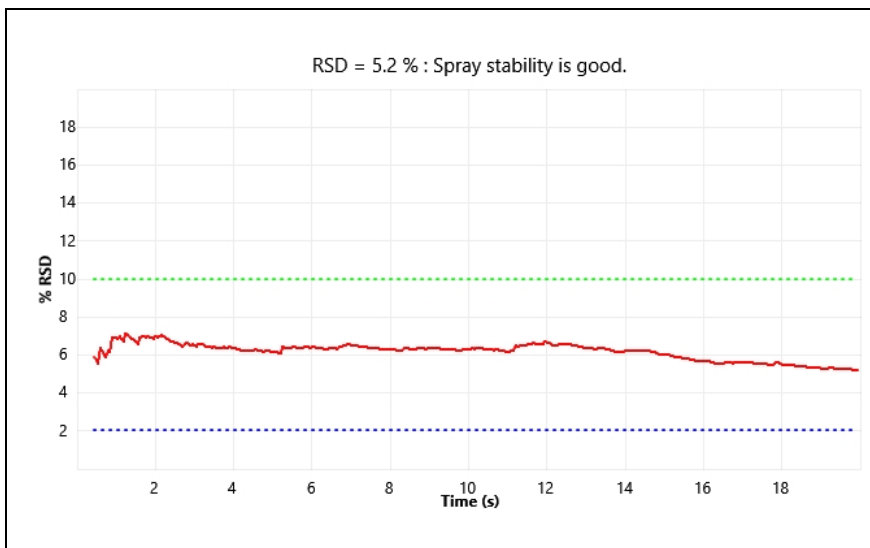


System Calibration Report

Date & Time Friday, June 27, 2025 11:08:25 AM
 Instrument Model TSQ Altis
 Instrument Serial EXRTSQ-A-10602
 Software Version 3.4.3292

Name	Polarity	Result	Comment
System Calibration	Negative	Successful	

Source Parameters	
Source Type	H-ESI
Spray Voltage (V)	3300
Sheath Gas (Arb)	4
Aux Gas (Arb)	0
Sweep Gas (Arb)	0
Ion Transfer Tube Temp (°C)	325
Vaporizer Temp (°C)	0



Q1 calibration result					
Scan Rate	FWHM 0.2	FWHM 0.4	FWHM 0.7	FWHM 1.2	FWHM 2.0
0	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
250	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
500	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
1000	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated

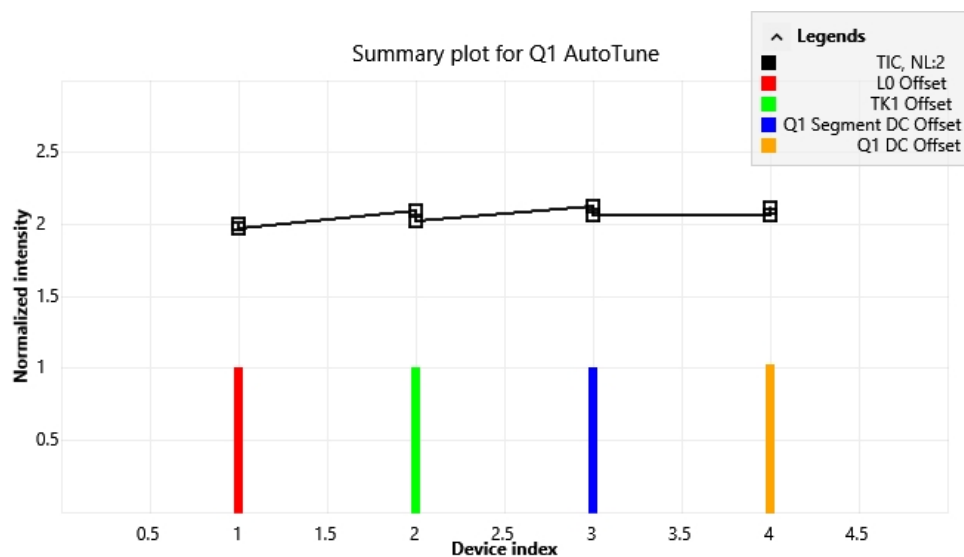
Q3 calibration result					
Scan Rate	FWHM 0.2	FWHM 0.4	FWHM 0.7	FWHM 1.2	FWHM 2.0
0	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
250	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
500	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated
1000	Calibrated	Calibrated	Calibrated	Calibrated	Calibrated

