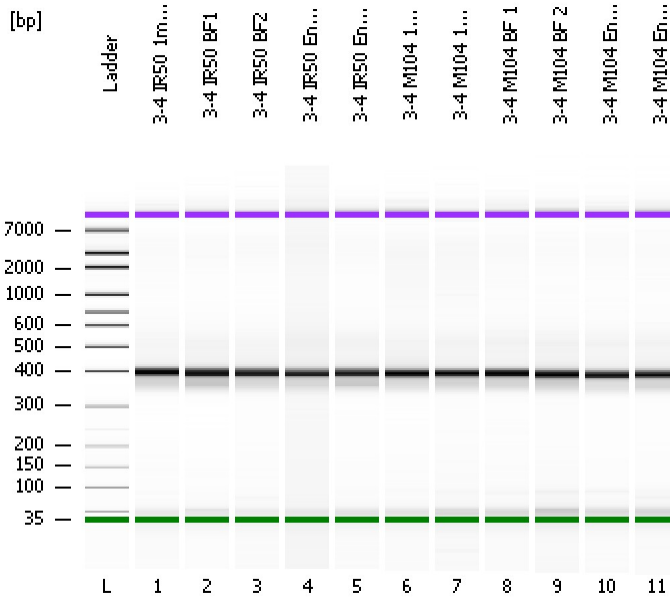


Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
Modified: 11/19/2012 2:53:00 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

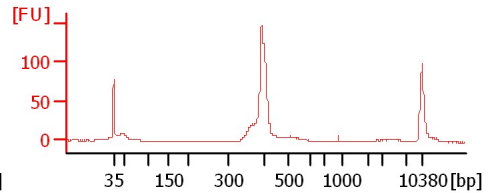
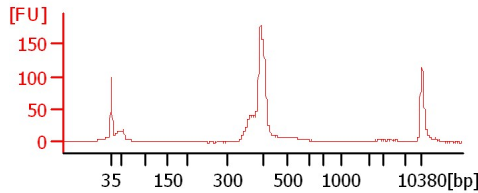
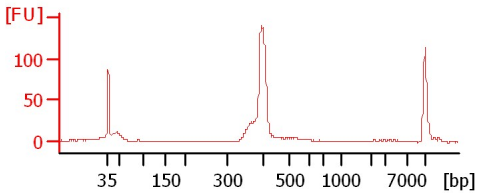
Chip Information:

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

3-4 IR50 1mm2

3-4 IR50 BF1

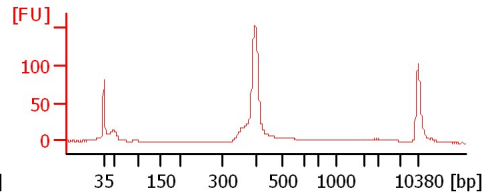
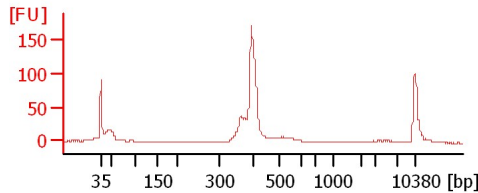
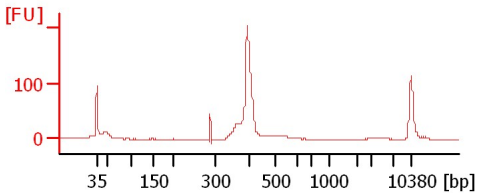
3-4 IR50 BF2



3-4 IR50 Endo 1

3-4 IR50 Endo 2

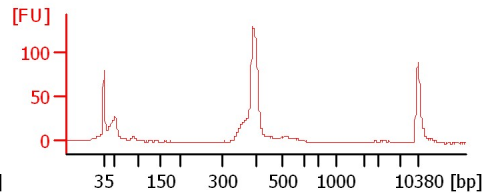
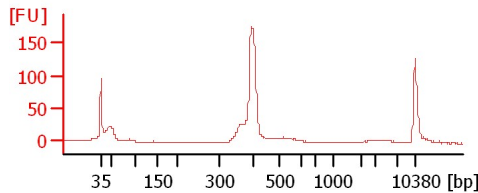
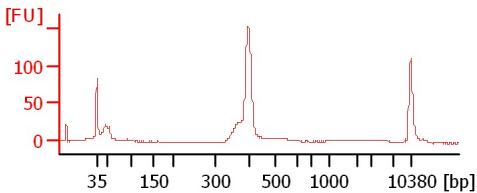
3-4 M104 1mm 1



3-4 M104 1mm 2

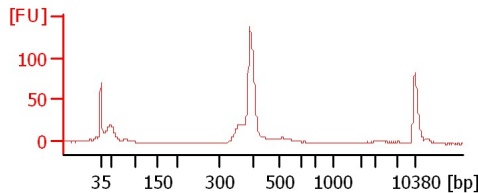
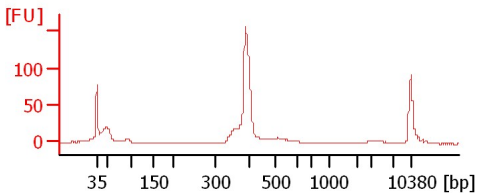
3-4 M104 BF 1

3-4 M104 BF 2



3-4 M104 Endo 1

3-4 M104 Endo 2



Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
3-4 IR50 1mm2		<input type="checkbox"/>	✓			
3-4 IR50 BF1		<input type="checkbox"/>	✓			
3-4 IR50 BF2		<input type="checkbox"/>	✓			
3-4 IR50 Endo 1		<input type="checkbox"/>	✓			
3-4 IR50 Endo 2		<input type="checkbox"/>	✓			
3-4 M104 1mm 1		<input type="checkbox"/>	✓			
3-4 M104 1mm 2		<input type="checkbox"/>	✓			
3-4 M104 BF 1		<input type="checkbox"/>	✓			
3-4 M104 BF 2		<input type="checkbox"/>	✓			
3-4 M104 Endo 1		<input type="checkbox"/>	✓			
3-4 M104 Endo 2		<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\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
Modified: 11/19/2012 2:53:00 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/ μ l] : 1950
Uses Standard Area for Ladder Fragments
Lower Marker Concentration [pg/ μ l] : 125
Upper Marker Concentration [pg/ μ l] : 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

