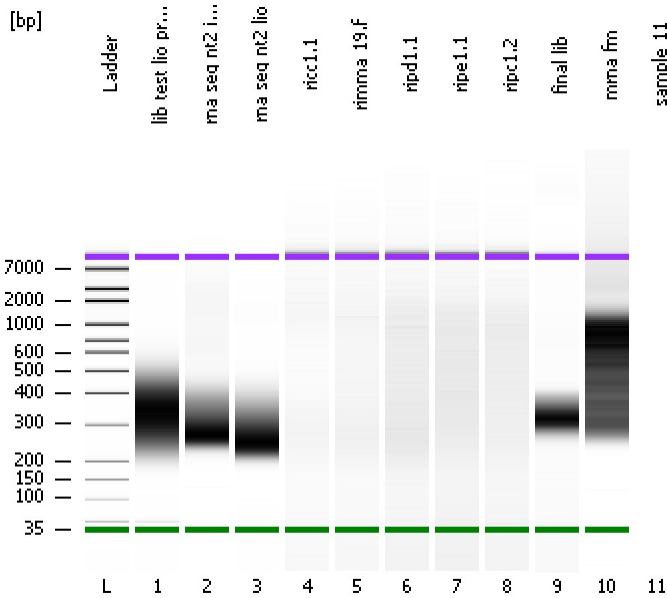


Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Electrophoresis File Run Summary



Instrument Information:

Instrument Name: DE13701086 Firmware: C.01.069
Serial#: DE13701086 Type: G2938B

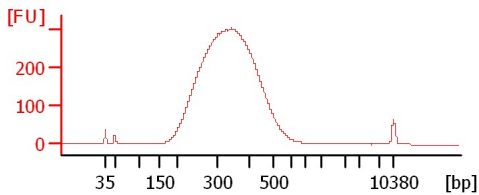
Assay Information:

Assay Origin Path: C:\Program Files\Agilent\2100 bioanalyzer\2100 expert\assays\dsDNA\High Sensitivity DNA.xsy
Assay Class: High Sensitivity DNA Assay
Version: 1.03
Assay Comments: Copyright © 2003-2010 Agilent Technologies

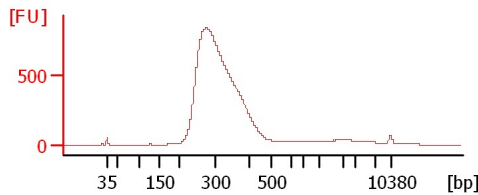
Chip Information:

Chip Lot #:
Reagent Kit Lot #:
Chip Comments:

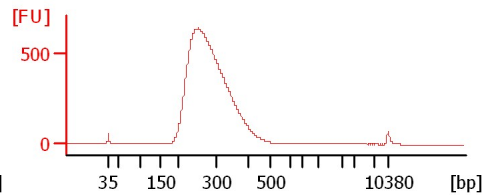
lib test lio primer drip h2b



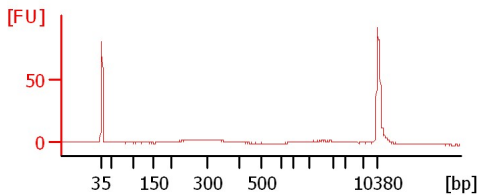
rna seq nt2 illum



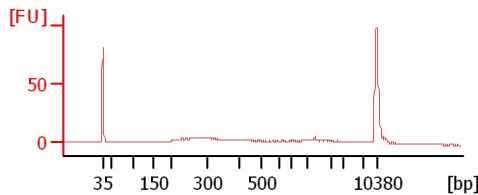
rna seq nt2 lio



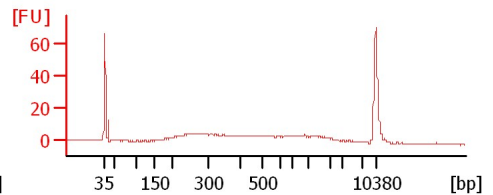
ricc1.1



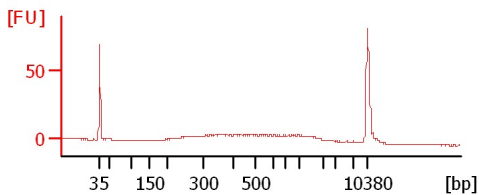
rimma 19.f



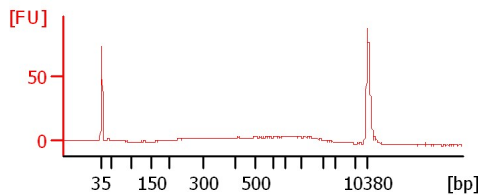
ripd1.1



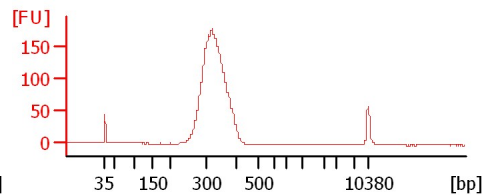
ripe1.1



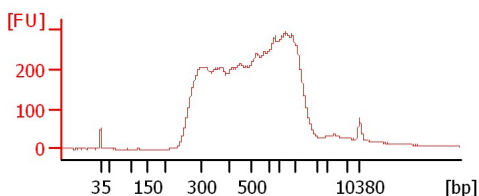
ripc1.2



final lib



mrna fm



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
lib test lio primer drip h2b		<input type="checkbox"/>	✓			
rna seq nt2 illum		<input type="checkbox"/>	✓			
rna seq nt2 lio		<input type="checkbox"/>	✓			
ricc1.1		<input type="checkbox"/>	✓			
rimma 19.f		<input type="checkbox"/>	✓			
ripd1.1		<input type="checkbox"/>	✓			
ripe1.1		<input type="checkbox"/>	✓			
rpc1.2		<input type="checkbox"/>	✓			
final lib		<input type="checkbox"/>	✓			
mrna fm		<input type="checkbox"/>	✓			
sample 11		<input type="checkbox"/>	✓			
Ladder		<input type="checkbox"/>	✓			