Q3 high scan rate calibration result	
Scan Rate	FWHM 2.0
5000	Calibrated
15000	Calibrated

* Scan rate 0 is used for SRM scan and SIM scan with dwell time option

Electron multiplier gain calibration passed
 Q1/Q3 AutoTune completed

Q1 Tune



-Q1MS - Mass 69		
Device	Initial Setting	Final Setting
SRIG_RF	47.6	50
Q0_AMP	317.3	317.3
Q2_AMP	160.9	160.9
L0	0.2	0.2
TK1	3.6	3.6
Q1_SDC	4.8	4.8
Q1_DC	2.6	2.7
-Q1MS - Mass 112.99		
Device	Initial Setting	Final Setting
SRIG_RF	51.9	53.7
Q0_AMP	413.3	413.3
Q2_AMP	205.1	205.1
L0	0.2	0.2
TK1	3.6	3.6
Q1_SDC	4.8	4.8
Q1_DC	2.6	2.7
-Q1MS - Mass 302		
Device	Initial Setting	Final Setting
SRIG_RF	76.3	75.4
Q0_AMP	577.9	577.9
Q2_AMP	332.9	332.9
L0	0.2	0.2
TK1	3.3	3.3
Q1_SDC	5	5
Q1_DC	2.6	2.6
-Q1MS - Mass 601.98		
Device	Initial Setting	Final Setting
SRIG_RF	100.1	95.6
Q0_AMP	677.2	677.2
Q2_AMP	467.5	467.5
L0	0.2	0.2
TK1	3	3
Q1_SDC	5.4	5.4
Q1_DC	2.6	2.6

System Calibration Report

thermo scientific

-Q1MS - Mass 1033.99		
Device	Initial Setting	Final Setting
SRIG_RF	123.8	115.2
Q0_AMP	747.9	747.9
Q2_AMP	610.2	610.2
L0	0.2	0.2
TK1	2.5	2.5
Q1_SDC	5.9	5.9
Q1_DC	2.6	2.5
-Q1MS - Mass 1633.95		
Device	Initial Setting	Final Setting
SRIG_RF	148.1	134.9
Q0_AMP	803.5	803.5
Q2_AMP	764.5	764.5
L0	0.2	0.2
TK1	1.7	1.7
Q1_SDC	6.6	6.6
Q1_DC	2.5	2.4

System Calibration Report

Q1 Mass Calibration Check Results

RESULT PW 0.2 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.20	68.99	Pass	
112.99	0.20	112.98	Pass	
302.00	0.19	301.99	Pass	
601.98	0.21	601.97	Pass	
1033.99	0.21	1033.96	Pass	
1633.95	0.20	1633.93	Pass	
RESULT PW 0.4 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.41	68.99	Pass	
112.99	0.40	112.99	Pass	
302.00	0.39	301.98	Pass	
601.98	0.42	601.95	Pass	
1033.99	0.41	1033.95	Pass	
1633.95	0.42	1633.92	Pass	
RESULT PW 0.7 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.68	68.98	Pass	
112.99	0.70	112.97	Pass	
302.00	0.73	301.97	Pass	
601.98	0.75	601.92	Pass	
1033.99	0.69	1033.94	Pass	
1633.95	0.71	1633.89	Pass	
RESULT PW 0.2 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.21	69.00	Pass	
112.99	0.20	112.99	Pass	
302.00	0.20	301.99	Pass	
601.98	0.21	601.97	Pass	
1033.99	0.20	1033.98	Pass	
1633.95	0.24	1633.94	Pass	
RESULT PW 0.4 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.40	68.99	Pass	
112.99	0.39	112.98	Pass	
302.00	0.40	302.00	Pass	
601.98	0.39	601.98	Pass	
1033.99	0.40	1033.98	Pass	
1633.95	0.40	1633.94	Pass	
RESULT PW 0.7 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.70	68.99	Pass	
112.99	0.68	112.98	Pass	
302.00	0.69	302.00	Pass	
601.98	0.67	601.98	Pass	
1033.99	0.68	1033.98	Pass	
1633.95	0.70	1633.94	Pass	
RESULT PW 1.2 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.18	68.98	Pass	
112.99	1.20	112.98	Pass	
302.00	1.20	302.00	Pass	
601.98	1.21	601.98	Pass	
1033.99	1.19	1033.99	Pass	
1633.95	1.19	1633.94	Pass	
RESULT PW 0.2 SR 500				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.21	69.00	Pass	
112.99	0.21	112.99	Pass	
302.00	0.21	302.00	Pass	

