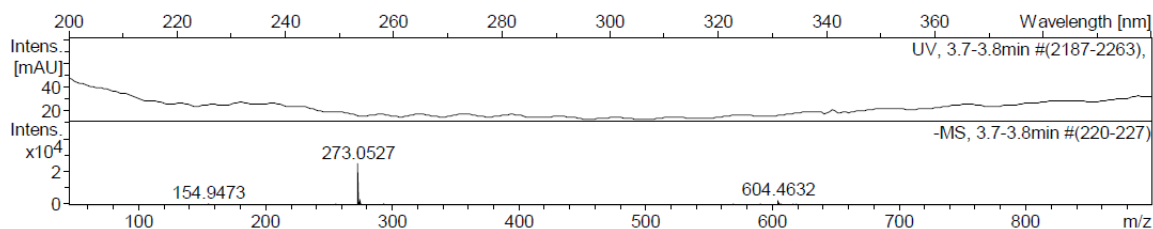
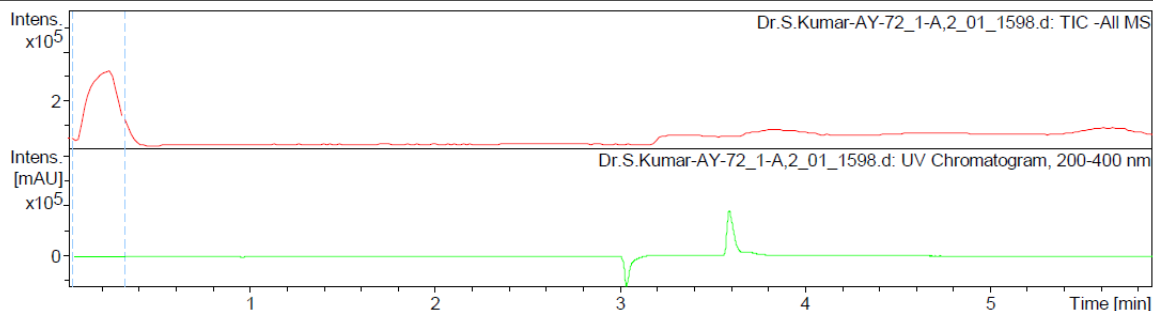


Display Report

Analysis Info
Analysis Name: D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-72_1-A,2_01_1598.d
Method: HRLCMS-6 FEB.m
Sample Name: Dr.S.Kumar-AY-72
Comment:
Acquisition Date: 11/29/2013 12:33:22 PM
Operator: Amit
Instrument: micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

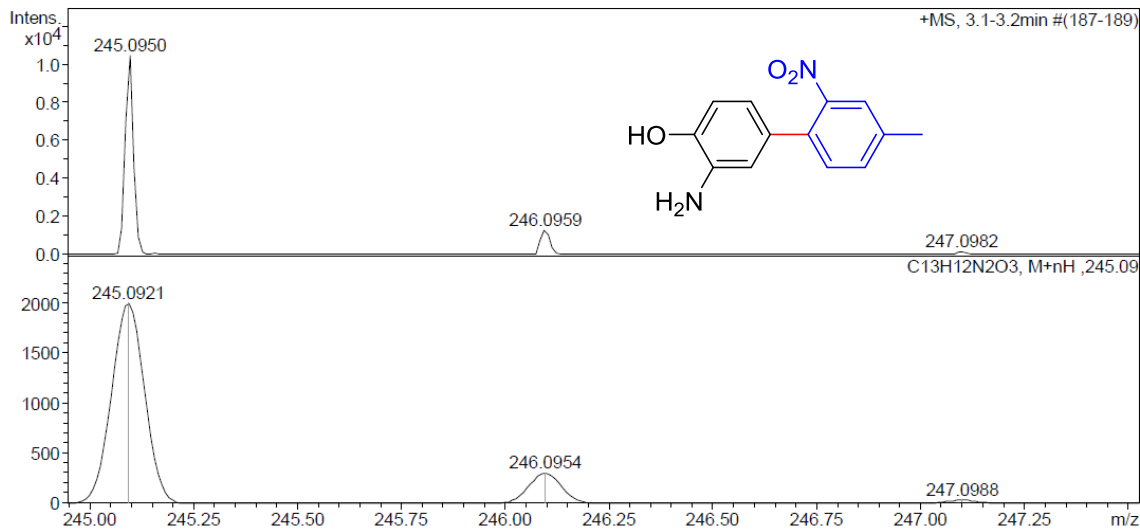
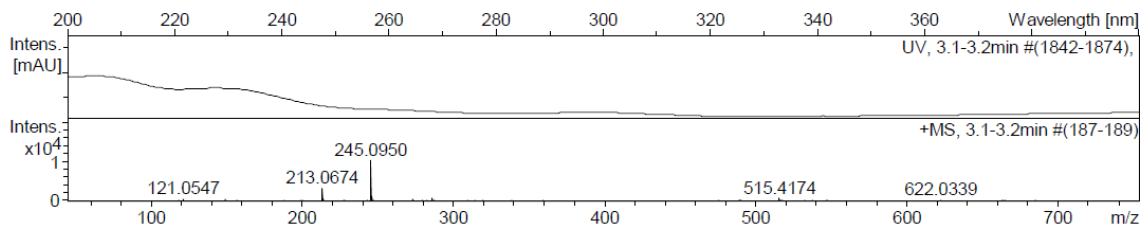
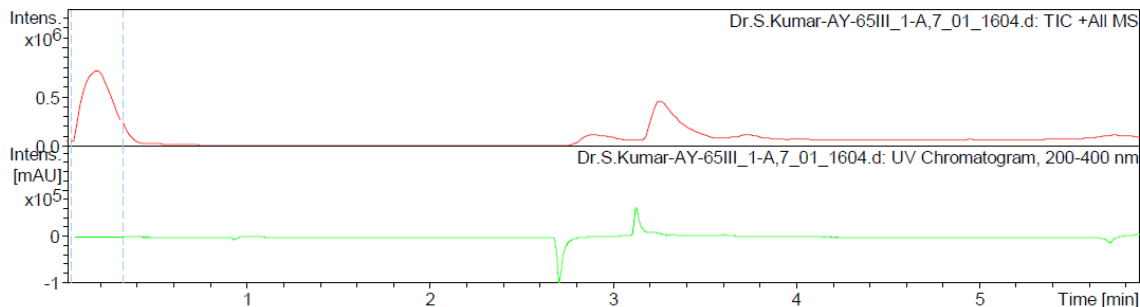
Analysis Info

Analysis Name D:\Data\user data\2013\NOV\29 nov\Dr.S.Kumar-AY-65III_1-A,7_01_1604.d
Method HRLCMS-20 Sept.m
Sample Name Dr.S.Kumar-AY-65III
Comment

Acquisition Date 11/29/2013 1:16:33 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

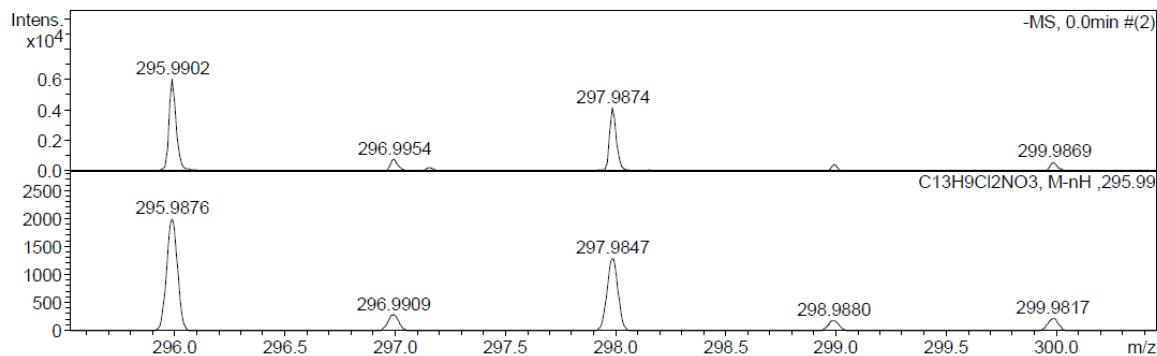
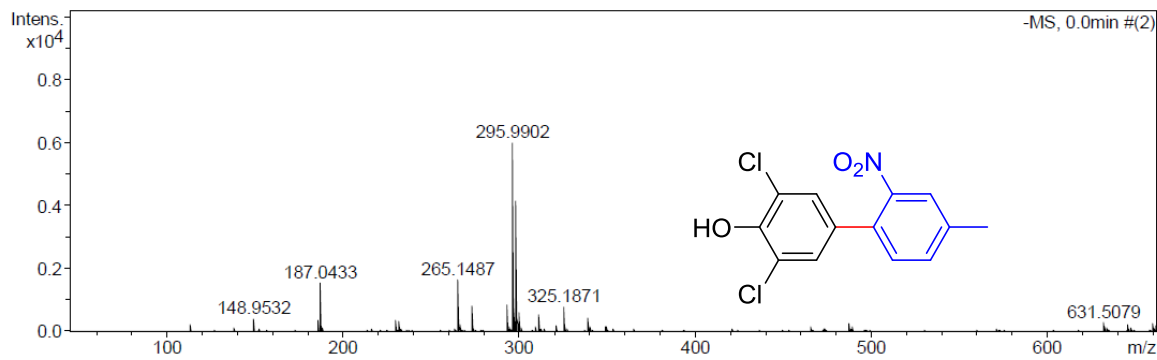
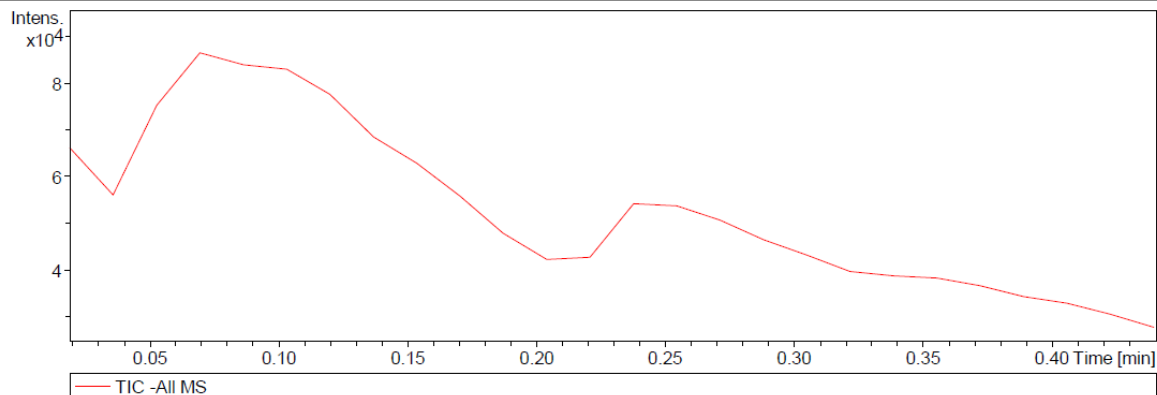
Analysis Name D:\Data\user data\2014\JAN\01\jan\Dr.S.kumar-AK-4-183.d
Method tune_low.m
Sample Name AK-4-183
Comment

Acquisition Date 1/1/2014 3:19:23 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	2500 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

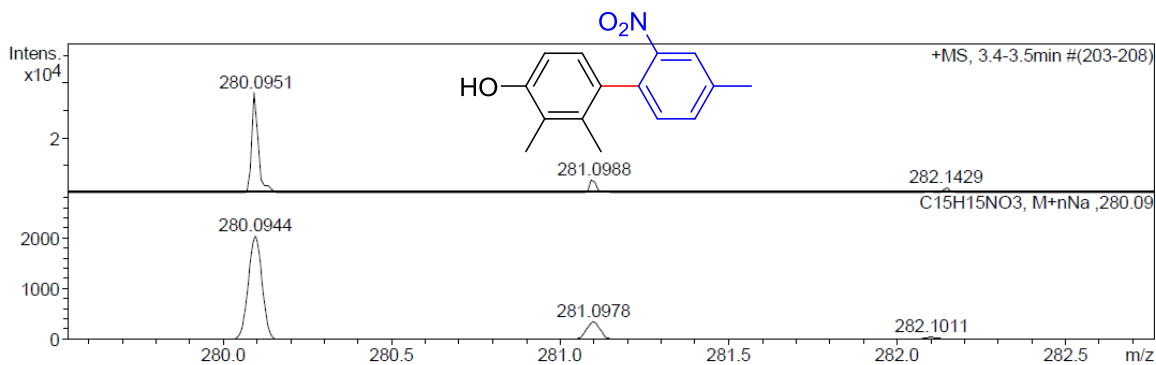
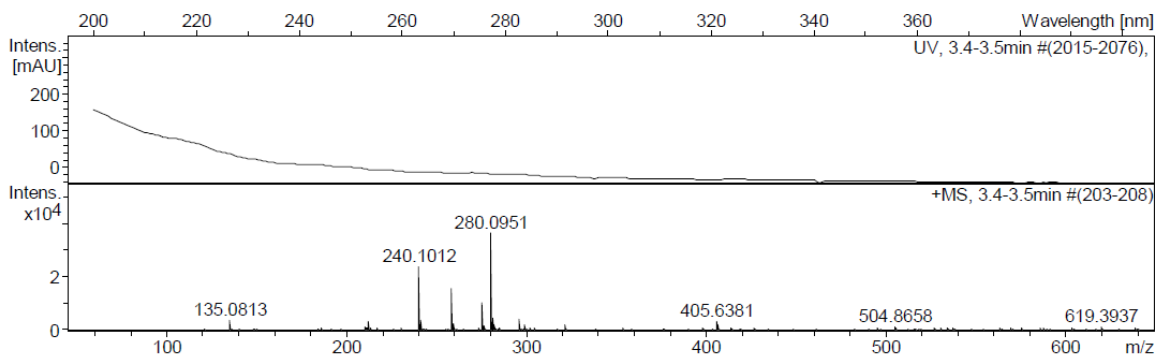
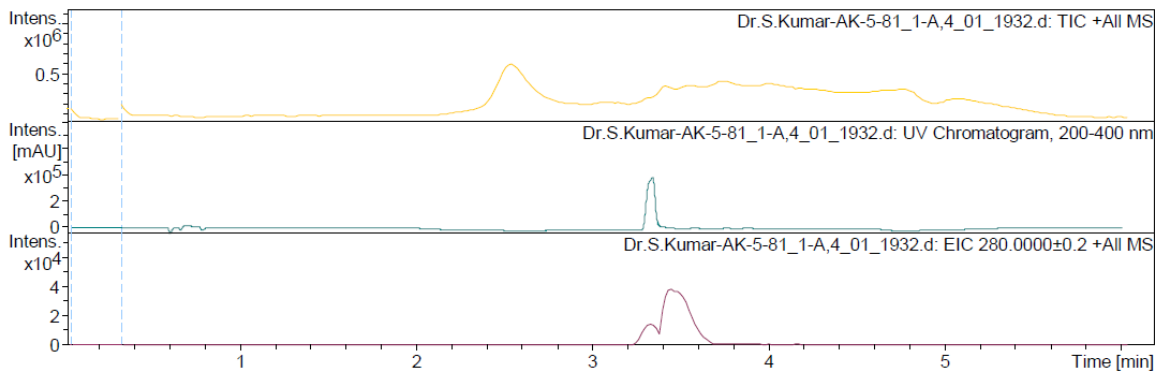
Analysis Info