Chip Lot #

Reagent Kit Lot #

Chip Comments :

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Electrophoresis Assay Details

General Analysis Settings

Number of Available Sample and Ladder Wells (Max.) : 12
Minimum Visible Range [s] : 32
Maximum Visible Range [s] : 138
Start Analysis Time Range [s] : 33
End Analysis Time Range [s] : 137.5
Ladder Concentration [pg/μl] : 1950
Uses Standard Area for Ladder Fragments
Lower Marker Concentration [pg/μl] : 125
Upper Marker Concentration [pg/μl] : 75
Used Upper Marker for Quantitation
Standard Curve Fit is Point to Point
Show Data Aligned to Lower and Upper Marker

Integrator Settings

Integration Start Time [s] : 33.05
Integration End Time [s] : 137
Slope Threshold : 0.8
Height Threshold [FU] : 5
Area Threshold : 0.1
Width Threshold [s] : 0.6
Baseline Plateau [s] : 0.5

Filter Settings

Filter Width [s] : 0.5
Polynomial Order : 4

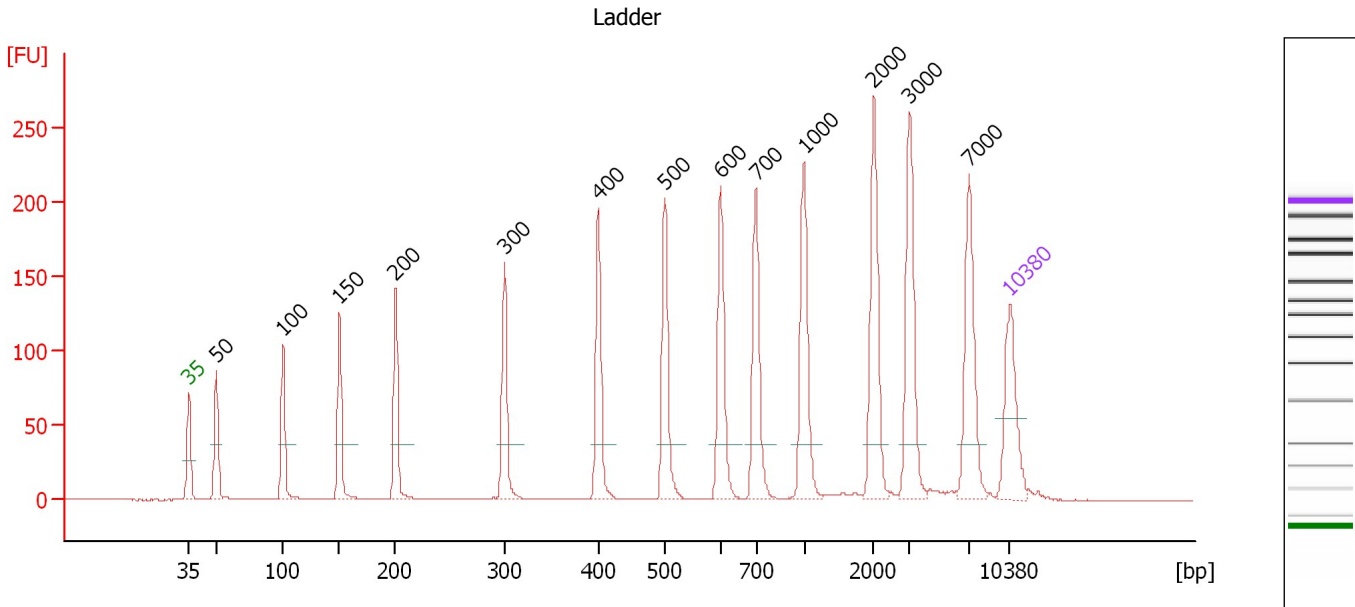
Ladder

Ladder Peak	Size	Area
1	35	160
2	50	210
3	100	208
4	150	221
5	200	242
6	300	270
7	400	305
8	500	306
9	600	336
10	700	321
11	1000	366
12	2000	413
13	3000	411
14	7000	400
15	10380	214