Serial Number: EXRTSQ-A-10602

Friday, June 27, 2025 11:23:21 AM

System Calibration Report

601.98	0.21	601.97	Pass	
1033.99	0.20	1033.98	Pass	
1633.95	0.24	1633.94	Pass	

RESULT PW 0.4 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.40	68.99	Pass	
112.99	0.41	112.99	Pass	
302.00	0.40	301.99	Pass	
601.98	0.40	601.98	Pass	
1033.99	0.40	1033.99	Pass	
1633.95	0.41	1633.94	Pass	

RESULT PW 0.7 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.71	69.00	Pass	
112.99	0.70	112.98	Pass	
302.00	0.71	302.00	Pass	
601.98	0.69	601.98	Pass	
1033.99	0.70	1033.98	Pass	
1633.95	0.69	1633.93	Pass	

RESULT PW 1.2 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.20	69.00	Pass	
112.99	1.20	112.99	Pass	
302.00	1.20	302.01	Pass	
601.98	1.19	601.97	Pass	
1033.99	1.17	1033.99	Pass	
1633.95	1.19	1633.95	Pass	

RESULT PW 0.2 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.22	68.99	Pass	
112.99	0.21	112.99	Pass	
302.00	0.21	302.00	Pass	
601.98	0.22	601.97	Pass	
1033.99	0.28	1033.98	Pass	
1633.95	0.38	1633.94	Pass	

RESULT PW 0.4 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.39	68.99	Pass	
112.99	0.39	112.98	Pass	
302.00	0.41	302.00	Pass	
601.98	0.40	601.97	Pass	
1033.99	0.42	1033.98	Pass	
1633.95	0.41	1633.93	Pass	