Analysis Name D:\Data\user data\2014\FEB\21 FEB\Dr.S.Kumar-AK-5-81_1-A,4_01_1932.d
Method HRLCMS-20 Sept.m
Sample Name Dr.S.Kumar-AK-5-81
Comment

Acquisition Date 2/21/2014 2:08:09 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

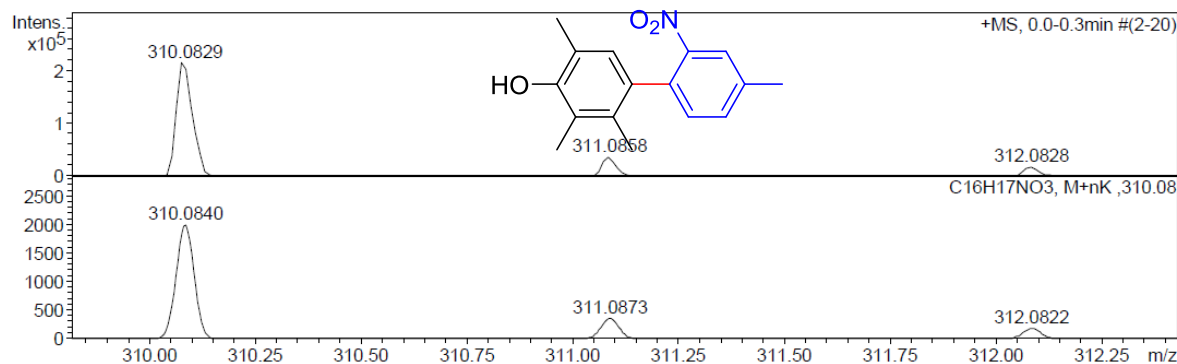
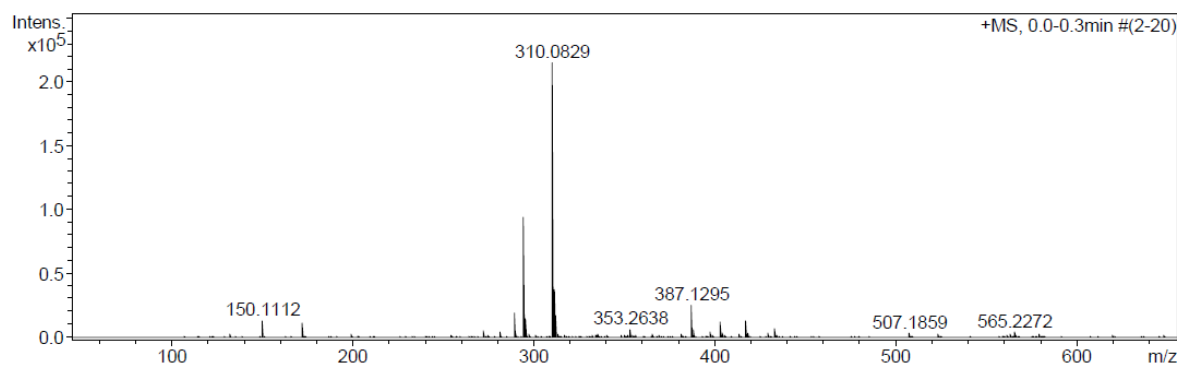
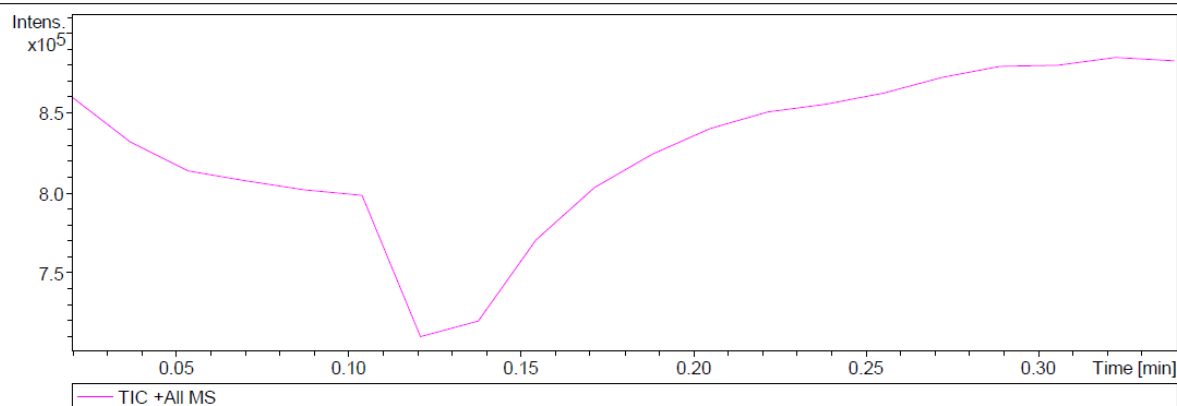
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\01jan\Dr.S.kumar-AY-129.d
Method tune_low.m
Sample Name AY-129
Comment

Acquisition Date 1/1/2014 3:02:17 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

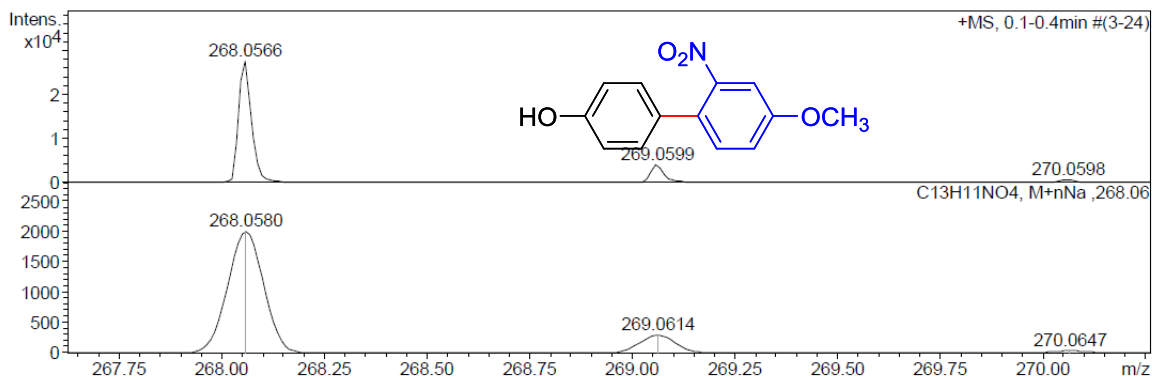
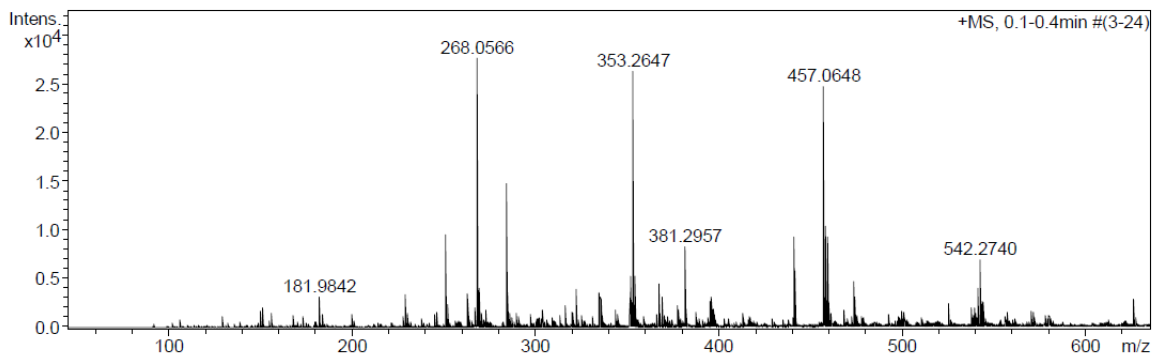
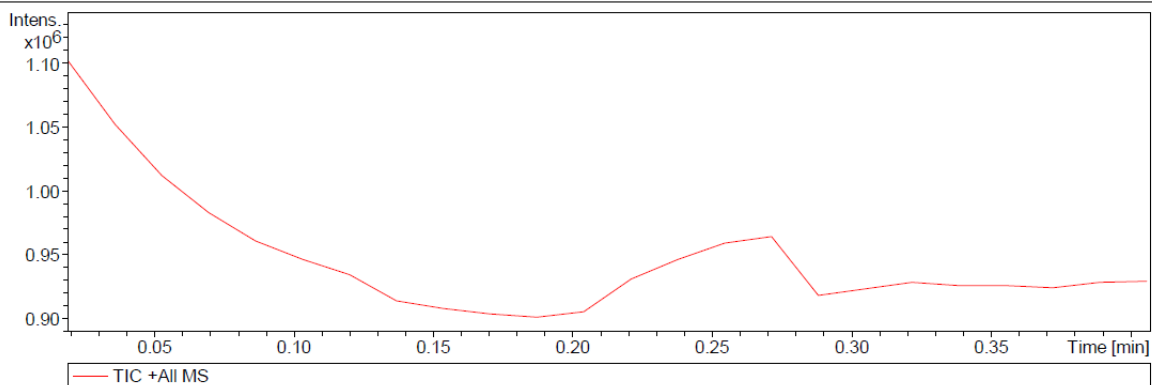
Analysis Name D:\Data\user data\2014\JAN\17 jan\Dr.S.Kumar-AK-5-22.d
Method tune_low.m
Sample Name AK-5-22
Comment

Acquisition Date 1/17/2014 12:31:29 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