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.1

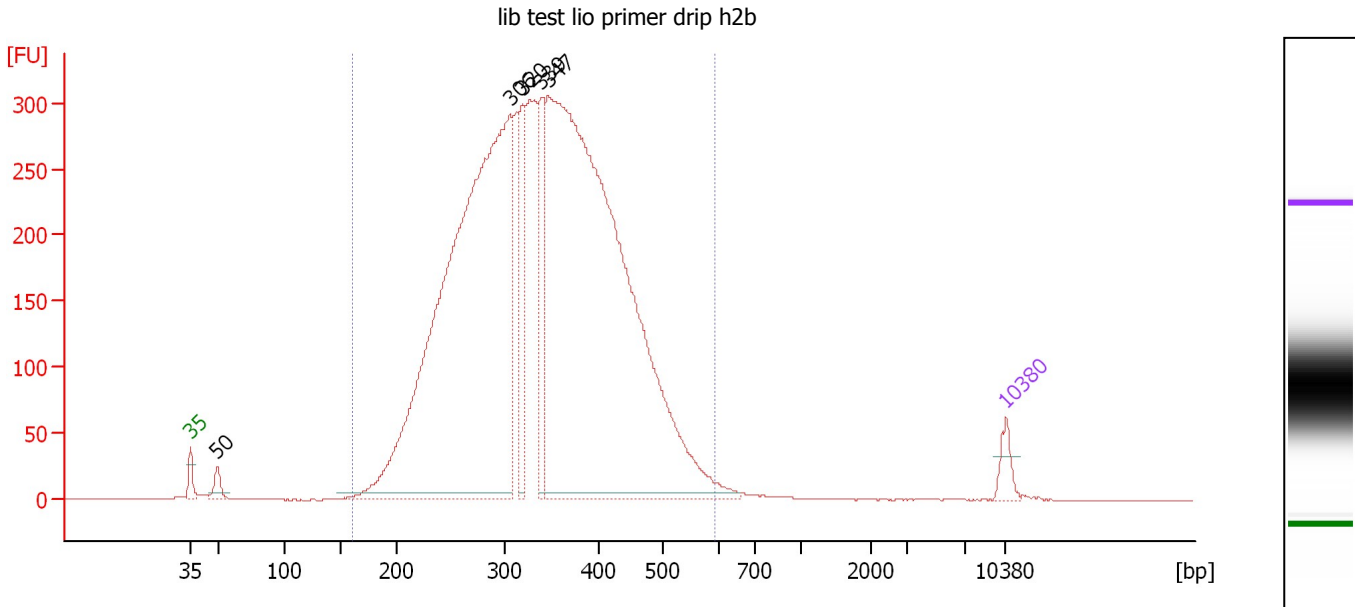
Peak table for Ladder

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	50	150.00	4,545.5	Ladder Peak
3	100	150.00	2,272.7	Ladder Peak
4	150	150.00	1,515.2	Ladder Peak
5	200	150.00	1,136.4	Ladder Peak
6	300	150.00	757.6	Ladder Peak
7	400	150.00	568.2	Ladder Peak
8	500	150.00	454.5	Ladder Peak
9	600	150.00	378.8	Ladder Peak
10	700	150.00	324.7	Ladder Peak
11	1,000	150.00	227.3	Ladder Peak
12	2,000	150.00	113.6	Ladder Peak
13	3,000	150.00	75.8	Ladder Peak
14	7,000	150.00	32.5	Ladder Peak
15	10,380	75.00	10.9	Upper Marker

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 1 : lib test lio primer drip h2b

Number of peaks found: 5 Corr. Area 1: 7,305.1
 Noise: 0.2

Peak table for sample 1 : lib test lio primer drip h2b

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	50	95.36	2,917.2	
3	306	5,737.42	28,421.9	
4	320	521.90	2,474.3	
5	339	547.06	2,444.7	
6	347	6,561.22	28,644.1	
7	10,380	75.00	10.9	Upper Marker

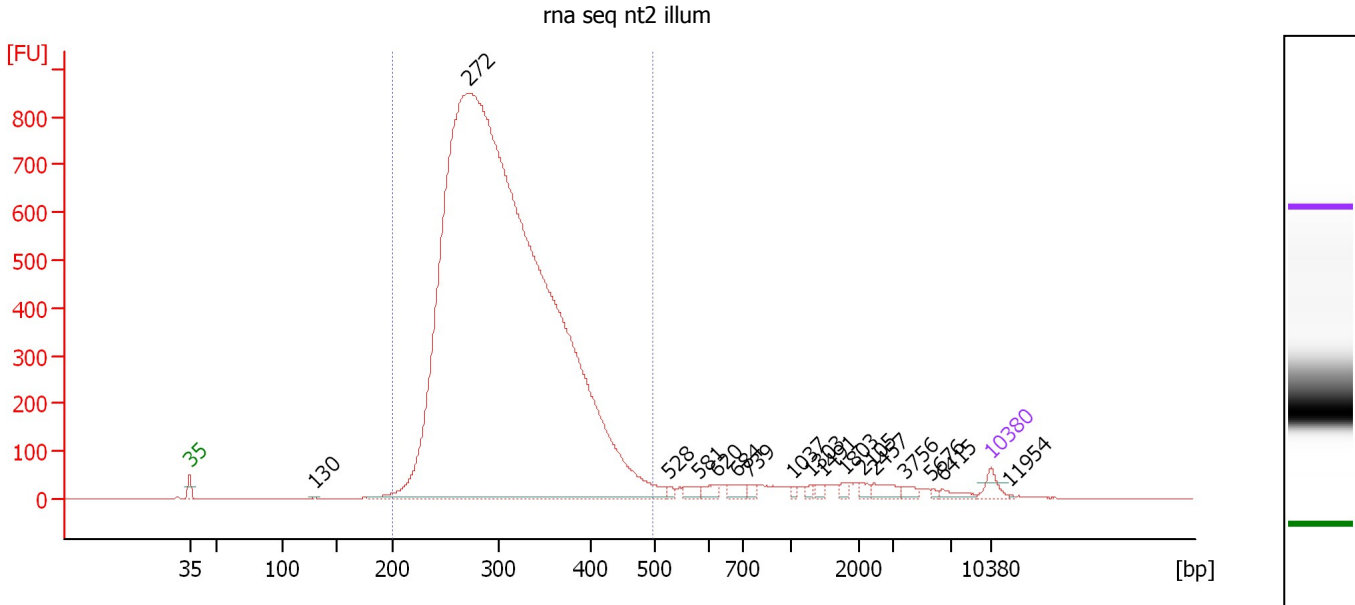
Region table for sample 1 : lib test lio primer drip h2b

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
161	593	342	70,104.7	14,704.63	7,305.1	99	22.7	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 2 : rna seq nt2 illum

Number of peaks found: 17 Corr. Area 1: 12,984.0
 Noise: 0.2

Peak table for sample 2 : rna seq nt2 illum

Peak	Size [bp]	Conc. [pg/µl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	130	9.76	114.1	
3	272	23,775.41	132,373.4	
4	528	26.59	76.3	
5	581	62.85	163.8	
6	620	66.45	162.3	
7	684	79.59	176.3	
8	739	37.28	76.4	
9	1,037	21.30	31.1	
10	1,303	23.94	27.8	
11	1,491	35.96	36.5	
12	1,803	29.01	24.4	
13	2,105	36.18	26.0	
14	2,457	83.78	51.7	
15	3,756	37.92	15.3	
16	5,676	13.89	3.7	
17	6,415	48.02	11.3	
18	10,380	75.00	10.9	Upper Marker
19	11,954	0.00	0.0	