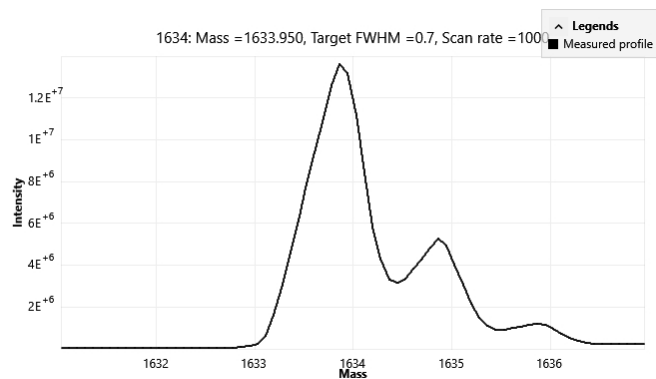
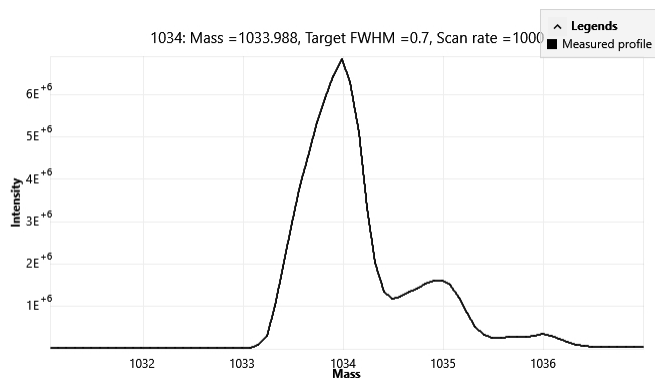
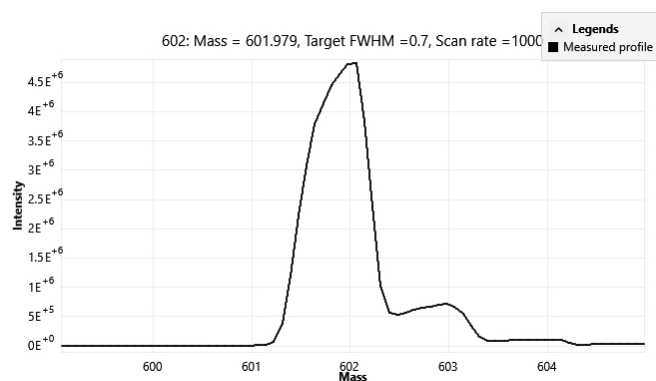
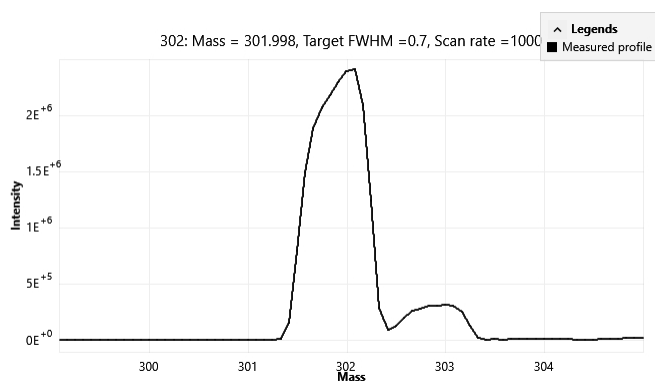
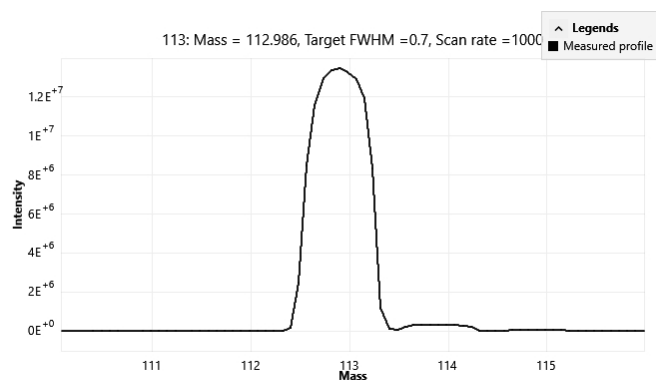
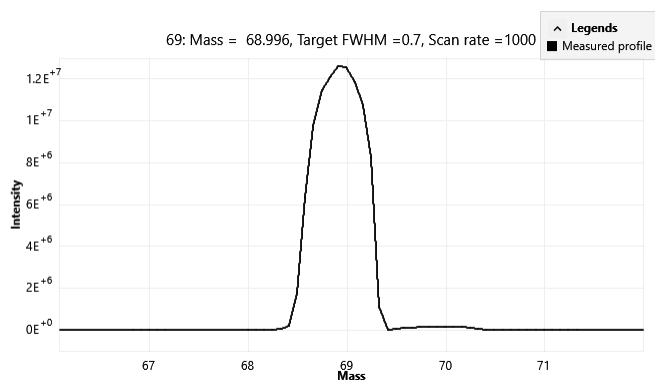
RESULT PW 0.7 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.71	68.99	Pass	
112.99	0.70	112.99	Pass	
302.00	0.70	302.00	Pass	
601.98	0.73	601.97	Pass	
1033.99	0.71	1034.00	Pass	
1633.95	0.71	1633.94	Pass	