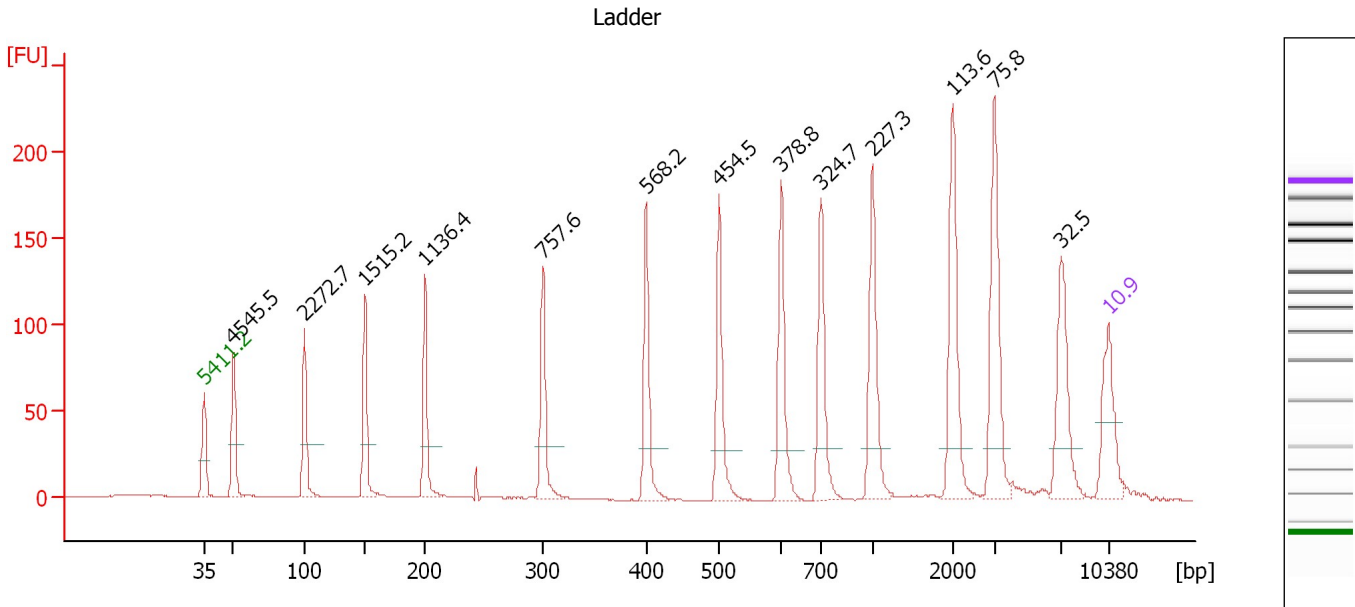
Ladder

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\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.2

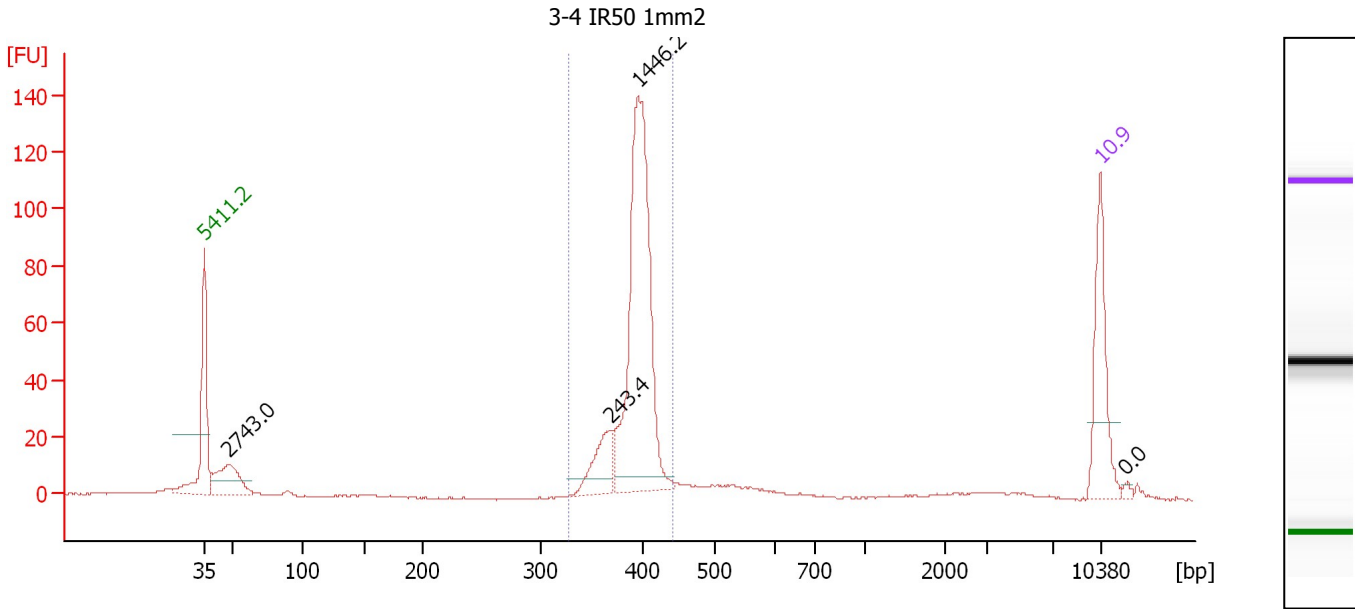
Peak table for Ladder

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\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 1 : 3-4 IR50 1mm2

Number of peaks found: 4 Corr. Area 1: 434.4
 Noise: 0.2

Peak table for sample 1 : 3-4 IR50 1mm2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	48	86.29	2,743.0	
3	370	59.36	243.4	
4	396	378.22	1,446.2	
5	10,380	75.00	10.9	Upper Marker
6	12,124	0.00	0.0	