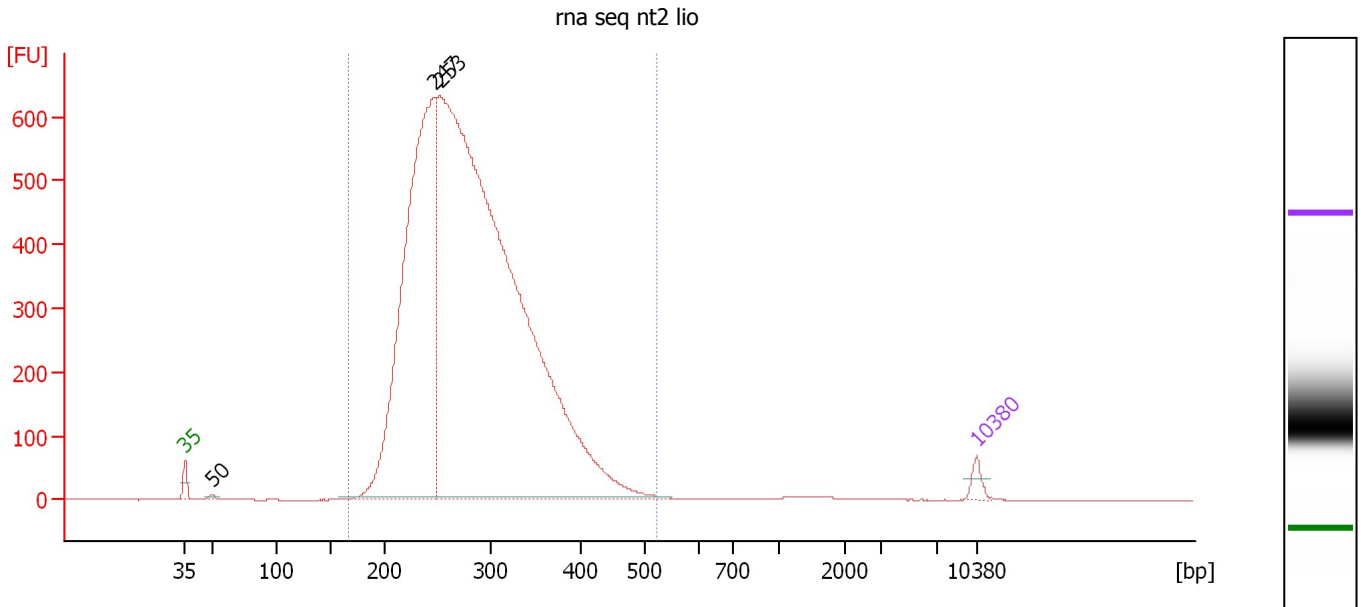
Region table for sample 2 : rna seq nt2 illum

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/µl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	497	310	110,894.7	21,868.41	12,984.0	94	17.2	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 3 : rna seq nt2 lio

Number of peaks found: 3 Corr. Area 1: 10,652.4
 Noise: 0.1

Peak table for sample 3 : rna seq nt2 lio

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	50	25.81	782.7	
3	247	6,820.83	41,759.3	
4	253	16,018.17	96,103.9	
5	10,380	75.00	10.9	Upper Marker

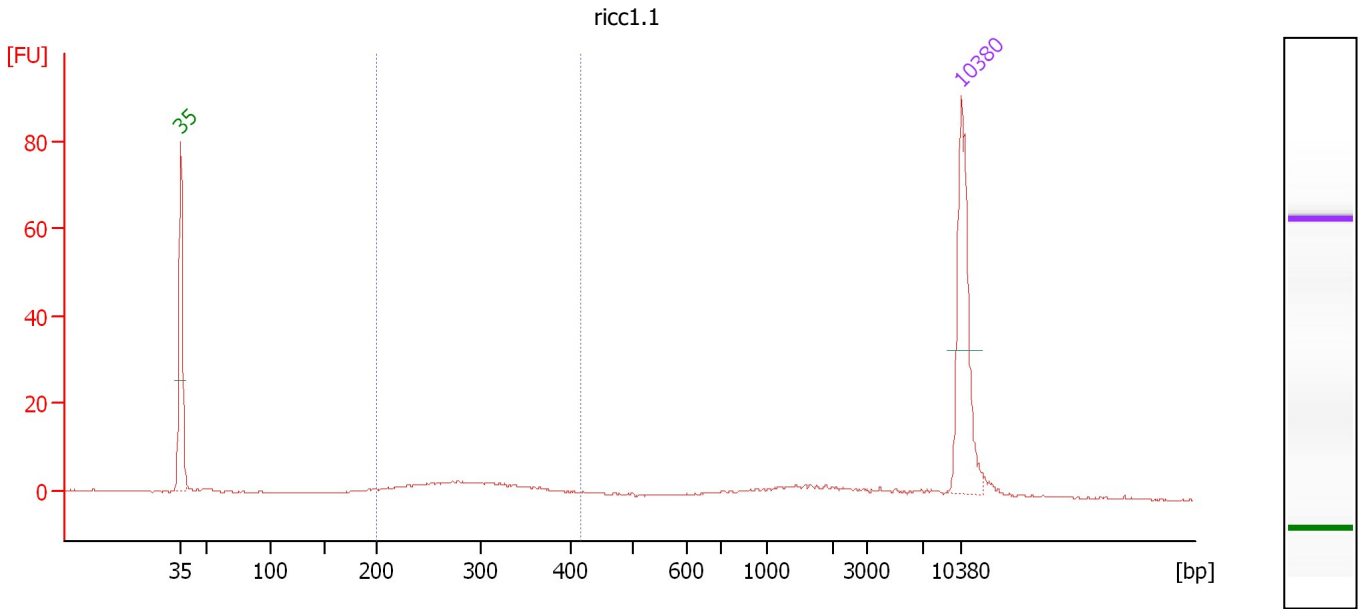
Region table for sample 3 : rna seq nt2 lio

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
166	524	285	118,618.8	21,434.54	10,652.4	99	19.1	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 4 : ricc1.1