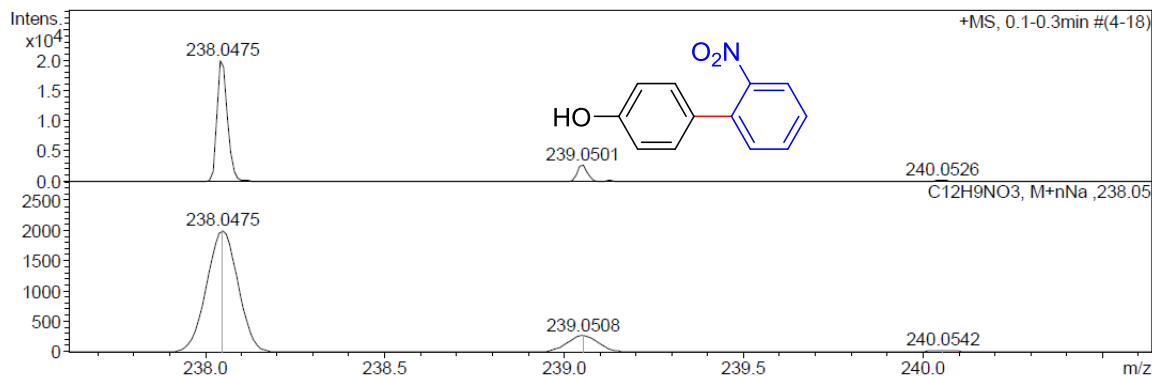
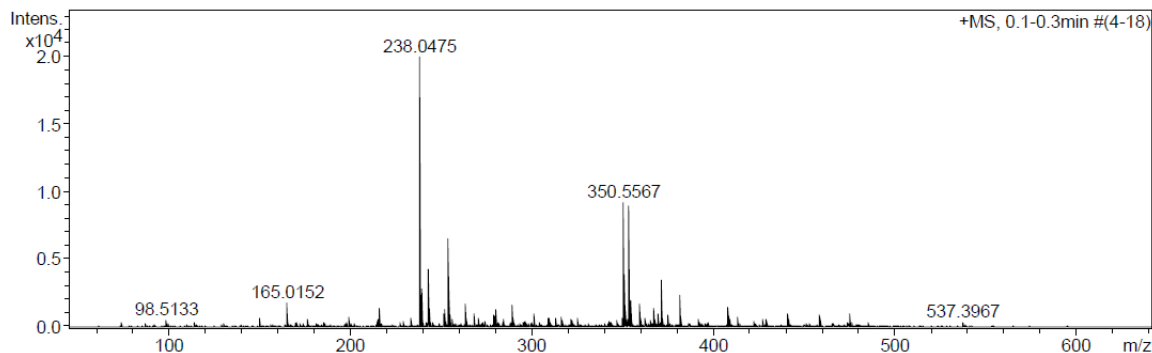
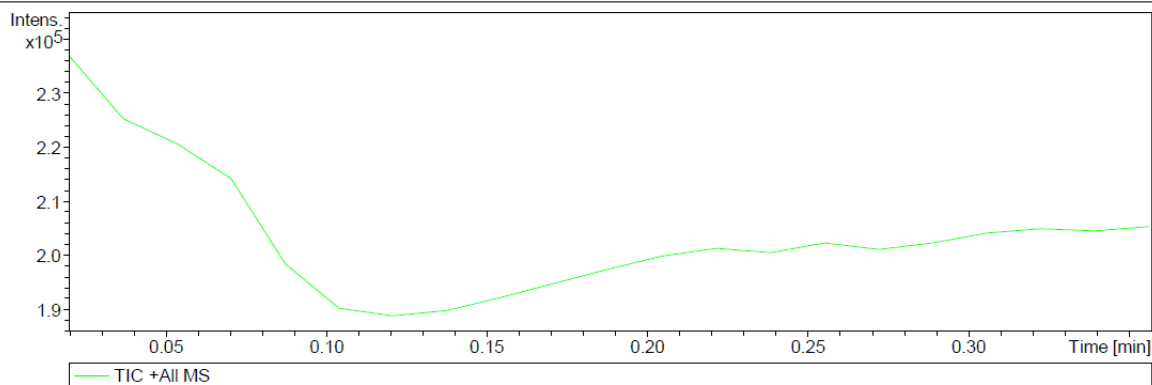
Analysis Name D:\Data\user data\2014\JAN\17 jan\Dr.S.Kumar-AK-5-24.d
Method tune_low.m
Sample Name AK-5-24
Comment

Acquisition Date 1/17/2014 12:38:51 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	50.0 Vpp	Set Divert Valve	Waste



Display Report

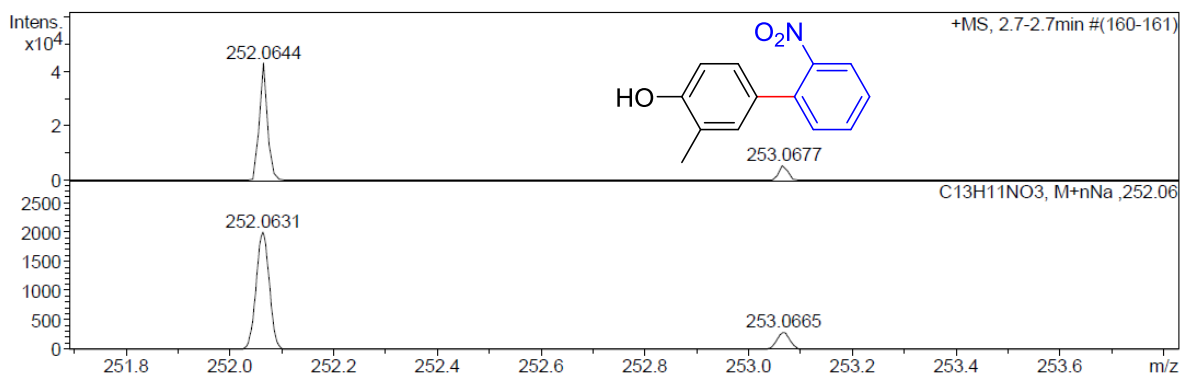
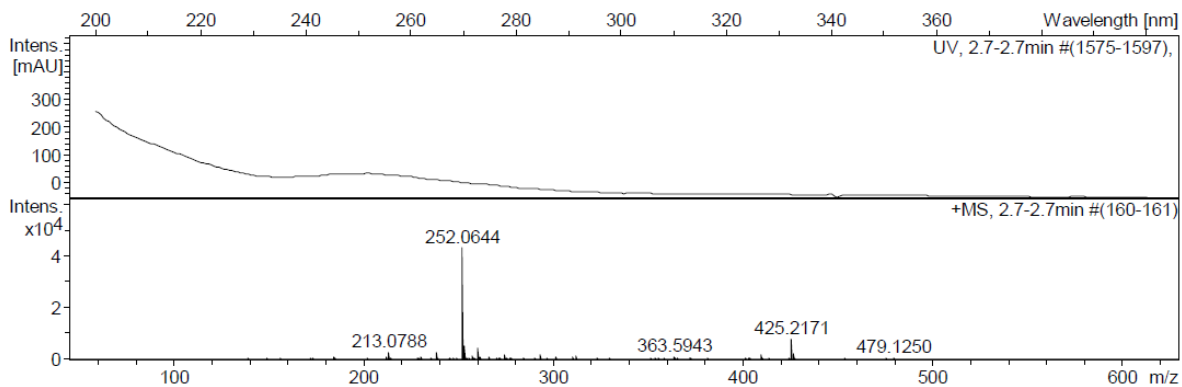
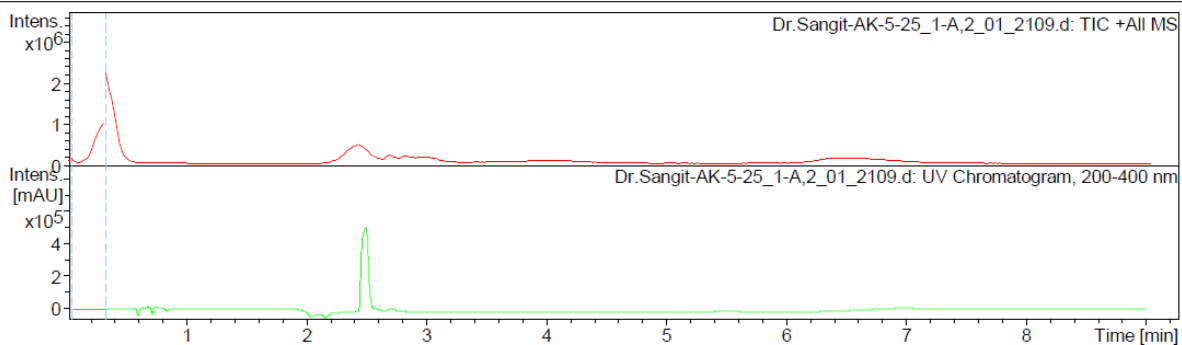
Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-5-25_1-A,2_01_2109.d
Method HRLCMS-20 Sept.m
Sample Name Dr.Sangit-AK-5-25
Comment

Acquisition Date 3/18/2014 12:04:33 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

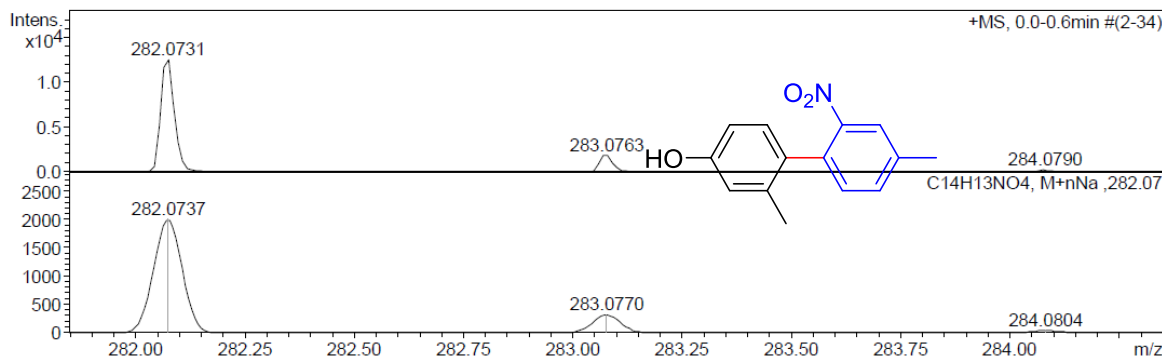
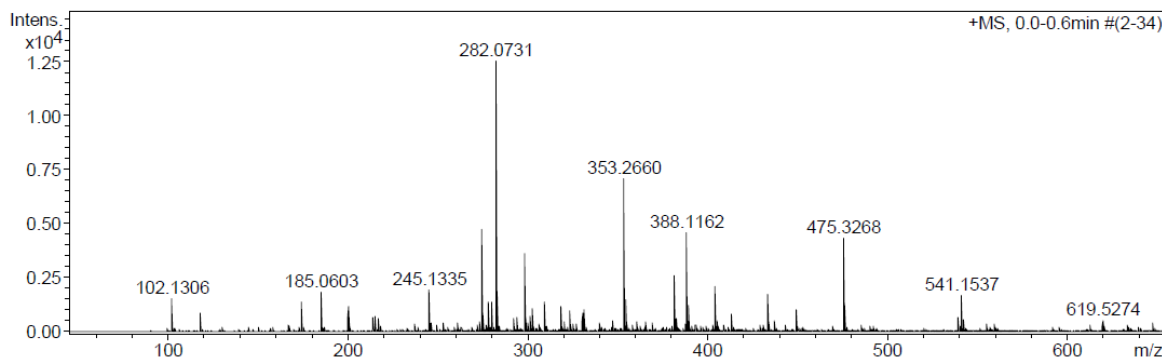
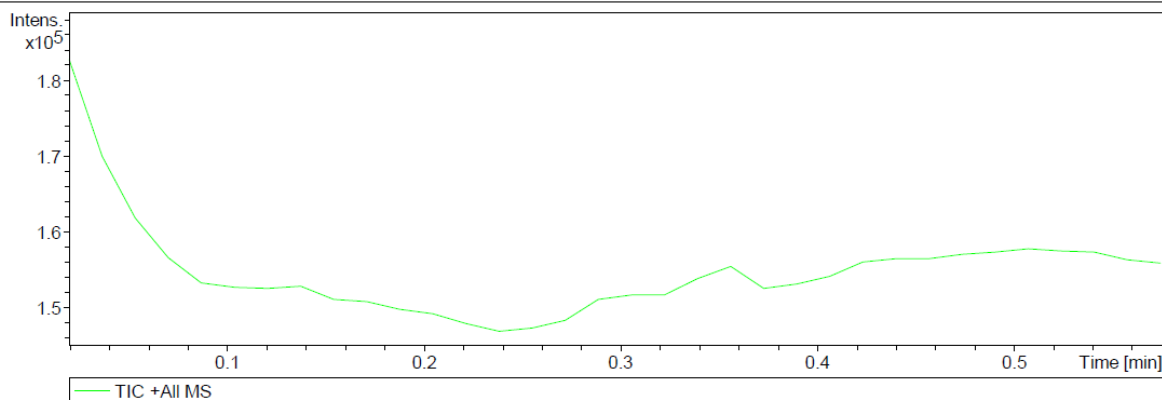
Analysis Info

Analysis Name D:\Data\user data\2013\DEC\26 dec\Dr.S.Kumar-AK-4-157II-1.d
Method tune_low.m
Sample Name AK-4-157II
Comment

Acquisition Date 12/26/2013 1:25:59 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