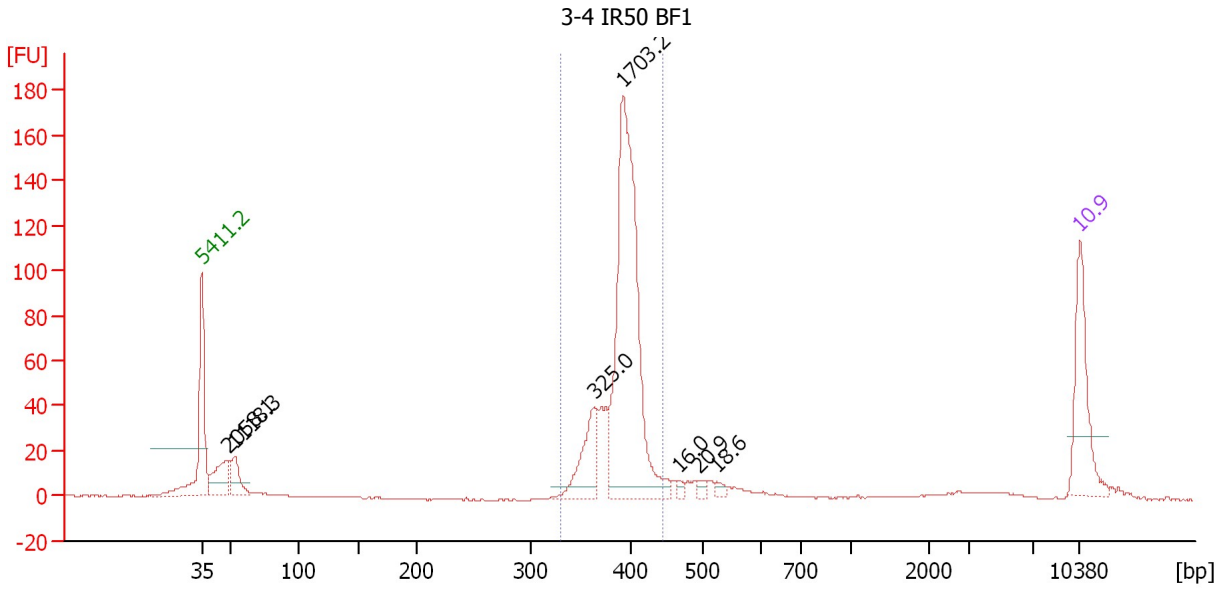
Region table for sample 1 : 3-4 IR50 1mm2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
328	442	394	1,758.9	456.41	434.4	76	4.5	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 2 : 3-4 IR50 BF1

Number of peaks found: 7 Corr. Area 1: 591.5
 Noise: 0.2

Peak table for sample 2 : 3-4 IR50 BF1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	48	65.86	2,058.1	
3	53	39.37	1,118.3	
4	363	77.84	325.0	
5	392	440.90	1,703.2	
6	467	4.92	16.0	
7	497	6.85	20.9	
8	525	6.46	18.6	
9	10,380	75.00	10.9	Upper Marker

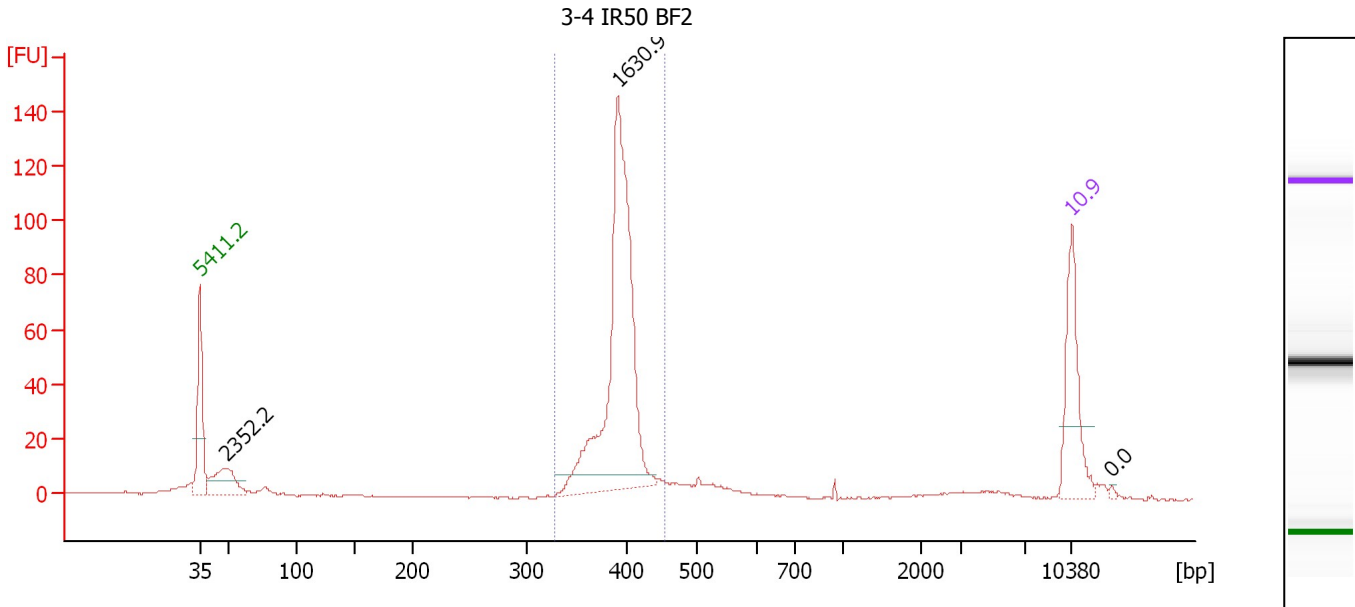
Region table for sample 2 : 3-4 IR50 BF1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
330	444	391	2,147.9	553.02	591.5	74	4.8	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 3 : 3-4 IR50 BF2