Number of peaks found: 0 Corr. Area 1: 47.8
 Noise: 0.1

Peak table for sample 4 : ricc1.1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	10,380	75.00	10.9	Upper Marker

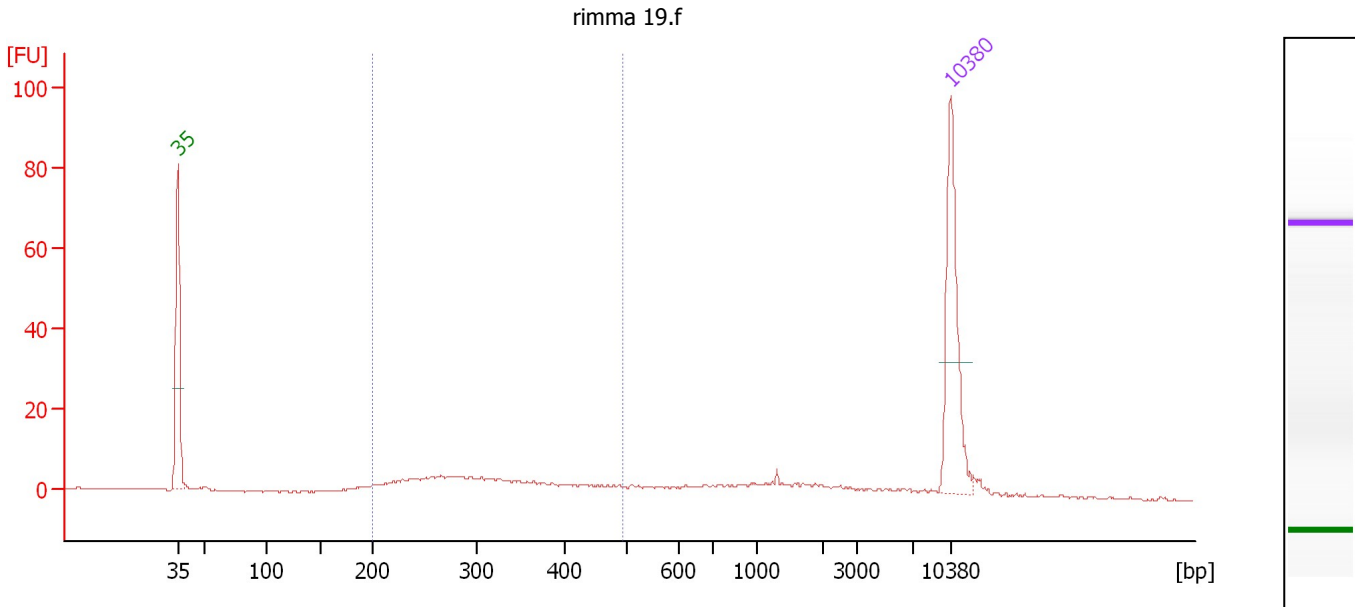
Region table for sample 4 : ricc1.1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	417	294	336.1	62.98	47.8	46	17.0	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 5 : rimma 19.f

Number of peaks found: 0 Corr. Area 1: 92.7
 Noise: 0.2

Peak table for sample 5 : rimma 19.f

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	10,380	75.00	10.9	Upper Marker

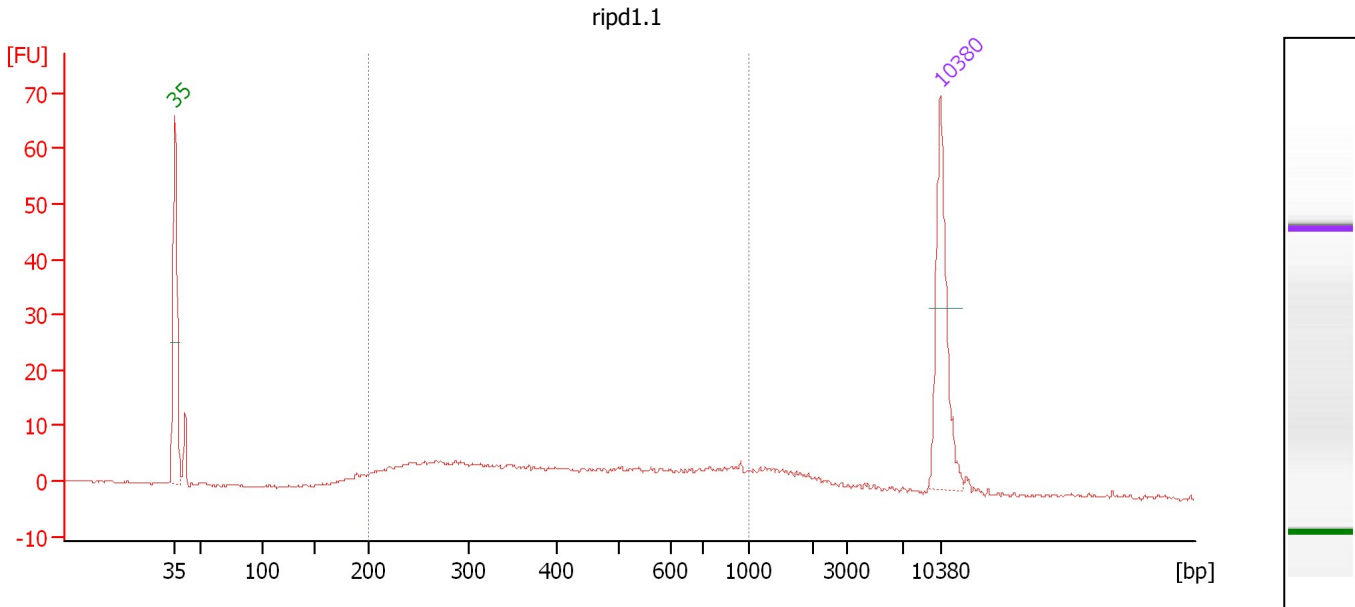
Region table for sample 5 : rimma 19.f

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	494	321	556.4	109.71	92.7	51	23.4	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 6 : ripd1.1