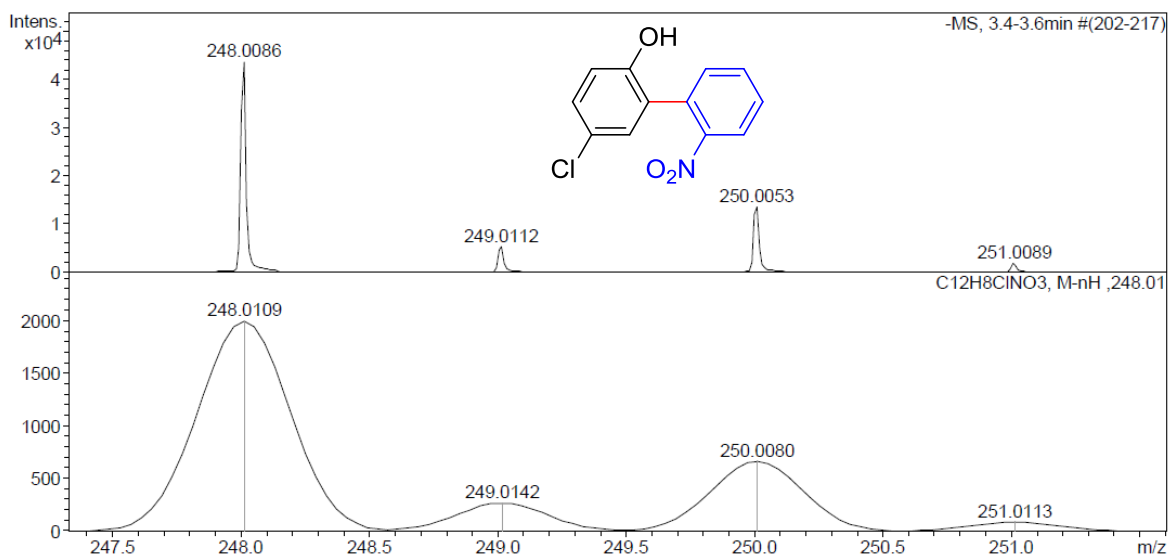
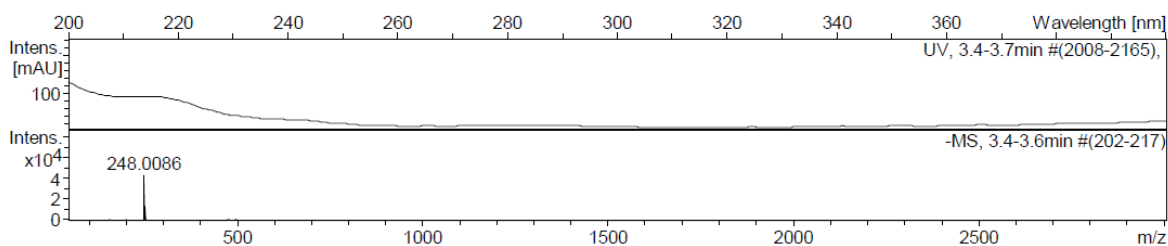
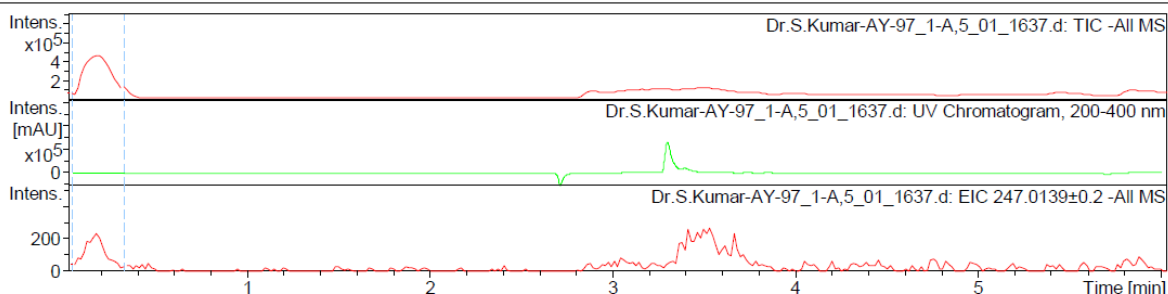
Analysis Info

Analysis Name D:\Data\user data\2013\DEC\05 dec\Dr.S.Kumar-AY-97_1-A,5_01_1637.d
Method HRLCMS-20 Sept.m
Sample Name Dr.S.Kumar-AY-97
Comment

Acquisition Date 12/5/2013 1:51:43 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



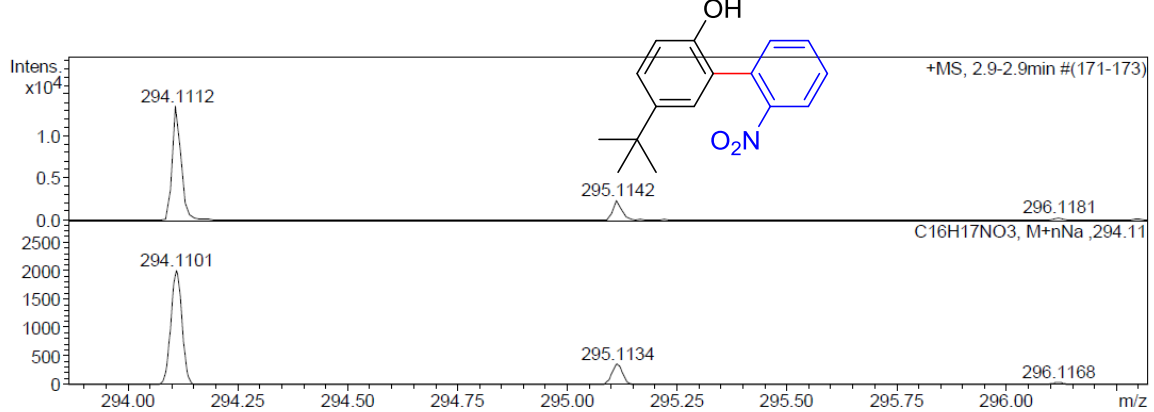
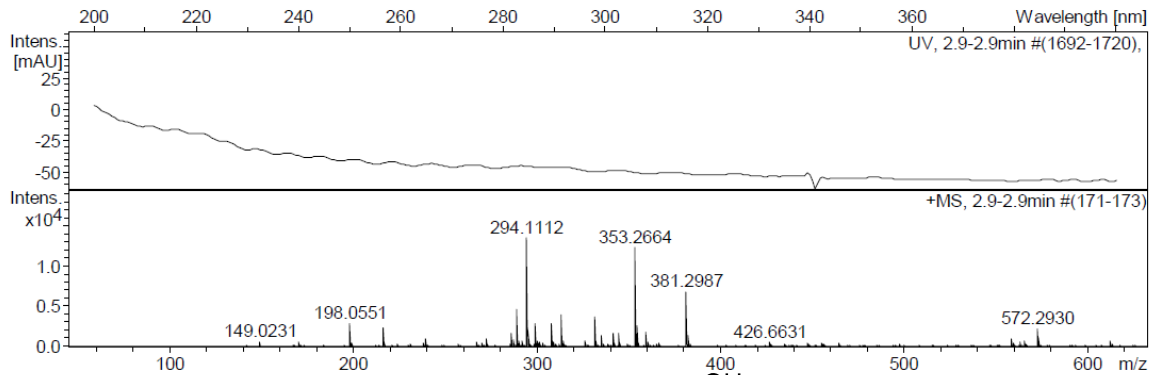
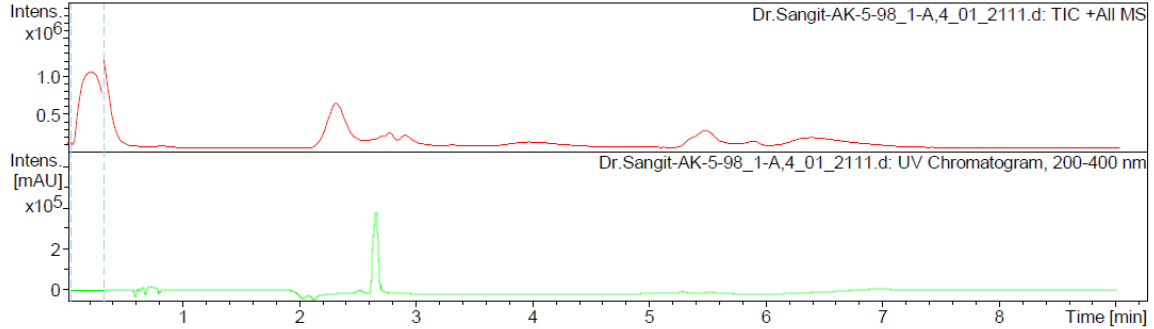
Display Report

Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-5-98_1-A,4_01_2111.d
Method HRLCMS-20 Sept.m
Sample Name Dr.Sangit-AK-5-98
Comment
Acquisition Date 3/18/2014 12:24:54 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

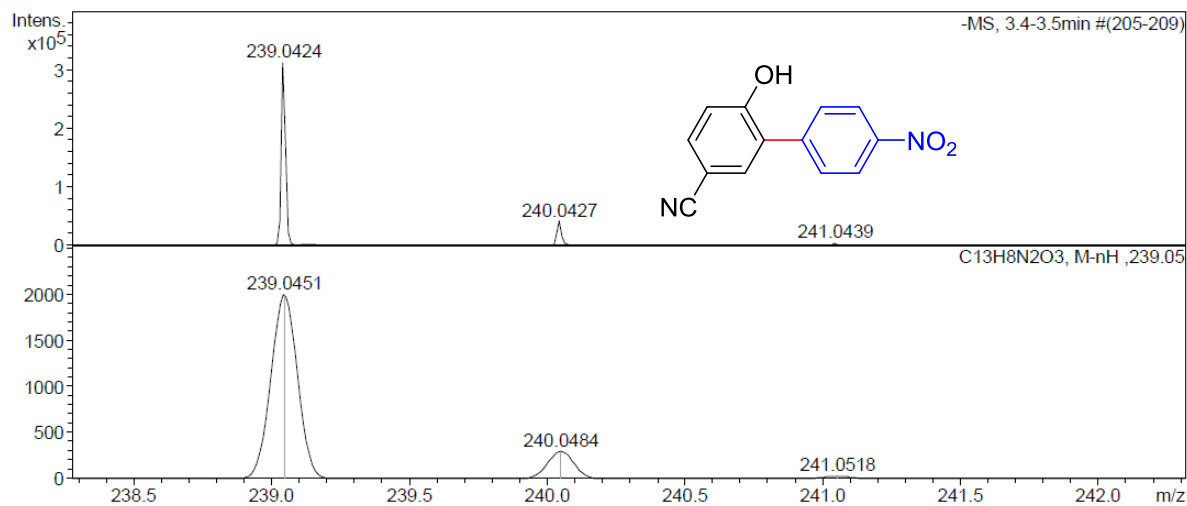
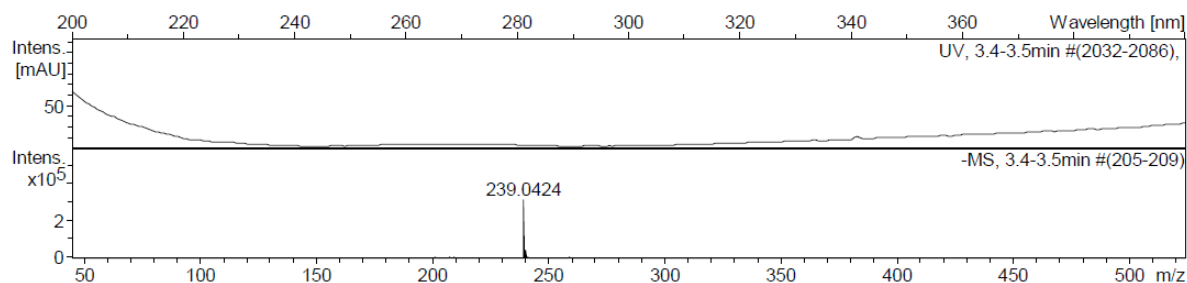
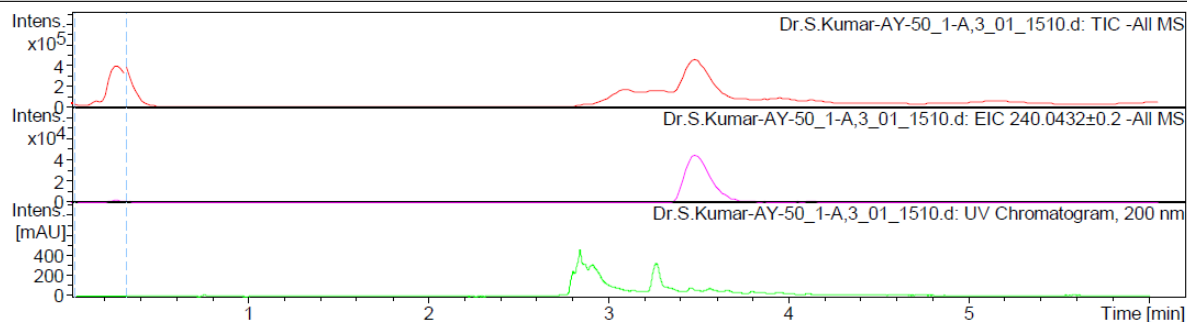
Analysis Info

Analysis Name D:\Data\user data\2013\NOV\20 NOV\Dr.S.Kumar-AY-50_1-A,3_01_1510.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-50
Comment

Acquisition Date 11/20/2013 4:52:15 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