Number of peaks found: 3 Corr. Area 1: 432.5
 Noise: 0.2

Peak table for sample 3 : 3-4 IR50 BF2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	49	76.30	2,352.2	
3	392	421.77	1,630.9	
4	10,380	75.00	10.9	Upper Marker
5	13,263	0.00	0.0	

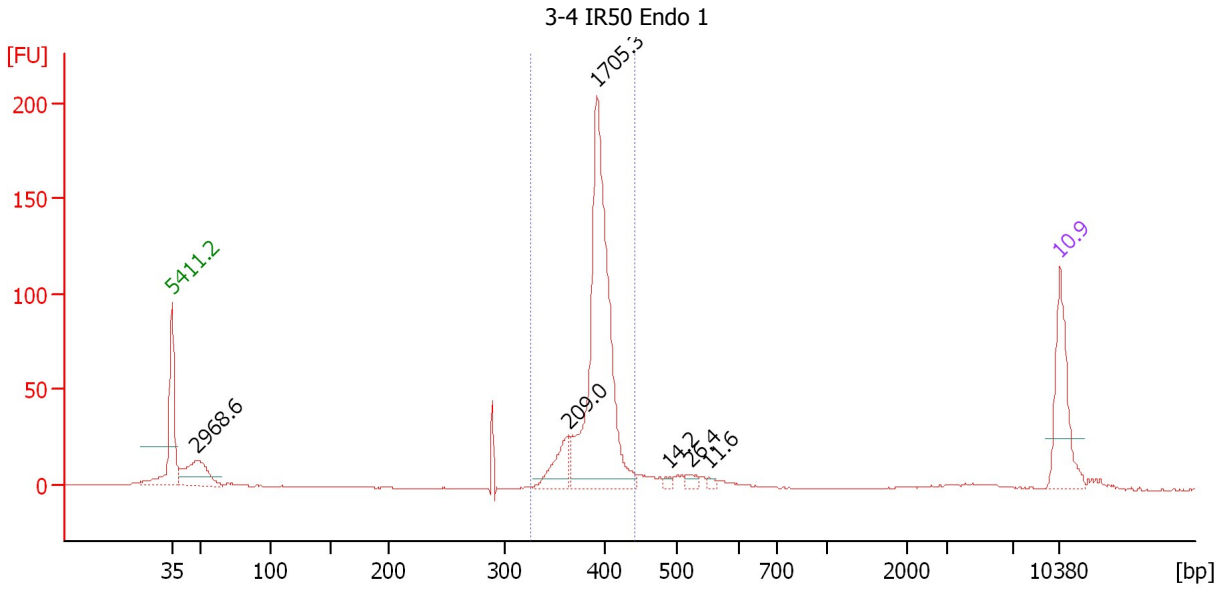
Region table for sample 3 : 3-4 IR50 BF2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
328	454	393	1,749.5	453.03	432.5	75	4.8	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 4 : 3-4 IR50 Endo 1

Number of peaks found: 6 Corr. Area 1: 519.0
 Noise: 0.2

Peak table for sample 4 : 3-4 IR50 Endo 1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	48	94.45	2,968.6	
3	363	50.02	209.0	
4	391	440.09	1,705.3	
5	489	4.57	14.2	
6	523	9.13	26.4	
7	550	4.21	11.6	
8	10,380	75.00	10.9	Upper Marker

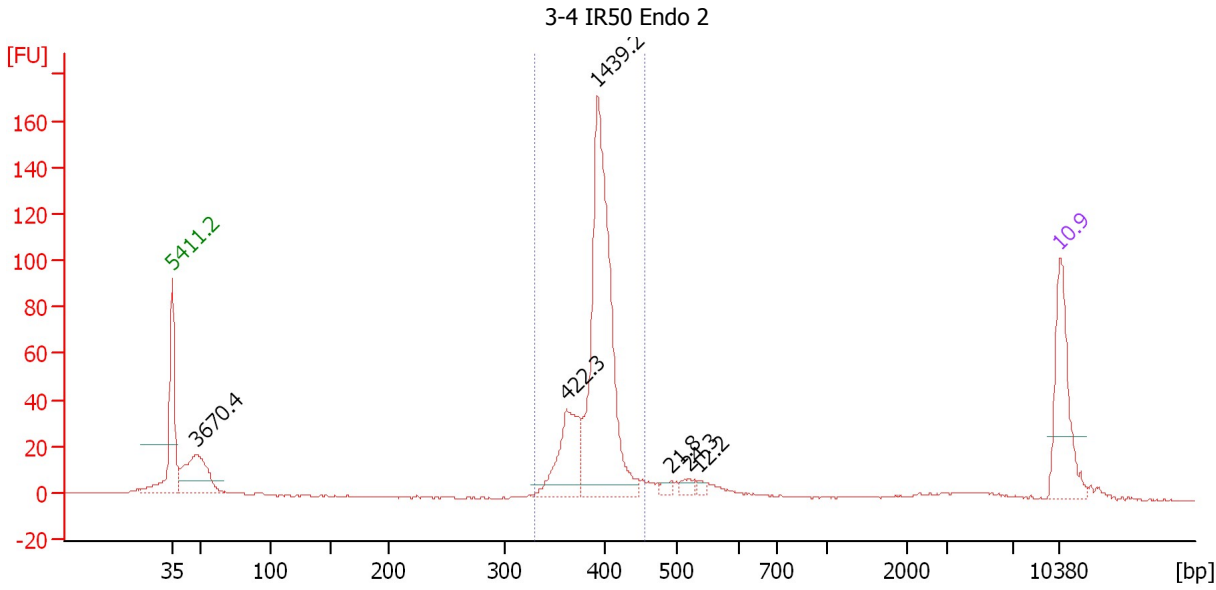
Region table for sample 4 : 3-4 IR50 Endo 1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
326	439	391	1,891.9	487.22	519.0	75	4.4	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 5 : 3-4 IR50 Endo 2