Number of peaks found: 0 Corr. Area 1: 179.5
 Noise: 0.1

Peak table for sample 6 : ripd1.1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	10,380	75.00	10.9	Upper Marker

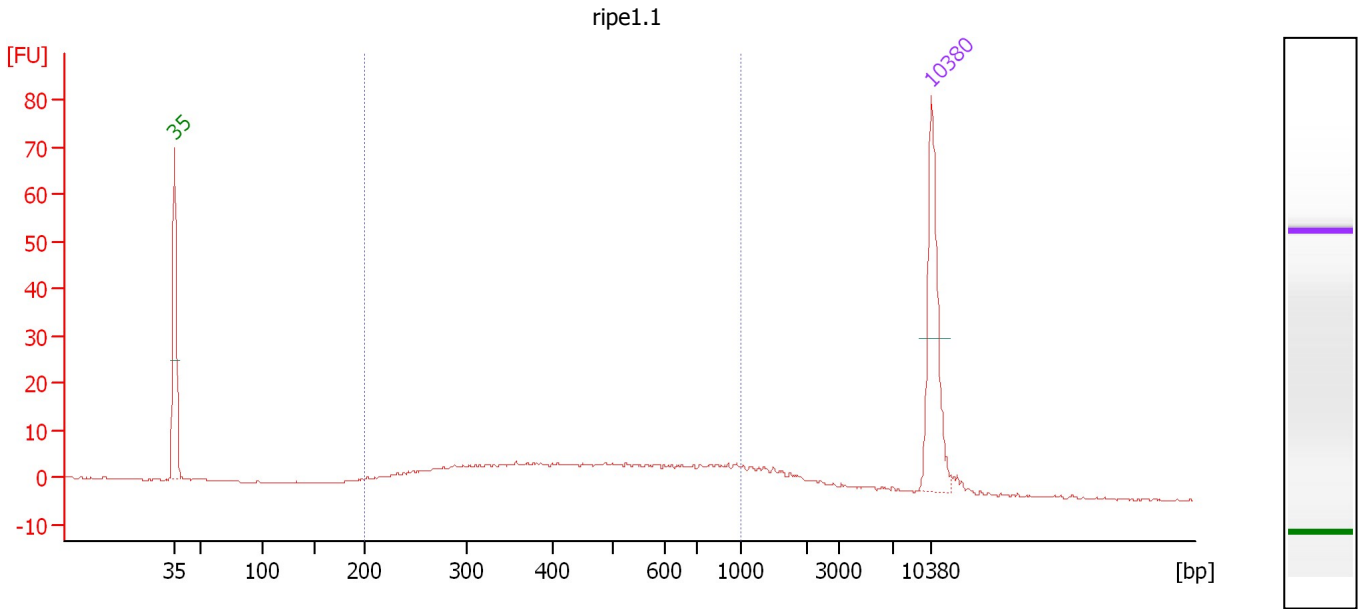
Region table for sample 6 : ripd1.1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	1,000	454	1,202.8	282.03	179.5	74	43.7	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 7 : ripe1.1

Number of peaks found: 0 Corr. Area 1: 198.8
 Noise: 0.2

Peak table for sample 7 : ripe1.1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	10,380	75.00	10.9	Upper Marker

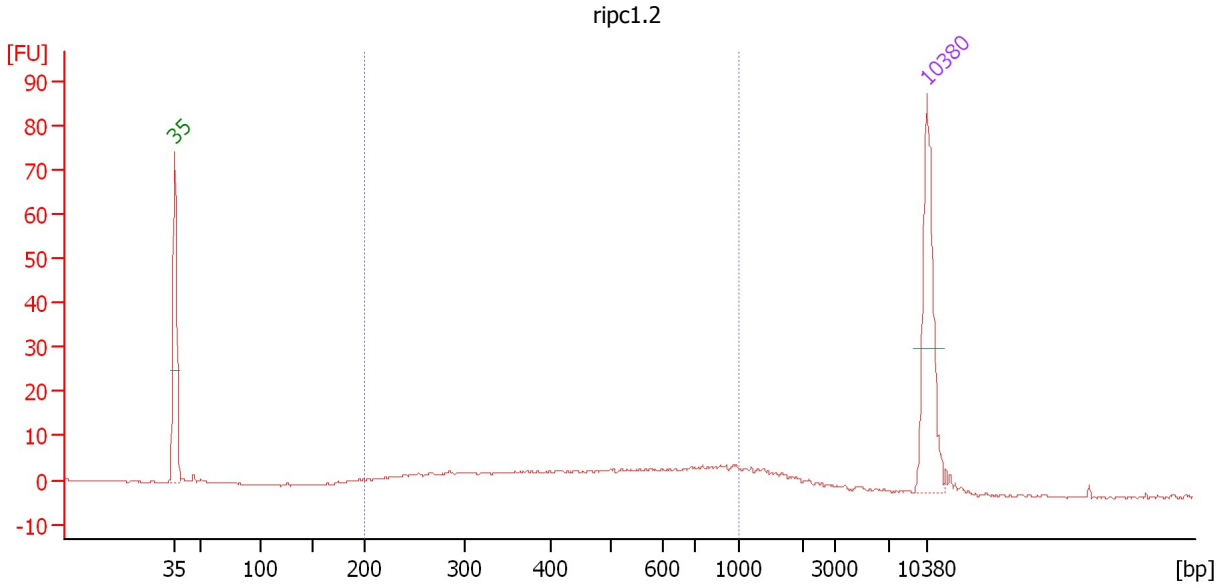
Region table for sample 7 : ripe1.1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	1,000	487	1,048.0	271.10	198.8	76	39.6	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 8 : ripc1.2

Number of peaks found: 0 Corr. Area 1: 148.6
 Noise: 0.1

Peak table for sample 8 : ripc1.2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	10,380	75.00	10.9	Upper Marker