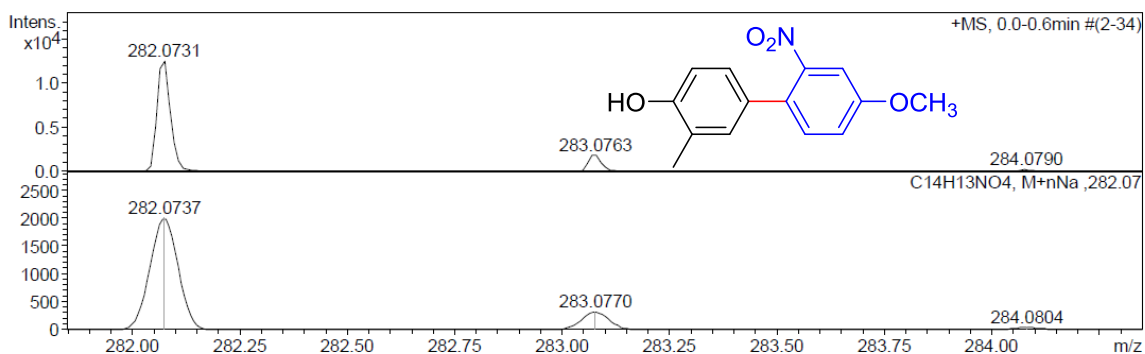
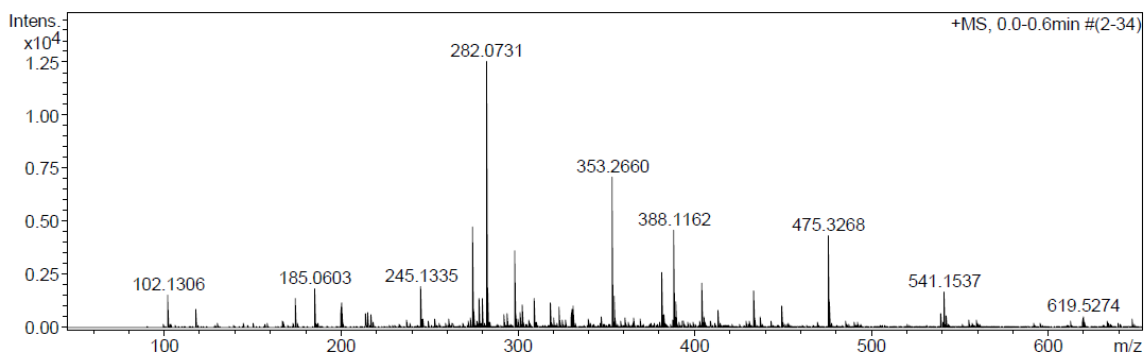
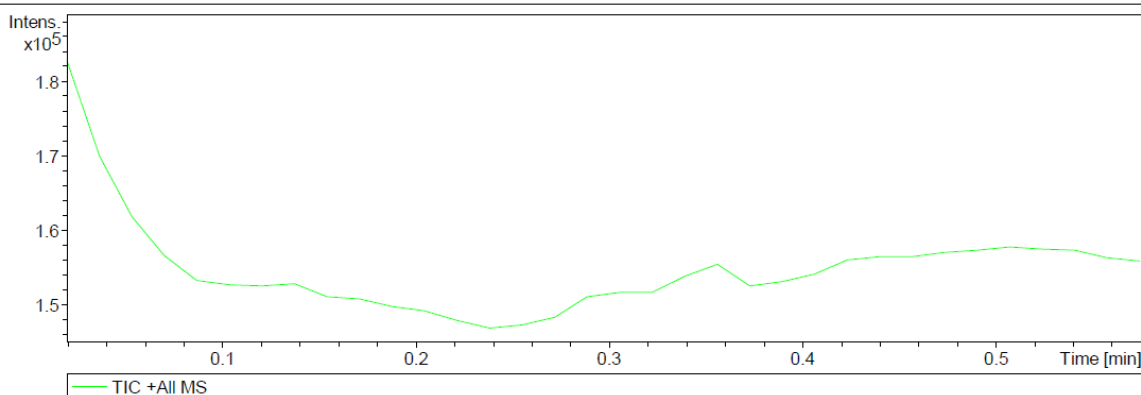
Analysis Name D:\Data\user data\2013\DEC\26 dec\Dr.S.Kumar-AK-4-157II-1.d
Method tune_low.m
Sample Name AK-4-157II
Comment

Acquisition Date 12/26/2013 1:25:59 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

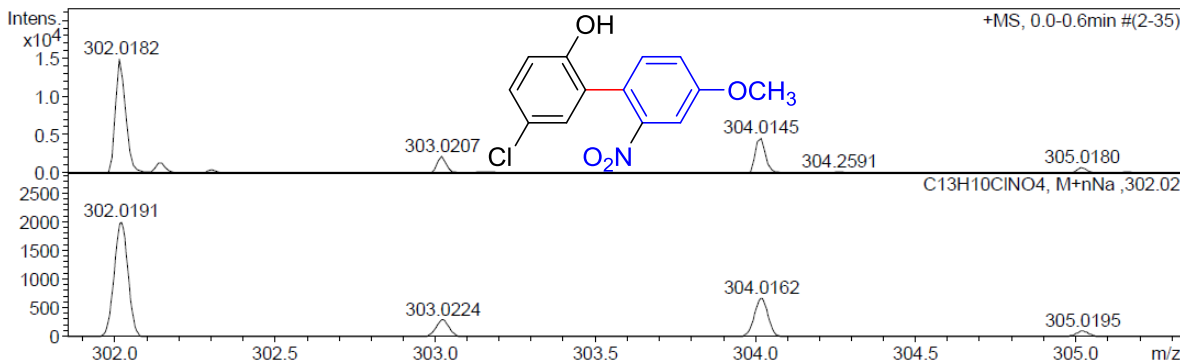
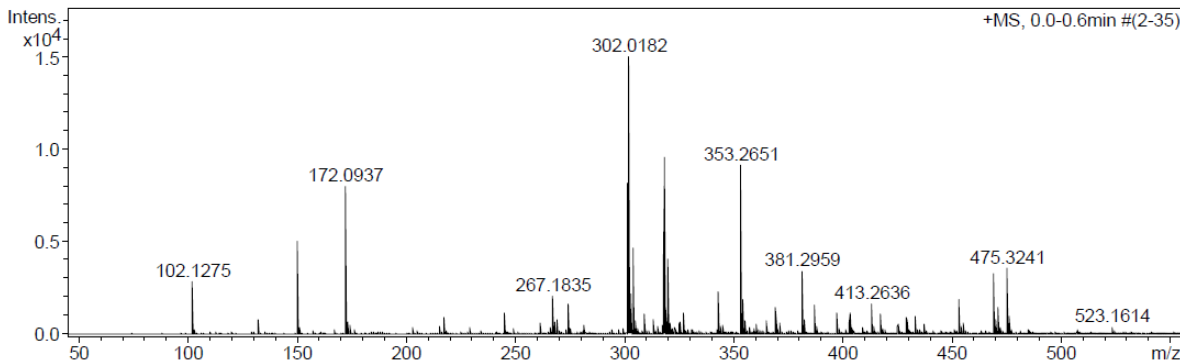
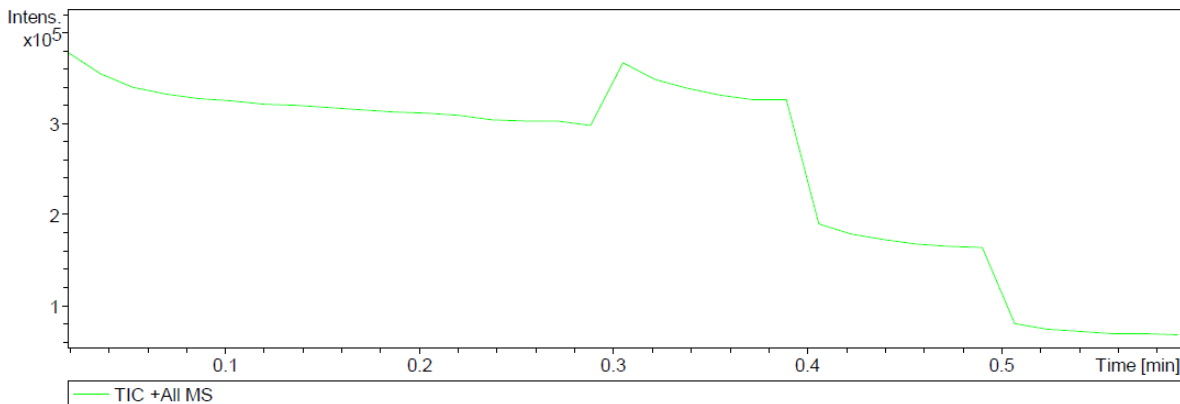
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\01\jan\Dr.S.kumar-AK-4-188.d
Method tune_low.m
Sample Name AK-4-188
Comment

Acquisition Date 1/1/2014 3:12:04 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

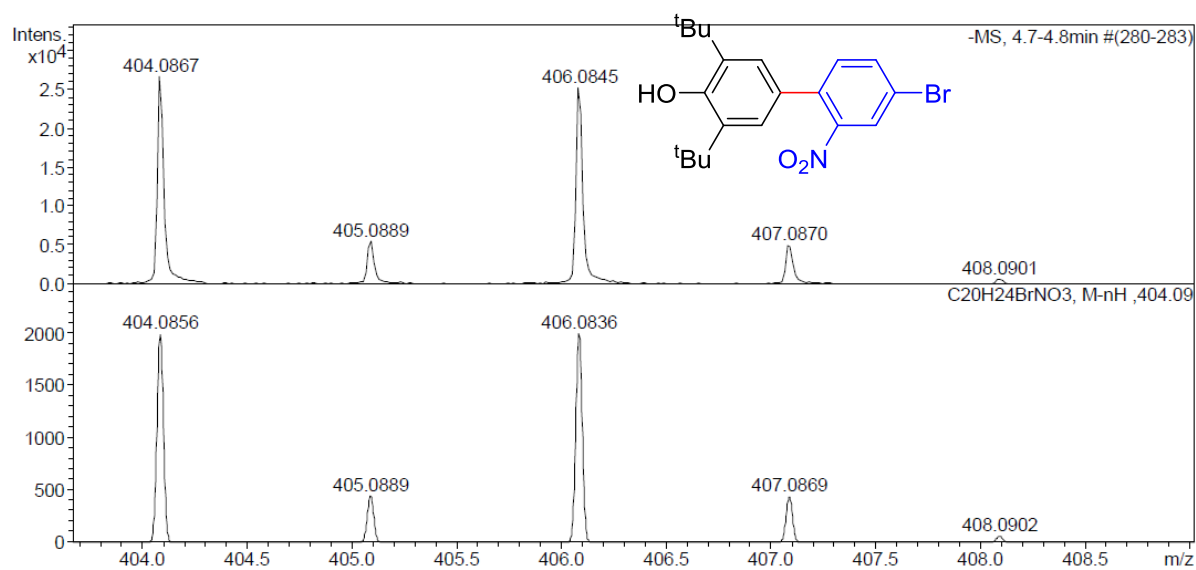
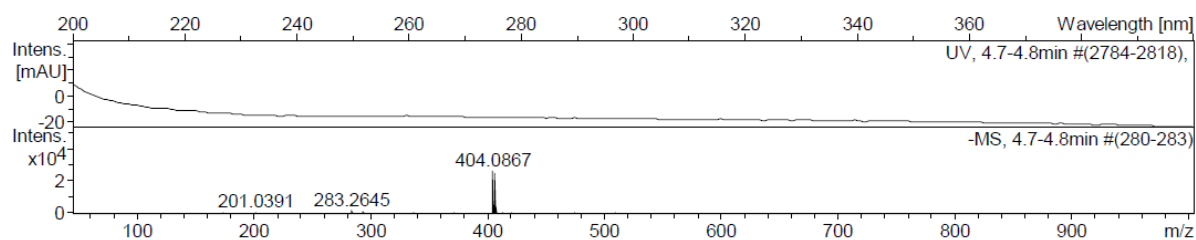
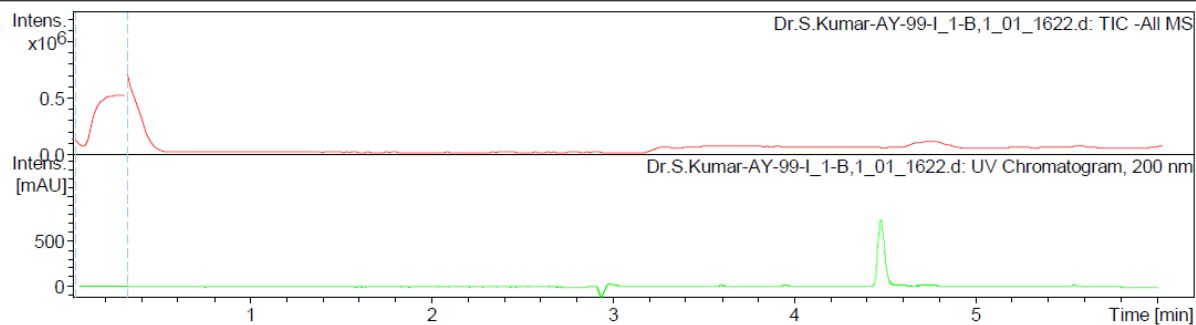
Analysis Info

Analysis Name D:\Data\user data\2013\DEC\02 DEC\Dr.S.Kumar-AY-99-I_1-B,1_01_1622.d
Method HRLCMS-6 FEB.m
Sample Name Dr.S.Kumar-AY-99-I
Comment

Acquisition Date 12/2/2013 1:17:37 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Negative	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	2500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