Number of peaks found: 6 Corr. Area 1: 509.5
 Noise: 0.2

Peak table for sample 5 : 3-4 IR50 Endo 2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	48	115.58	3,670.4	
3	361	100.69	422.3	
4	392	372.33	1,439.2	
5	491	7.07	21.8	
6	518	8.32	24.3	
7	534	4.31	12.2	
8	10,380	75.00	10.9	Upper Marker

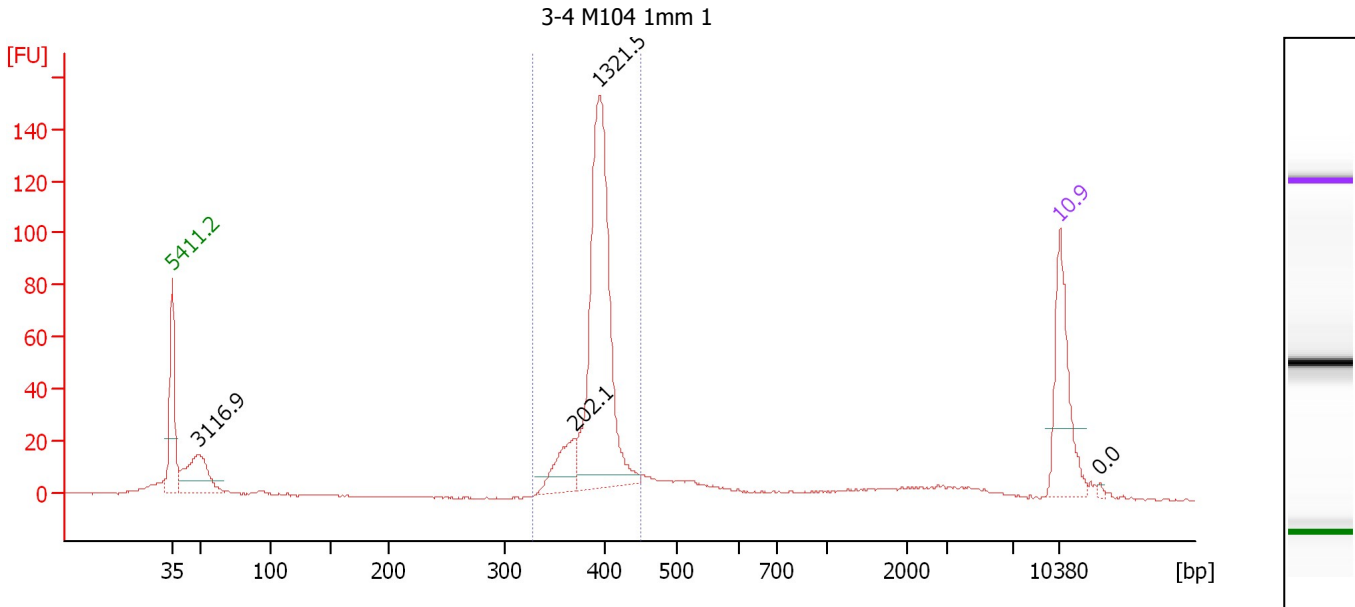
Region table for sample 5 : 3-4 IR50 Endo 2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
329	453	391	1,834.9	472.86	509.5	73	5.0	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 6 : 3-4 M104 1mm 1

Number of peaks found: 4 Corr. Area 1: 452.9
 Noise: 0.3

Peak table for sample 6 : 3-4 M104 1mm 1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	49	100.02	3,116.9	
3	369	49.15	202.1	
4	394	343.53	1,321.5	
5	10,380	75.00	10.9	Upper Marker
6	13,253	0.00	0.0	

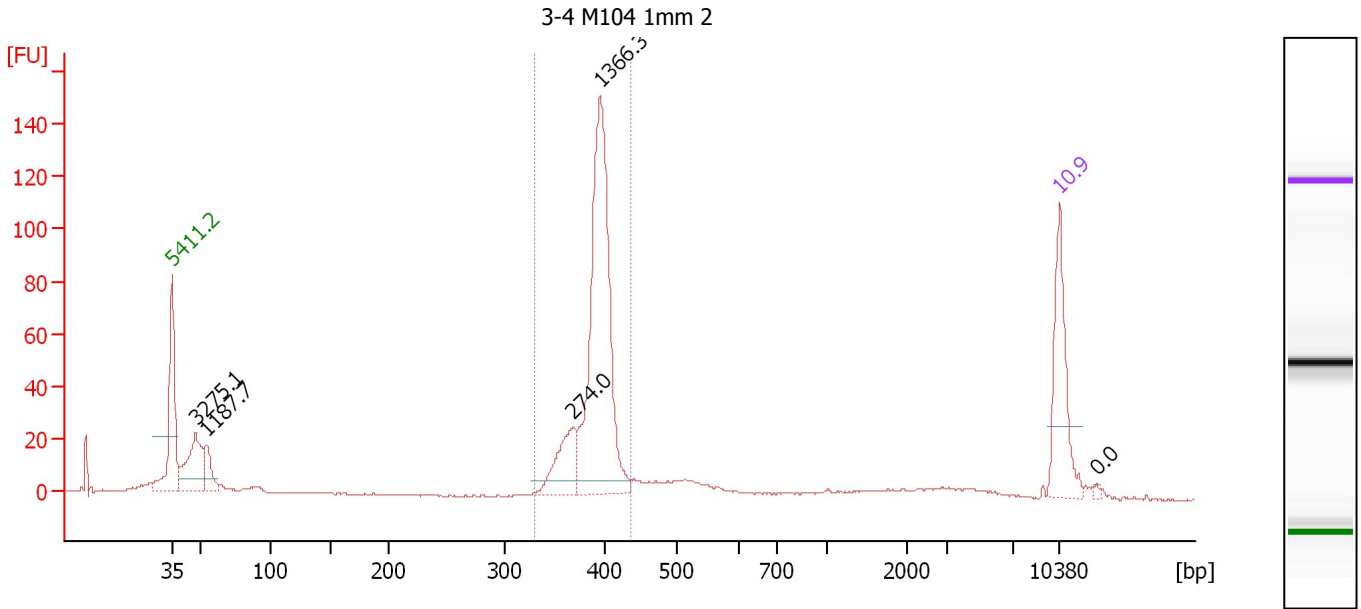
Region table for sample 6 : 3-4 M104 1mm 1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
328	448	392	1,640.7	423.54	452.9	66	4.7	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 7 : 3-4 M104 1mm 2