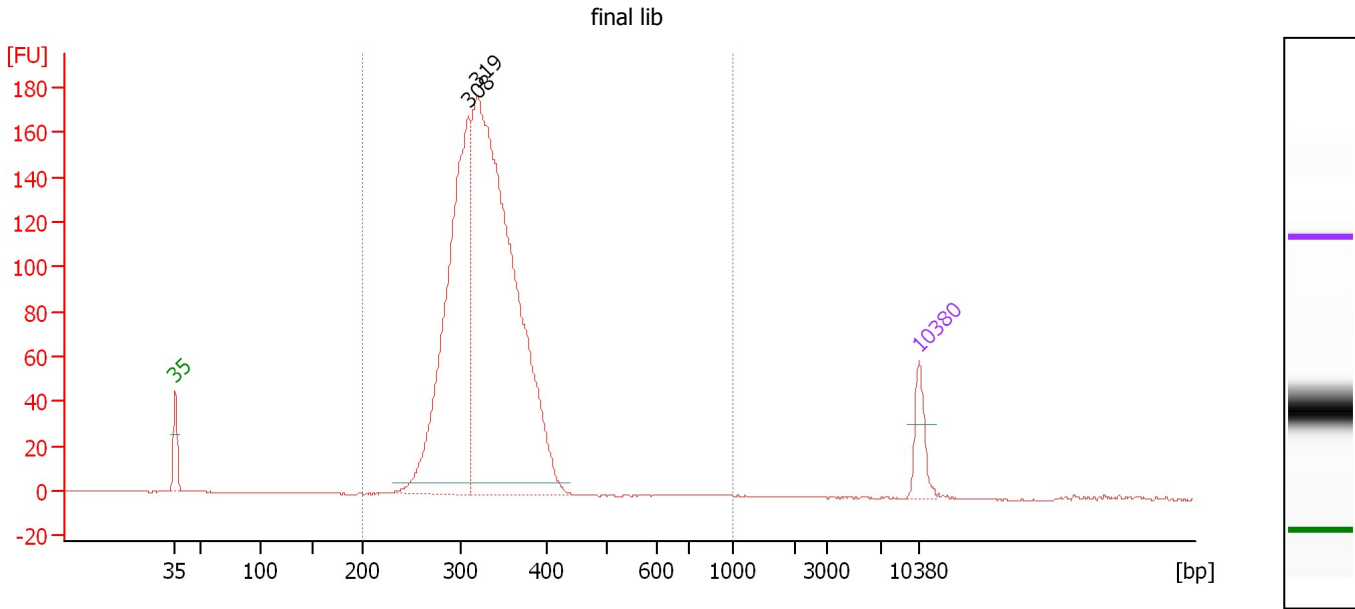
Region table for sample 8 : ripc1.2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	1,000	506	695.2	183.36	148.6	78	40.1	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 9 : final lib

Number of peaks found: 2 Corr. Area 1: 1,755.3
 Noise: 0.2

Peak table for sample 9 : final lib

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	308	1,297.05	6,374.4	
3	319	2,312.60	10,985.2	
4	10,380	75.00	10.9	Upper Marker

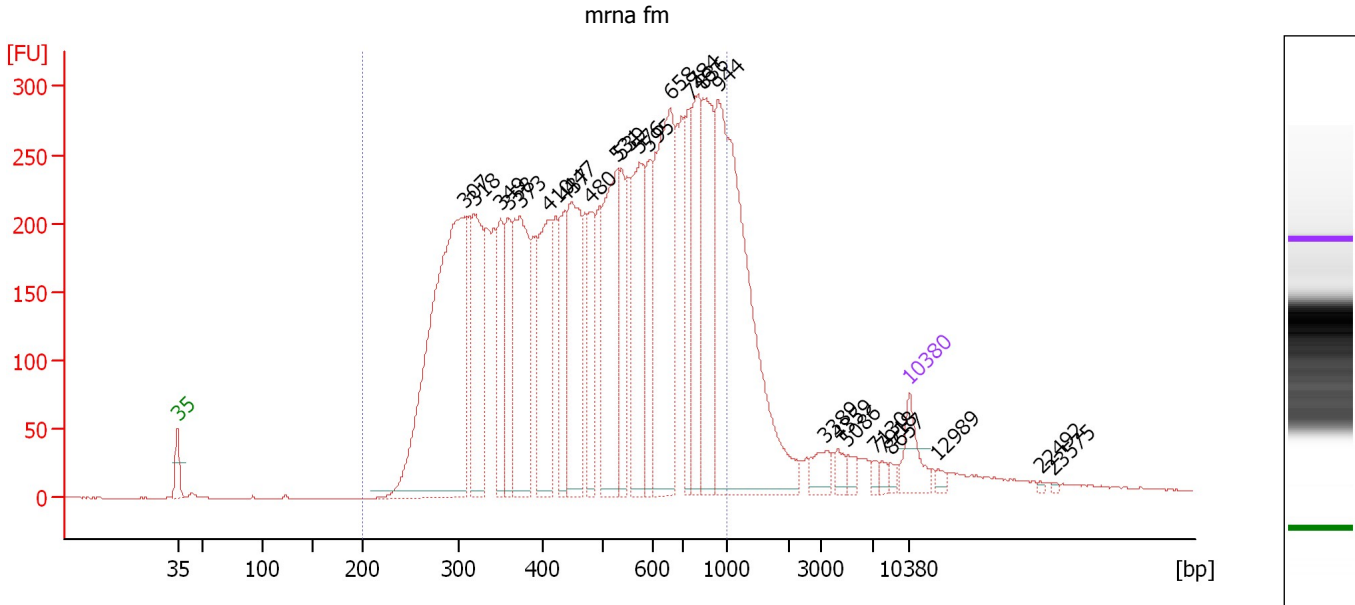
Region table for sample 9 : final lib

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	1,000	328	16,642.5	3,553.14	1,755.3	99	12.7	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 10 : mrna fm