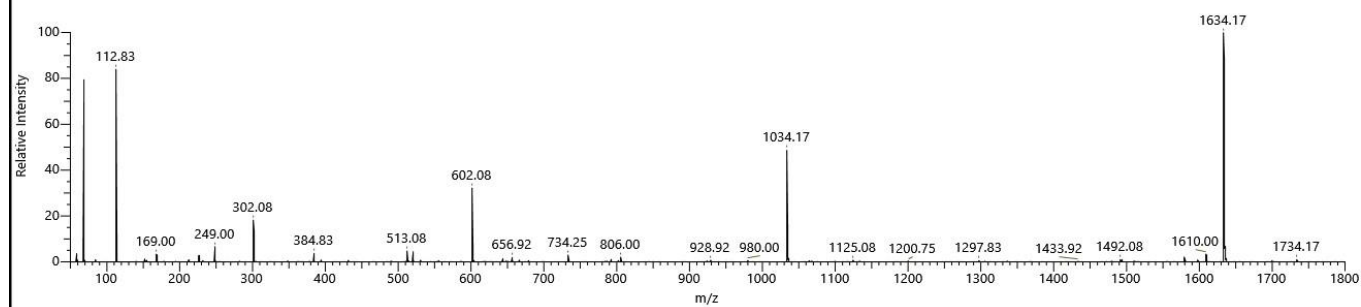
RESULT PW 1.2 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.19	68.98	Pass	
112.99	1.21	112.99	Pass	
302.00	1.22	302.00	Pass	
601.98	1.21	601.98	Pass	
1033.99	1.19	1033.99	Pass	
1633.95	1.20	1633.95	Pass	

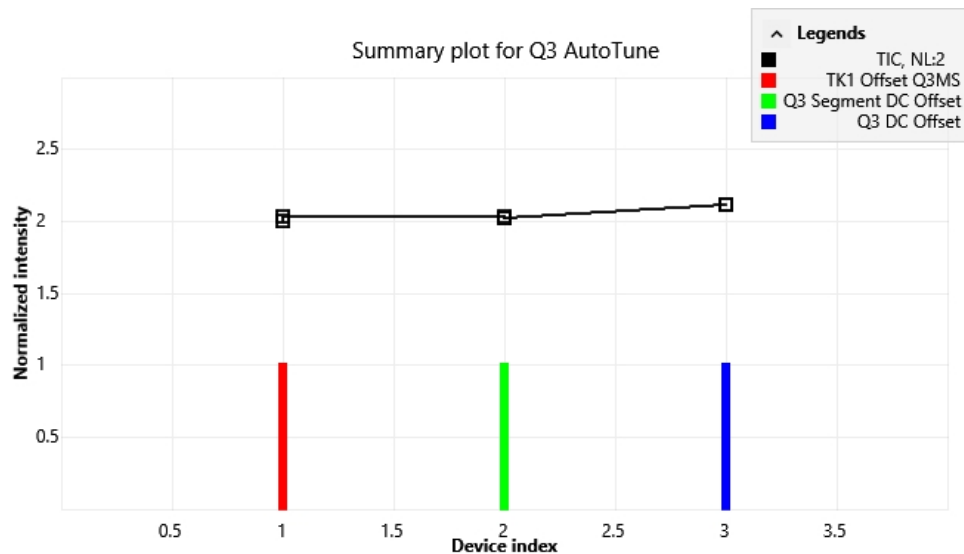
Q1 Mass Calibration Check Spectra



#128673 RT:155167:18 NL:1.52E+007 - p H-ESI FULL: Q1MS



Q3 Tune



-Q3MS - Mass 69		
Device	Initial Setting	Final Setting
TK1	3.7	3.7
Q3_SDC	5.8	5.8
Q3_DC	3.2	3.1

-Q3MS - Mass 112.99		
Device	Initial Setting	Final Setting
TK1	3.7	3.7
Q3_SDC	5.8	5.8
Q3_DC	3.3	3.2

-Q3MS - Mass 302		
Device	Initial Setting	Final Setting
TK1	3.6	3.6
Q3_SDC	6.1	6.1
Q3_DC	3.5	3.4