Number of peaks found: 5 Corr. Area 1: 421.1
 Noise: 0.2

Peak table for sample 7 : 3-4 M104 1mm 2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	47	102.18	3,275.1	
3	54	42.56	1,187.7	
4	368	66.53	274.0	
5	395	355.80	1,366.3	
6	10,380	75.00	10.9	Upper Marker
7	12,995	0.00	0.0	

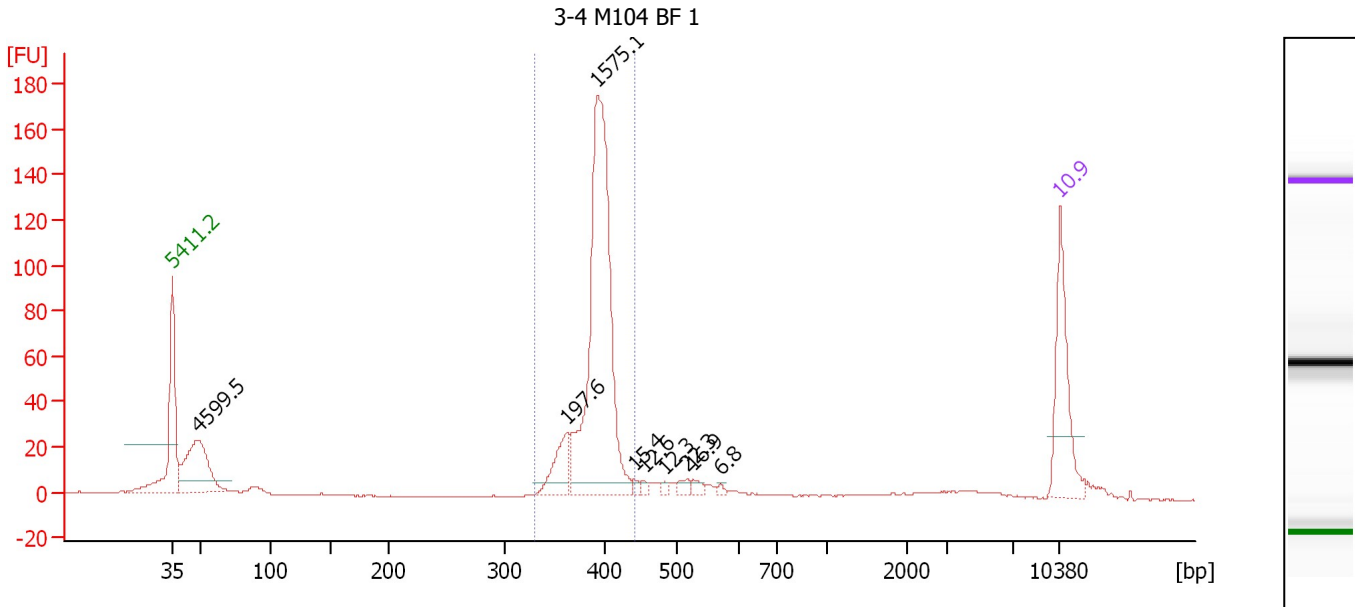
Region table for sample 7 : 3-4 M104 1mm 2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
329	434	390	1,671.4	429.31	421.1	62	4.3	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 8 : 3-4 M104 BF 1

Number of peaks found: 9 Corr. Area 1: 522.1
 Noise: 0.3

Peak table for sample 8 : 3-4 M104 BF 1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	49	147.41	4,599.5	
3	362	47.21	197.6	
4	392	407.11	1,575.1	
5	439	4.46	15.4	
6	454	3.77	12.6	
7	482	3.93	12.3	
8	517	7.60	22.3	
9	525	5.87	16.9	
10	571	2.57	6.8	
11	10,380	75.00	10.9	Upper Marker

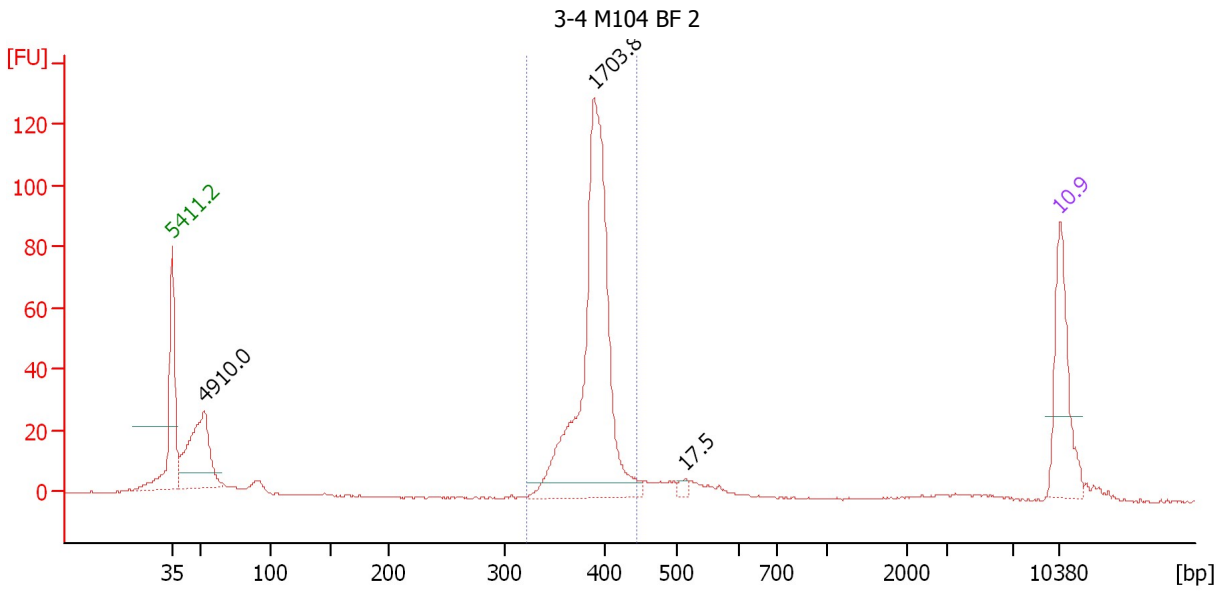
Region table for sample 8 : 3-4 M104 BF 1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
329	442	390	1,811.9	466.38	522.1	66	4.5	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 9 : 3-4 M104 BF 2