Number of peaks found: 27 Corr. Area 1: 7,894.4
 Noise: 0.2

Peak table for sample 10 : mrna fm

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	307	1,430.98	7,072.3	
3	318	428.85	2,043.1	
4	349	237.00	1,028.1	
5	358	234.22	990.8	
6	373	492.23	2,000.3	
7	410	400.54	1,479.1	
8	437	198.09	686.1	
9	447	430.58	1,458.2	
10	480	206.36	651.5	
11	531	465.59	1,329.0	
12	539	189.18	531.4	
13	576	376.26	990.3	
14	595	194.24	494.7	
15	658	634.34	1,460.3	
16	746	202.88	411.9	
17	784	298.58	577.3	
18	836	362.99	657.9	
19	944	1,060.74	1,701.7	
20	3,389	46.43	20.8	
21	4,359	26.88	9.3	
22	5,086	21.19	6.3	
23	7,130	13.60	2.9	
24	7,918	13.71	2.6	
25	8,657	12.68	2.2	
26	10,380	75.00	10.9	Upper Marker

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Electropherogram Summary Continued ...**... Peak table for sample 10 : mrna fm**

Peak	Size [bp]	Conc. [pg/ μ l]	Molarity [pmol/l]	Observations
27	12,989	0.00	0.0	
28	22,492	0.00	0.0	
29	23,575	0.00	0.0	

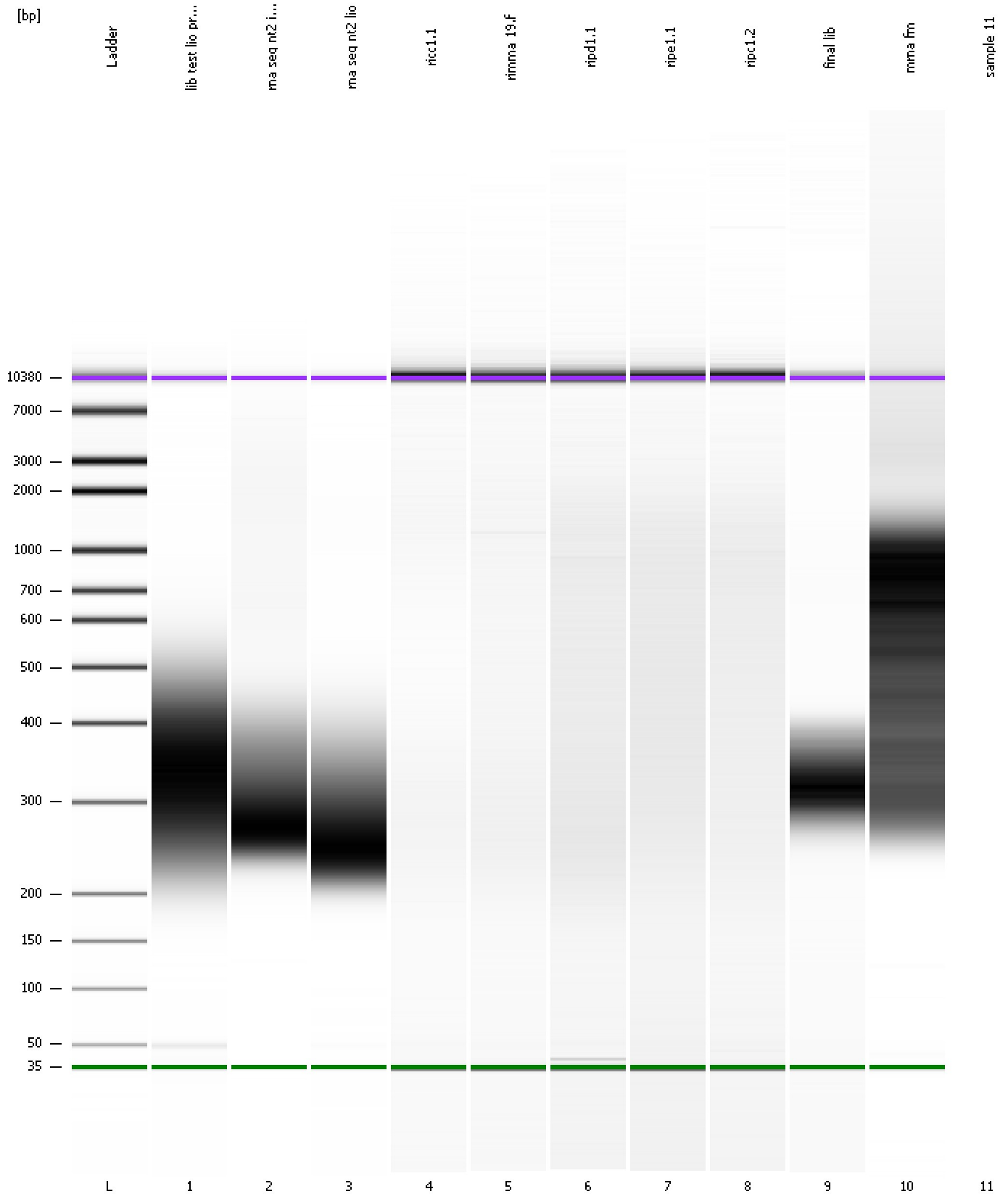
Region table for sample 10 : mrna fm

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/ μ l]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	1,000	521	30,200.1	8,592.96	7,894.4	87	37.1	

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Gel Image



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
Modified: 7/23/2013 3:47:00 PM

Invalid Samples

Sample 11 has not been run, no results available.

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad

Created: 7/23/2013 3:08:31 PM
 Modified: 7/23/2013 3:47:00 PM

Run Logbook

Description	Number	Source	Category	Sub Category	Time	Time Zone	User	Host
Run ended on port 1 (Number of wells acquired: 11)		Instrument	Run		7/23/2013 3:46:57 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2013-07-23\2013-07-23_003.xad)		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		7/23/2013 3:08:37 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1