-Q3MS - Mass 601.98		
Device	Initial Setting	Final Setting
TK1	3.3	3.3
Q3_SDC	6.6	6.6
Q3_DC	3.9	3.8

-Q3MS - Mass 1033.99		
Device	Initial Setting	Final Setting
TK1	3	3
Q3_SDC	7.2	7.2
Q3_DC	4.4	4.3

-Q3MS - Mass 1633.95		
Device	Initial Setting	Final Setting
TK1	2.5	2.5
Q3_SDC	8.1	8.1
Q3_DC	5.2	5

System Calibration Report

Q3 Mass Calibration Check Results

RESULT PW 0.2 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.20	69.00	Pass	
112.99	0.20	112.99	Pass	
302.00	0.18	302.01	Pass	
601.98	0.20	601.99	Pass	
1033.99	0.19	1033.99	Pass	
1633.95	0.23	1633.95	Pass	
RESULT PW 0.4 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.40	68.99	Pass	
112.99	0.40	112.99	Pass	
302.00	0.41	302.00	Pass	
601.98	0.39	601.97	Pass	
1033.99	0.42	1033.98	Pass	
1633.95	0.42	1633.94	Pass	
RESULT PW 0.7 SR 0				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.69	68.99	Pass	
112.99	0.69	112.98	Pass	
302.00	0.71	302.01	Pass	
601.98	0.67	601.97	Pass	
1033.99	0.68	1033.99	Pass	
1633.95	0.74	1633.94	Pass	
RESULT PW 0.2 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.20	68.99	Pass	
112.99	0.21	112.98	Pass	
302.00	0.22	302.00	Pass	
601.98	0.22	601.98	Pass	
1033.99	0.20	1033.98	Pass	
1633.95	0.24	1633.94	Pass	
RESULT PW 0.4 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.41	68.99	Pass	
112.99	0.41	112.98	Pass	
302.00	0.41	302.00	Pass	
601.98	0.41	601.98	Pass	
1033.99	0.42	1033.98	Pass	
1633.95	0.40	1633.94	Pass	
RESULT PW 0.7 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.71	68.99	Pass	
112.99	0.69	112.98	Pass	
302.00	0.71	302.00	Pass	
601.98	0.71	601.97	Pass	
1033.99	0.67	1033.98	Pass	
1633.95	0.70	1633.94	Pass	
RESULT PW 1.2 SR 250				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.20	69.00	Pass	
112.99	1.21	112.99	Pass	
302.00	1.19	301.99	Pass	
601.98	1.21	601.98	Pass	
1033.99	1.18	1033.98	Pass	
1633.95	1.18	1633.94	Pass	
RESULT PW 0.2 SR 500				
Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.22	68.99	Pass	
112.99	0.22	112.98	Pass	
302.00	0.20	301.99	Pass	

Serial Number: EXRTSQ-A-10602

Friday, June 27, 2025 11:23:22 AM

System Calibration Report

601.98	0.22	601.97	Pass	
1033.99	0.20	1033.99	Pass	
1633.95	0.24	1633.94	Pass	

RESULT PW 0.4 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.39	68.99	Pass	
112.99	0.42	112.98	Pass	
302.00	0.41	302.00	Pass	
601.98	0.40	601.98	Pass	
1033.99	0.39	1033.99	Pass	
1633.95	0.41	1633.94	Pass	

RESULT PW 0.7 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.70	68.99	Pass	
112.99	0.72	112.98	Pass	
302.00	0.70	301.99	Pass	
601.98	0.71	601.97	Pass	
1033.99	0.74	1033.98	Pass	
1633.95	0.72	1633.93	Pass	

RESULT PW 1.2 SR 500

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.19	69.00	Pass	
112.99	1.19	112.98	Pass	
302.00	1.20	302.01	Pass	
601.98	1.20	601.97	Pass	
1033.99	1.22	1033.98	Pass	
1633.95	1.17	1633.94	Pass	