Number of peaks found: 3 Corr. Area 1: 397.2
 Noise: 0.2

Peak table for sample 9 : 3-4 M104 BF 2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	53	170.42	4,910.0	
3	388	436.82	1,703.8	
4	512	5.91	17.5	
5	10,380	75.00	10.9	Upper Marker

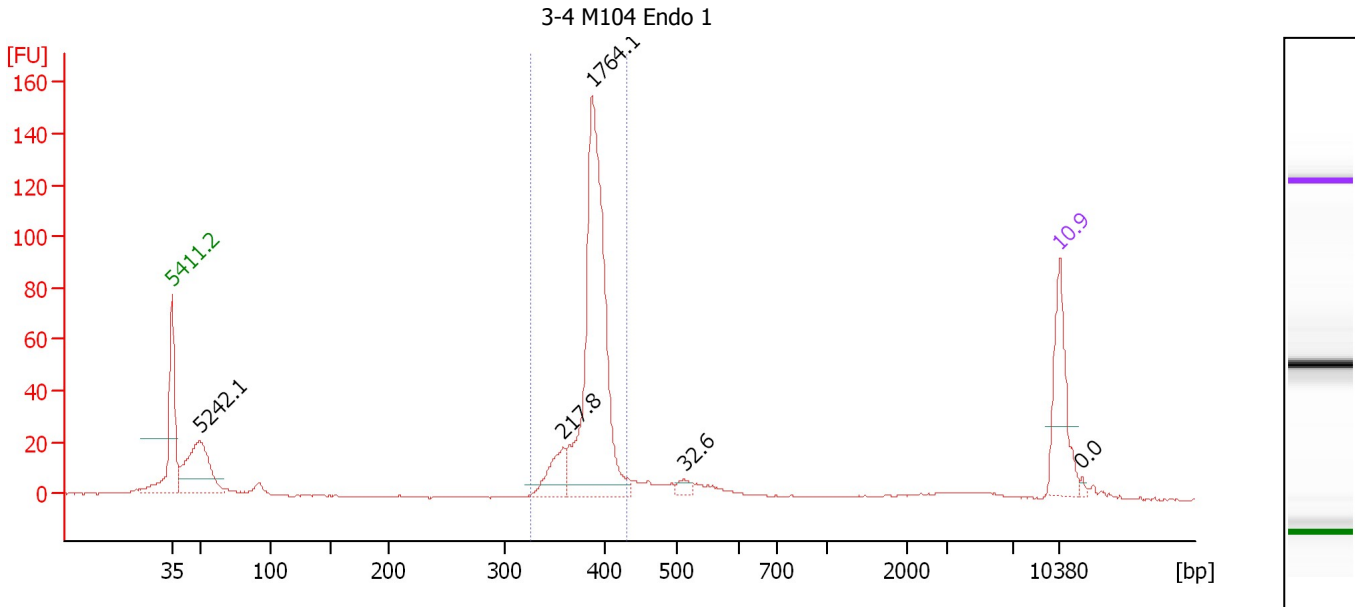
Region table for sample 9 : 3-4 M104 BF 2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
321	443	388	1,678.1	428.87	397.2	66	4.6	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 10 : 3-4 M104 Endo 1

Number of peaks found: 5 Corr. Area 1: 409.0
 Noise: 0.1

Peak table for sample 10 : 3-4 M104 Endo 1

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	49	170.71	5,242.1	
3	358	51.50	217.8	
4	387	450.06	1,764.1	
5	512	11.00	32.6	
6	10,380	75.00	10.9	Upper Marker
7	11,943	0.00	0.0	

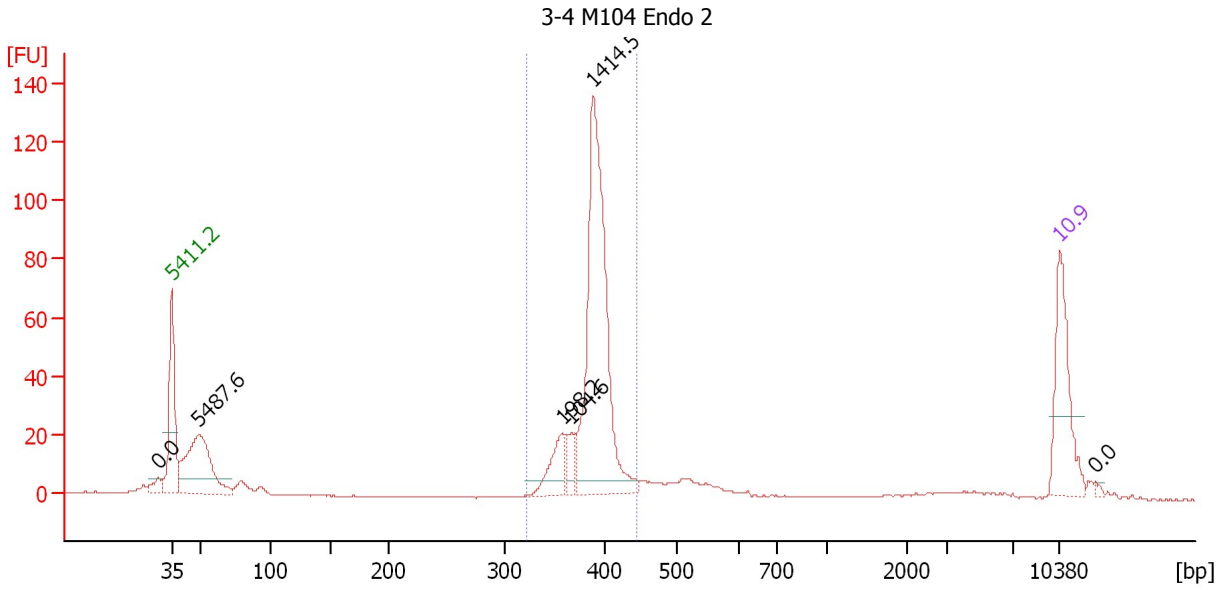
Region table for sample 10 : 3-4 M104 Endo 1