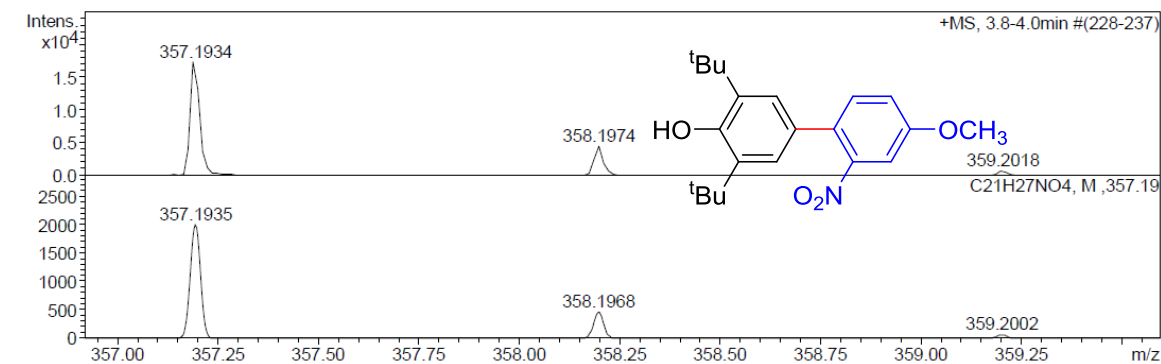
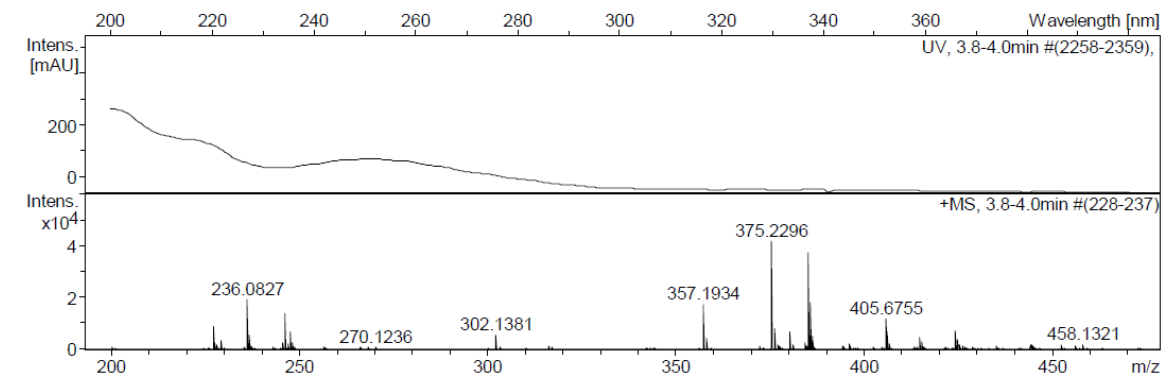
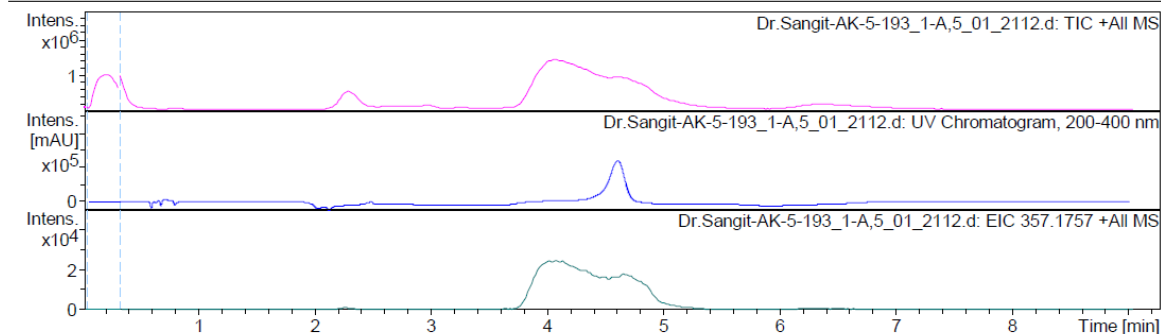
Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-5-193_1-A,5_01_2112.d
Method HRLCMS-20 Sept.m
Sample Name Dr.Sangit-AK-5-193
Comment

Acquisition Date 3/18/2014 12:35:03 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



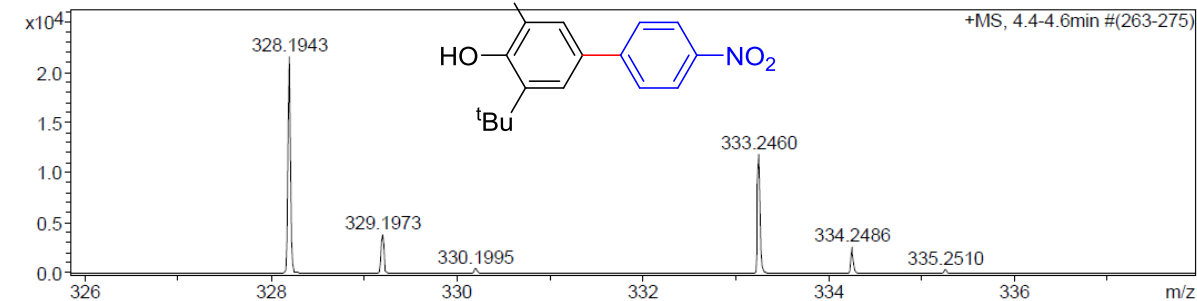
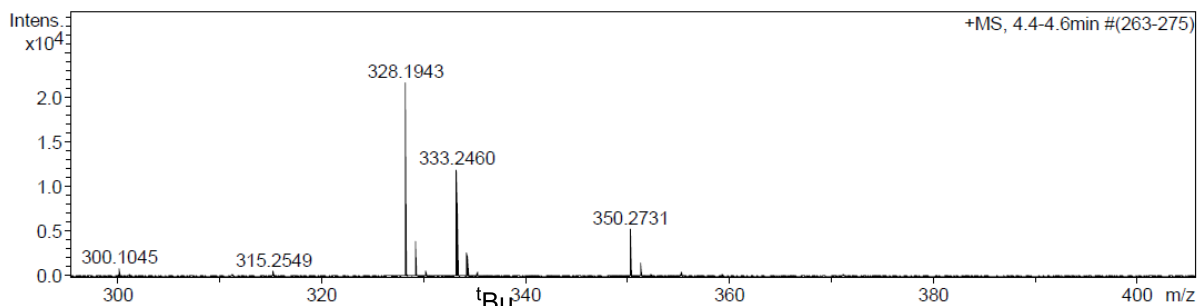
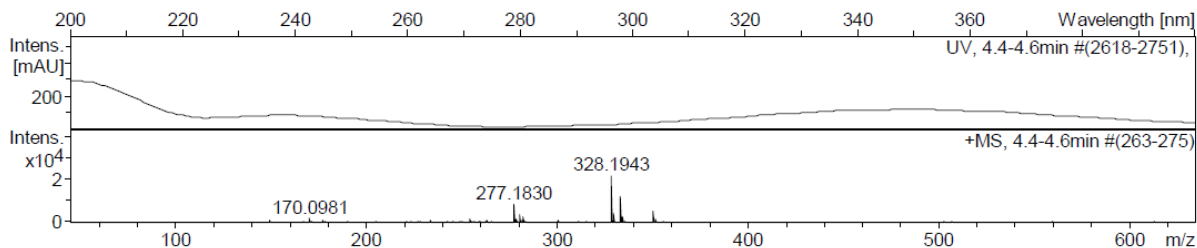
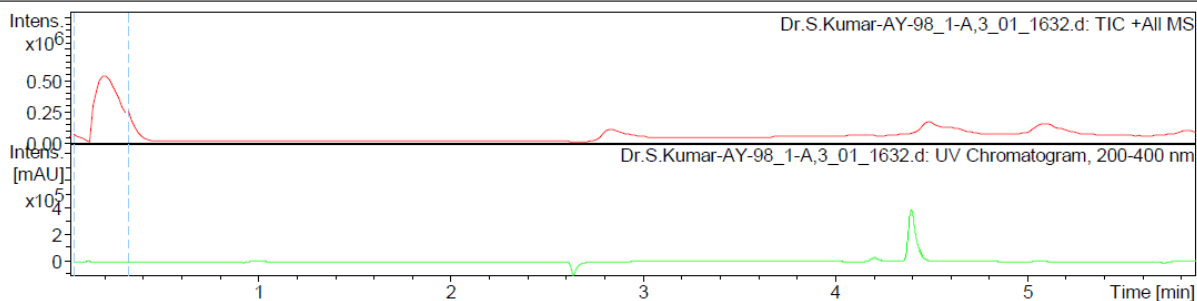
Display Report

Analysis Info

Analysis Name D:\Data\user data\2013\DEC\05 dec\Dr.S.Kumar-AY-98_1-A,3_01_1632.d Acquisition Date 12/5/2013 1:15:04 PM
Method HRLCMS-20 Sept.m Operator Amit
Sample Name Dr.S.Kumar-AY-98 Instrument micrOTOF-Q II 10330
Comment

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

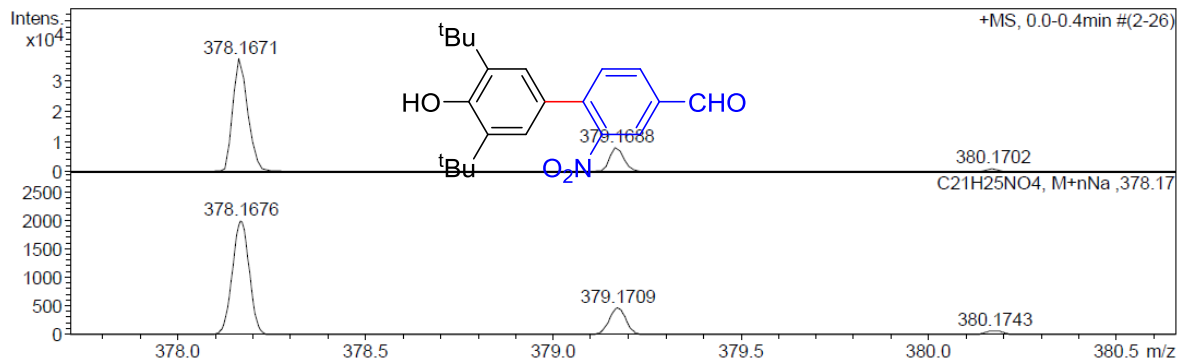
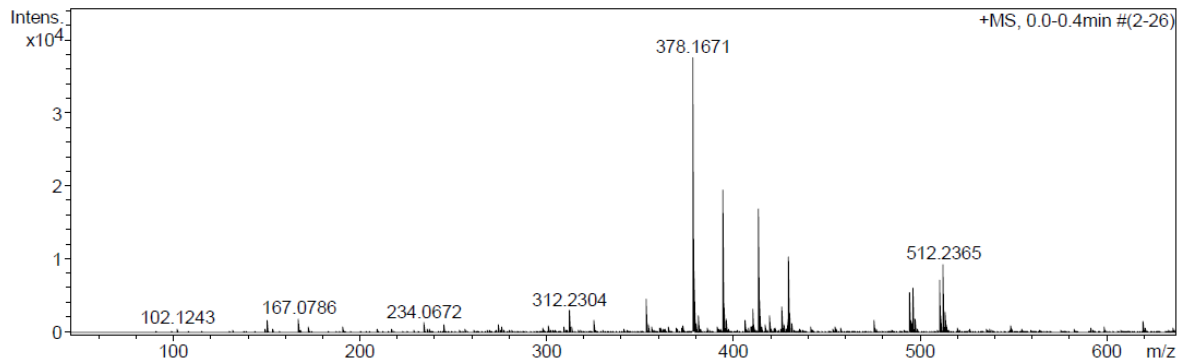
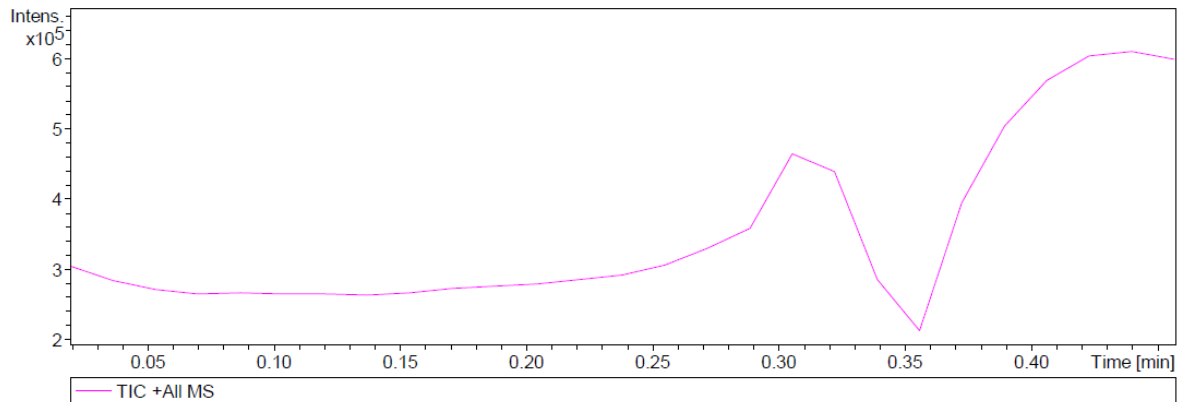
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\06 jan\Dr.S.Kumar-AK-5-53.d
Method tune_low.m
Sample Name AK-5-53
Comment

Acquisition Date 1/6/2014 1:13:48 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