RESULT PW 0.2 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.20	69.00	Pass	
112.99	0.20	112.99	Pass	
302.00	0.22	302.00	Pass	
601.98	0.20	601.98	Pass	
1033.99	0.21	1033.99	Pass	
1633.95	0.24	1633.93	Pass	

RESULT PW 0.4 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.39	69.00	Pass	
112.99	0.40	112.98	Pass	
302.00	0.40	302.00	Pass	
601.98	0.39	601.97	Pass	
1033.99	0.41	1033.98	Pass	
1633.95	0.42	1633.94	Pass	

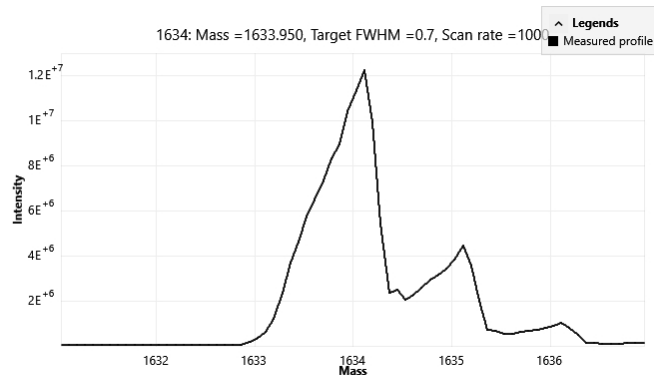
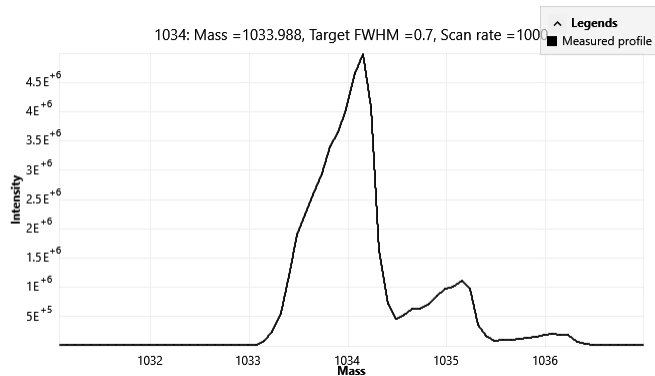
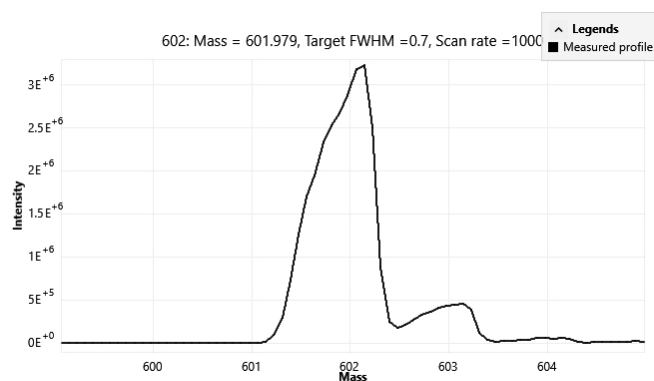
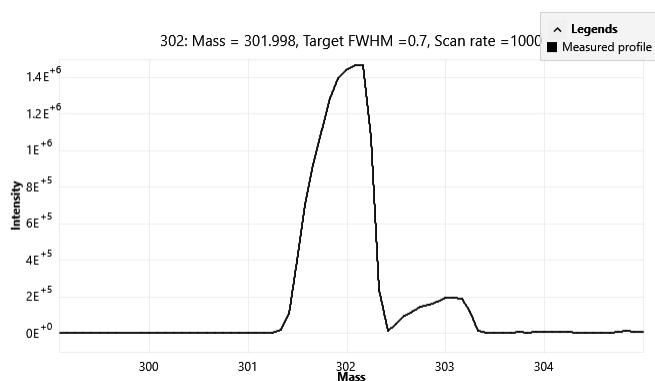
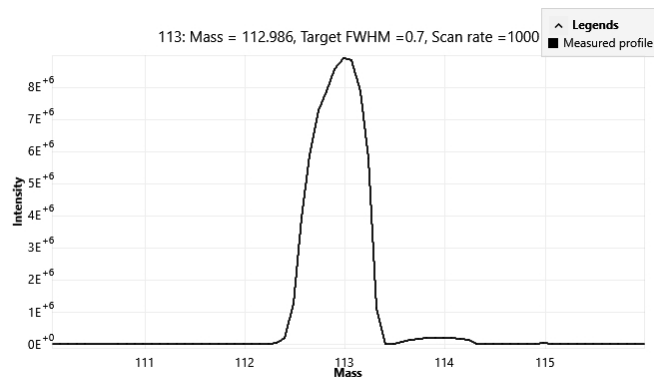
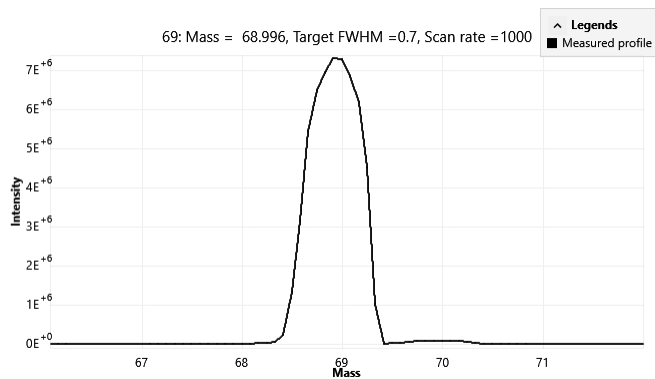
RESULT PW 0.7 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	0.70	68.99	Pass	
112.99	0.69	112.98	Pass	
302.00	0.70	302.00	Pass	
601.98	0.73	601.97	Pass	
1033.99	0.72	1033.99	Pass	
1633.95	0.71	1633.94	Pass	