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
326	430	386	1,949.6	496.21	409.0	65	4.2	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Electropherogram Summary Continued ...



Overall Results for sample 11 : 3-4 M104 Endo 2

Number of peaks found: 6 Corr. Area 1: 377.0
 Noise: 0.2

Peak table for sample 11 : 3-4 M104 Endo 2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	31	0.00	0.0	
2	35	125.00	5,411.3	Lower Marker
3	49	178.26	5,487.6	
4	357	46.65	198.2	
5	366	25.25	104.6	
6	388	361.93	1,414.5	
7	10,380	75.00	10.9	Upper Marker
8	12,963	0.00	0.0	

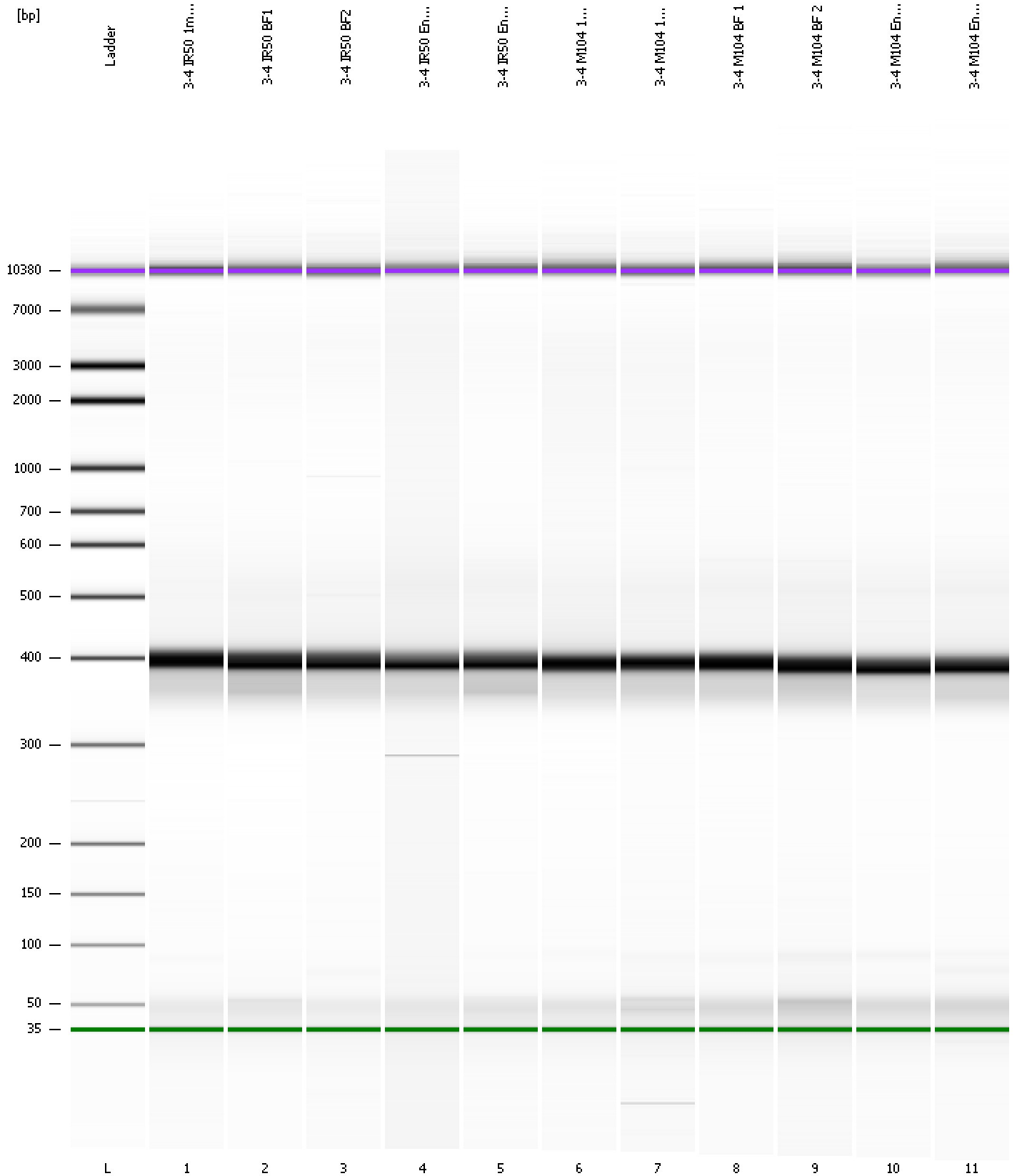
Region table for sample 11 : 3-4 M104 Endo 2

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
322	443	387	1,730.6	441.38	377.0	63	4.7	Blue

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
Modified: 11/19/2012 2:53:00 PM

Gel Image



Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad

Created: 11/19/2012 2:05:03 PM
 Modified: 11/19/2012 2:53:00 PM

Run Logbook

Description	Number	Source	Category	Sub Category	Time	Time Zone	User	Host
Run ended on port 1 (Number of wells acquired: 12)		Instrument	Run		11/19/2012 2:46:22 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2012-11-19\2012-11-19_004.xad)		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		11/19/2012 2:05:08 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1