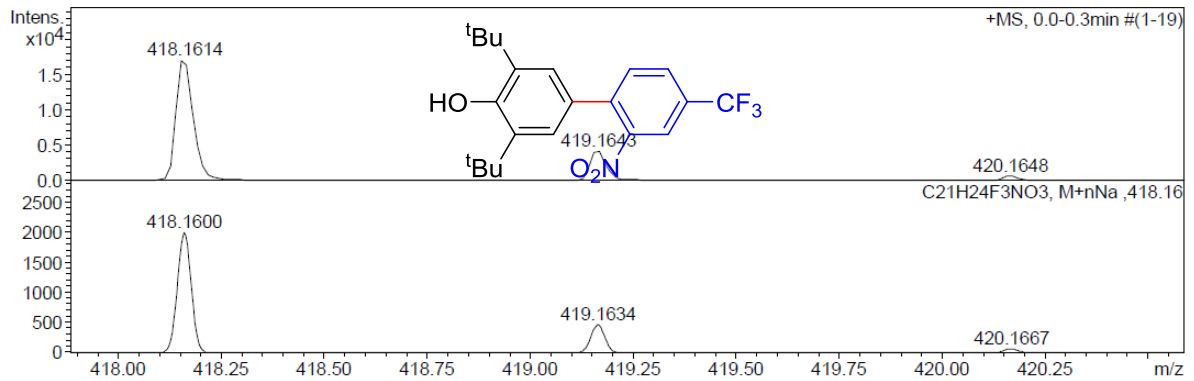
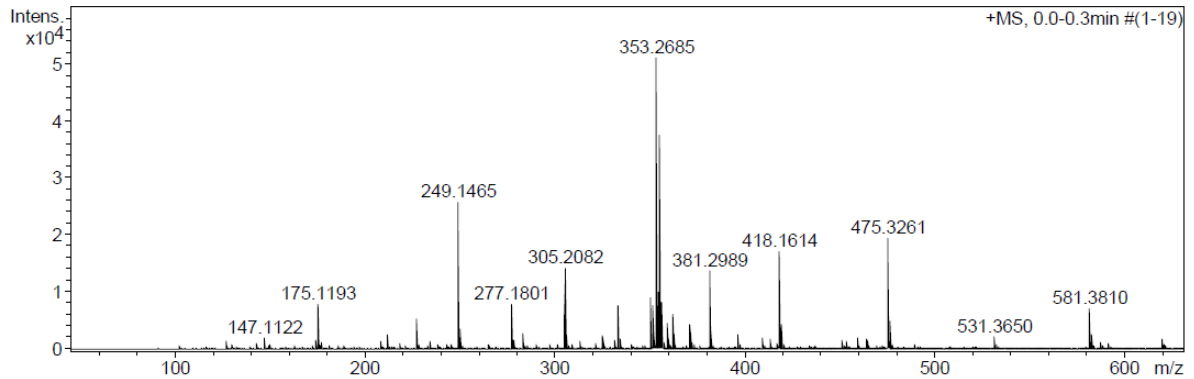
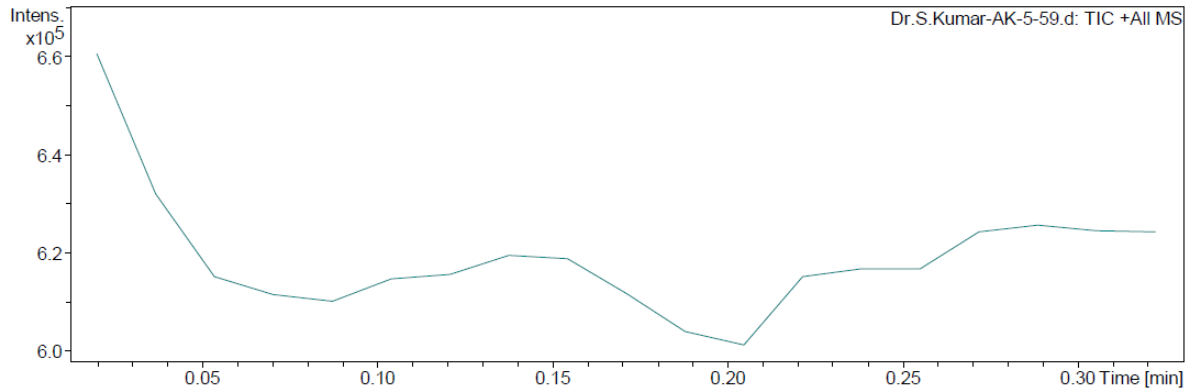
Analysis Info

Analysis Name D:\Data\user data\2014\JAN\09 jan\Dr.S.Kumar-AK-5-59.d
Method tune_low.m
Sample Name AK-5-59
Comment

Acquisition Date 1/9/2014 2:51:59 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

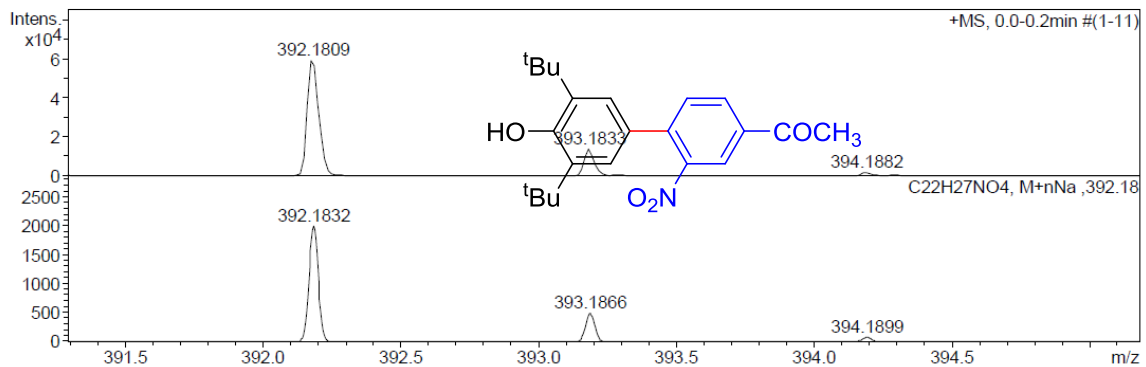
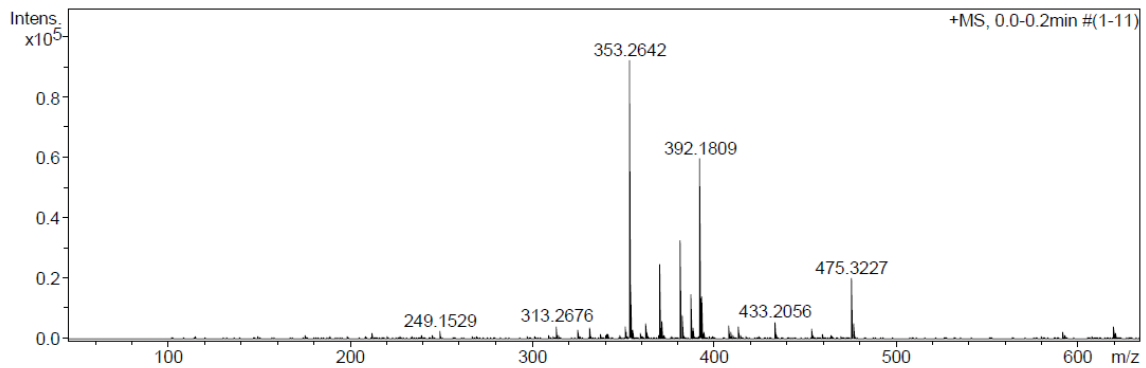
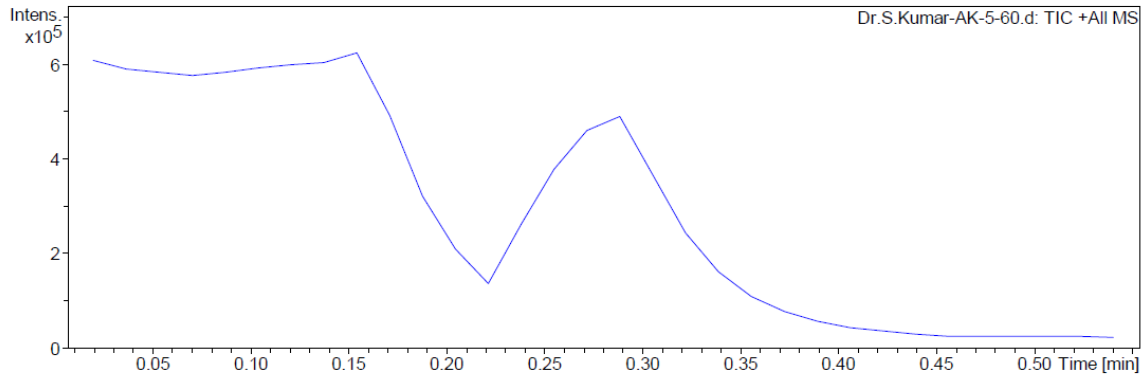
Analysis Name D:\Data\user data\2014\JAN\09 jan\Dr.S.Kumar-AK-5-60.d
Method tune_low.m
Sample Name AK-5-60
Comment

Acquisition Date 1/9/2014 2:55:59 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	0.4 Bar
Focus	Not active	Set Capillary	4600 V	Set Dry Heater	180 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

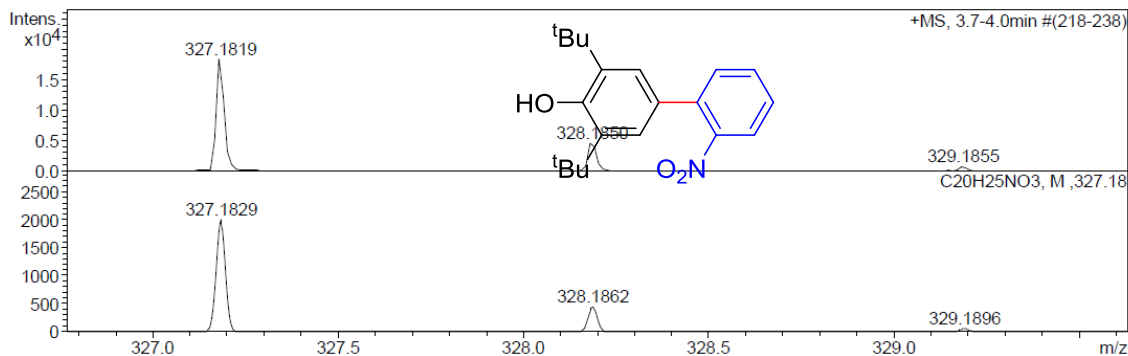
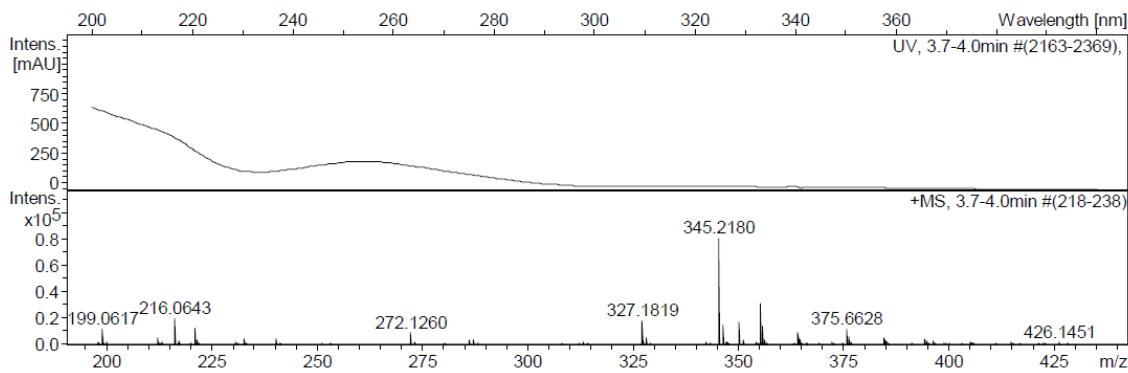
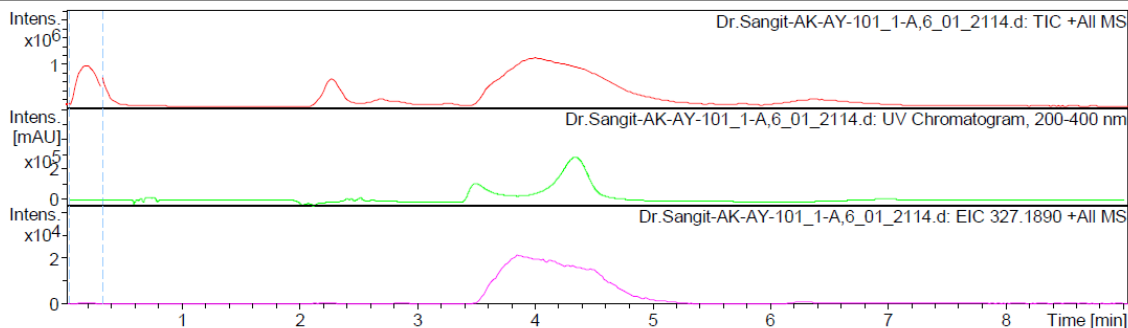
Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-AY-101_1-A,6_01_2114.d
Method HRLCMS-20 Sept.m
Sample Name Dr.Sangit-AK-AY-101
Comment

Acquisition Date 3/18/2014 12:55:27 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