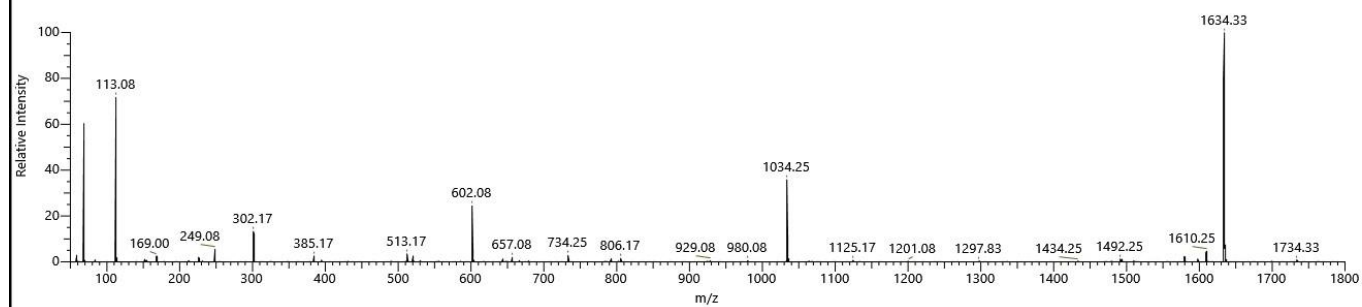
RESULT PW 1.2 SR 1000

Calibrant	Peak Width (Da.)	Mass Position (Da.)	Result	Comments
69.00	1.18	68.99	Pass	
112.99	1.18	112.98	Pass	
302.00	1.20	302.01	Pass	
601.98	1.21	601.98	Pass	
1033.99	1.22	1033.99	Pass	
1633.95	1.25	1633.95	Pass	

Q3 Mass Calibration Check Spectra



#129187 RT:155168.21 NL:1.19E+007 - p H-ESI FULL: Q3MS



Electron Multiplier Calibration	
Coarse Calibration	-1960.011
Previous A	7.720
Previous B	-274.492
Previous EM Full Scan	-1665.091
Previous EM SRM	-1922.399
New A	7.486
New B	-262.919
New EM Full Scan	-1659.642
New EM SRM	-1918.806