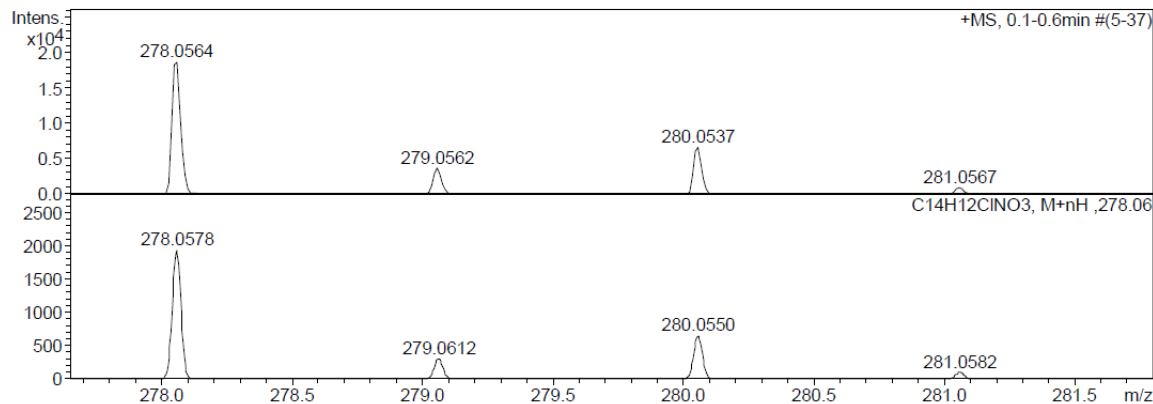
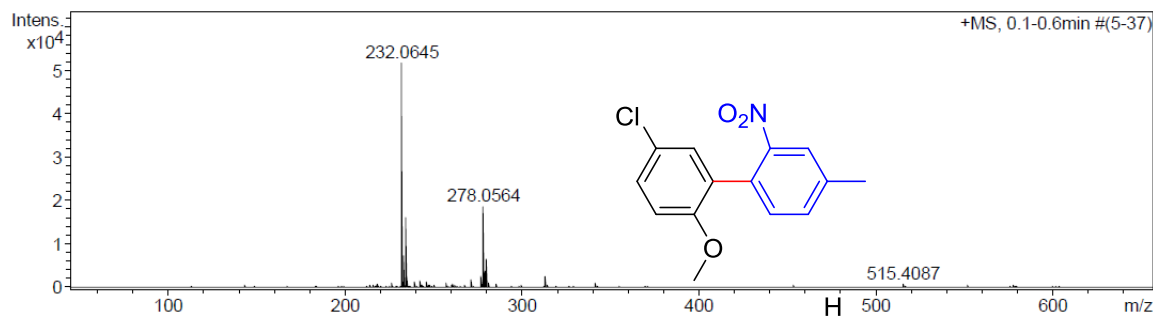
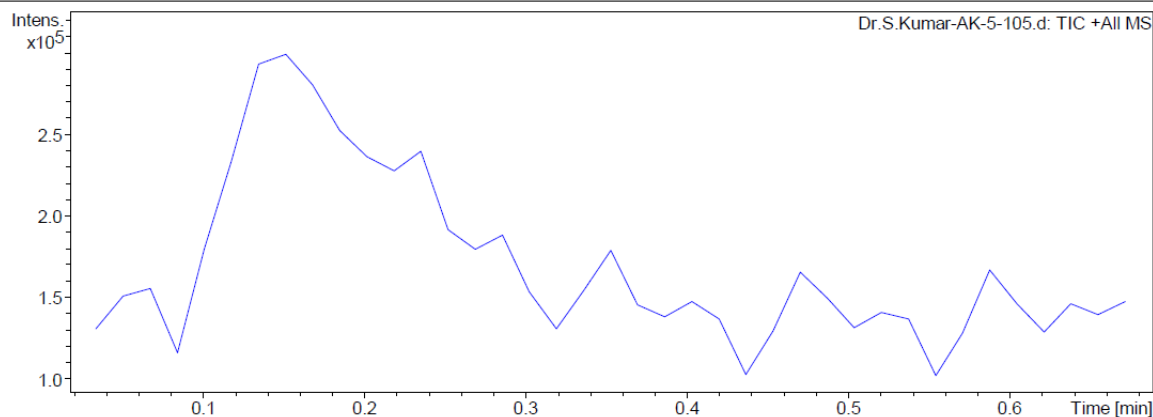
Analysis Info

Analysis Name D:\Data\user data\2014\APRIL\03 Apr\Dr.S.Kumar-AK-5-105.d
Method tune_low_APCI.m
Sample Name AK-5-105
Comment

Acquisition Date 4/4/2014 2:40:48 AM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	APCI	Ion Polarity	Positive	Set Nebulizer	2.5 Bar
Focus	Not active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	4.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

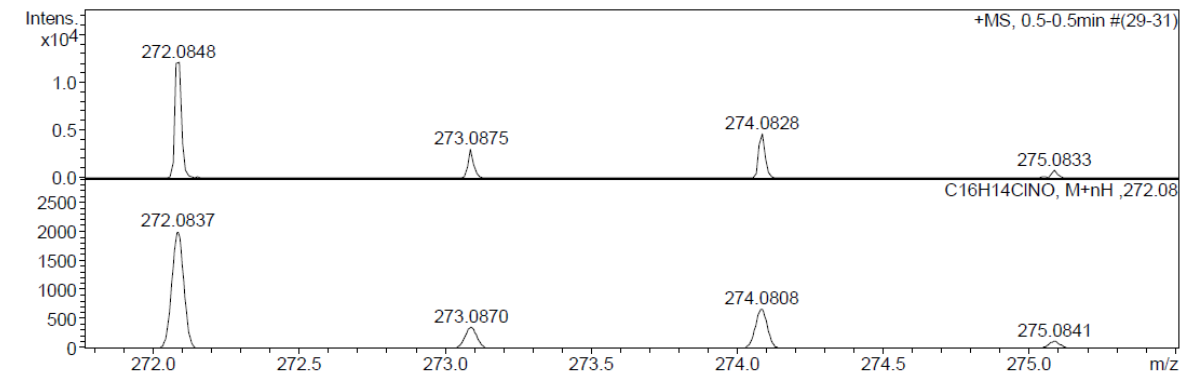
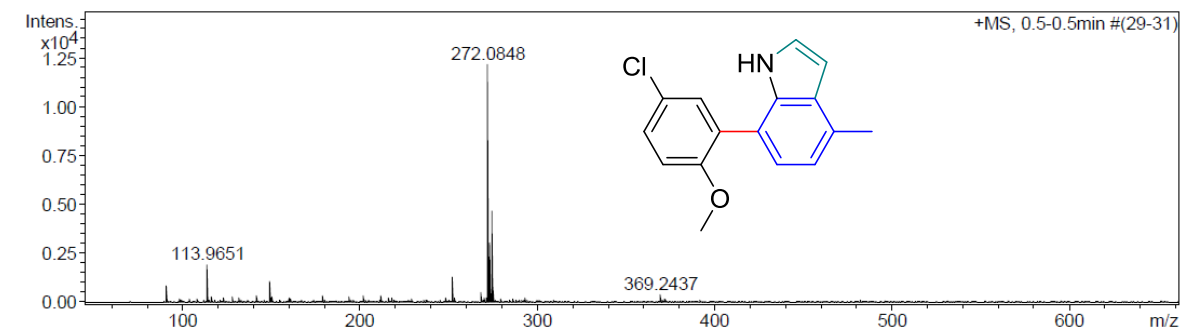
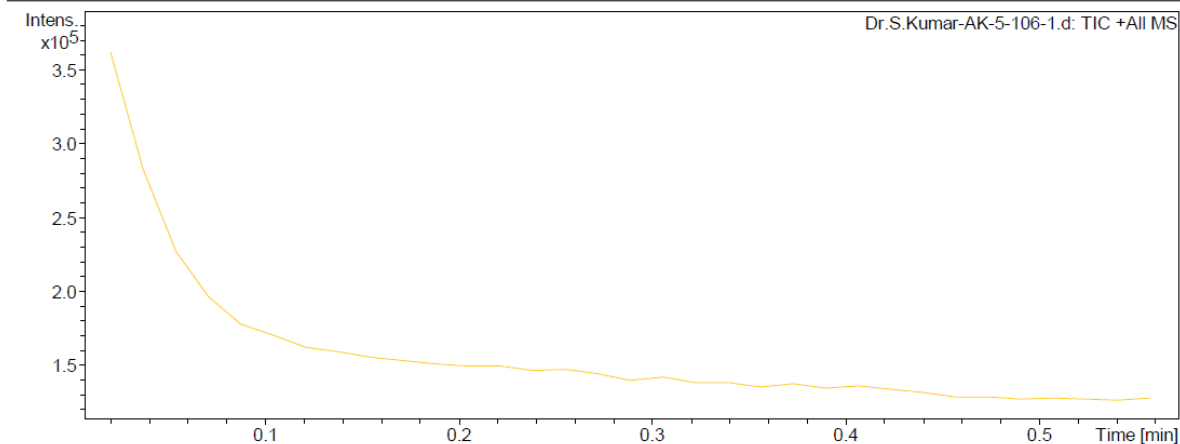
Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\27 mar\Dr.S.Kumar-AK-5-106-1.d
Method tune_low_HPLC.m
Sample Name AK-5-106
Comment

Acquisition Date 3/27/2014 12:59:18 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4600 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

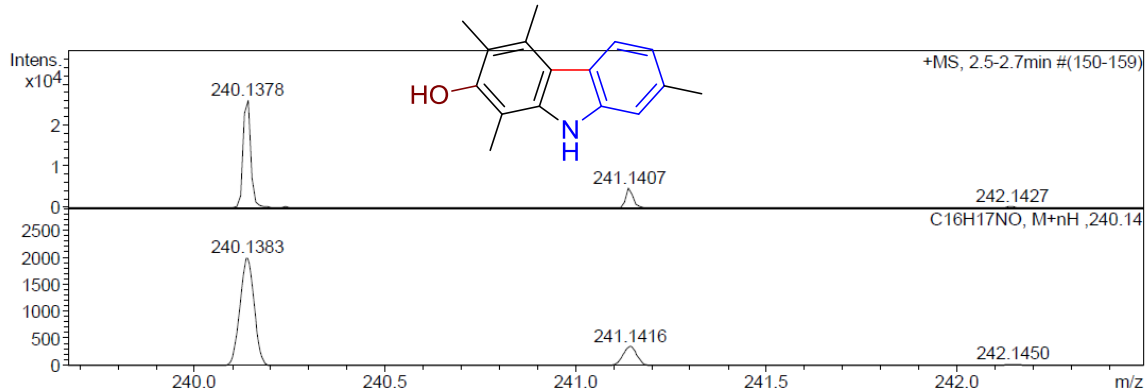
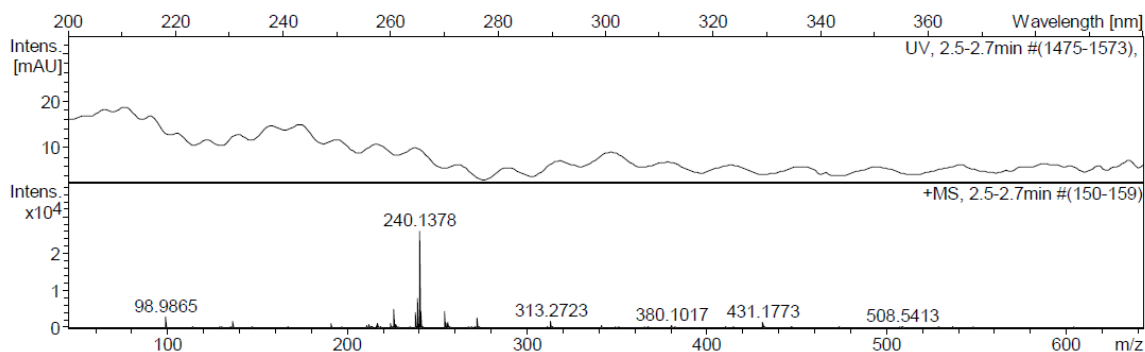
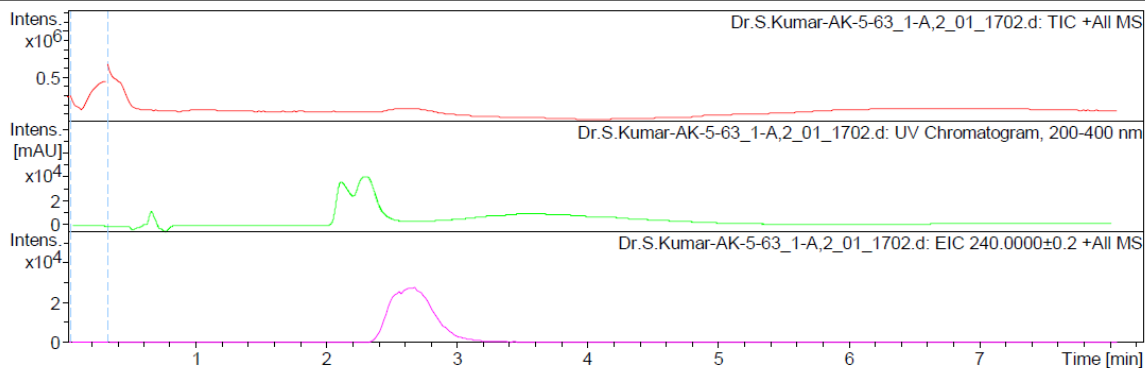
Analysis Name D:\Data\user data\2014\JAN\21 JAN\Dr.S.Kumar-AK-5-63_1-A,2_01_1702.d
Method HRLCMS-20 Sept.m
Sample Name Dr.S.Kumar-AK-5-63
Comment

Acquisition Date 1/21/2014 3:58:32 PM

Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste



Display Report

Analysis Info

Analysis Name D:\Data\user data\2014\MARCH\18 MAR\Dr.Sangit-AK-5-115_1-B,1_01_2117.d
Method HRLCMS-20 Sept.m
Sample Name Dr.Sangit-AK-5-115
Comment

Acquisition Date 3/18/2014 1:25:56 PM
Operator Amit
Instrument micrOTOF-Q II 10330

Acquisition Parameter

Source Type	ESI	Ion Polarity	Positive	Set Nebulizer	1.2 Bar
Focus	Active	Set Capillary	4500 V	Set Dry Heater	200 °C
Scan Begin	50 m/z	Set End Plate Offset	-500 V	Set Dry Gas	7.0 l/min
Scan End	3000 m/z	Set Collision Cell RF	130.0 Vpp	Set Divert Valve	Waste

