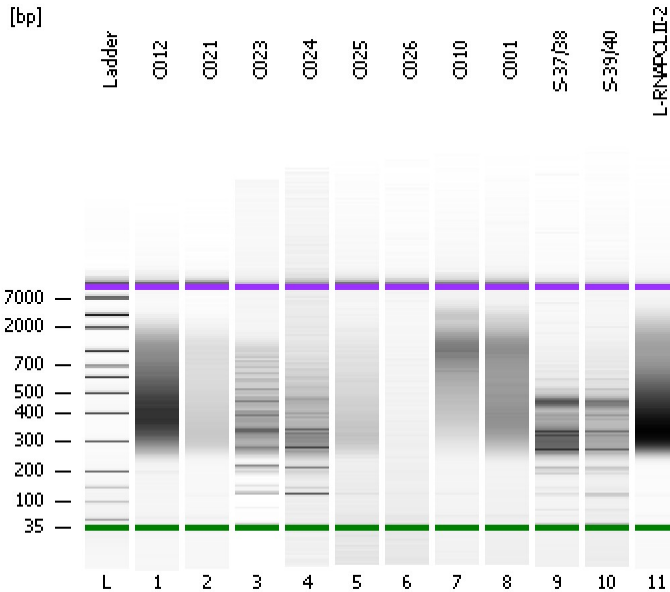


Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

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

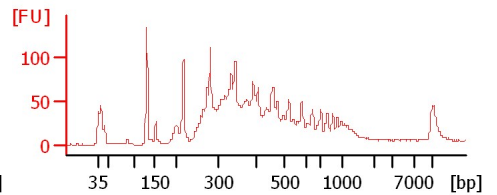
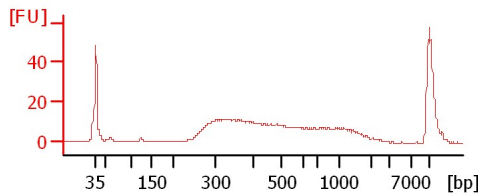
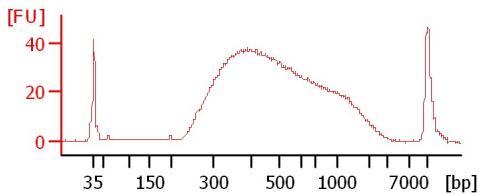
Chip Information:

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

C012

C021

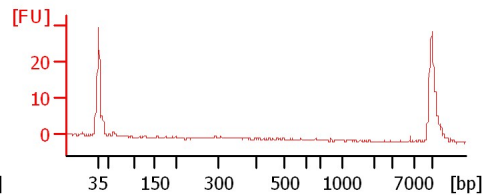
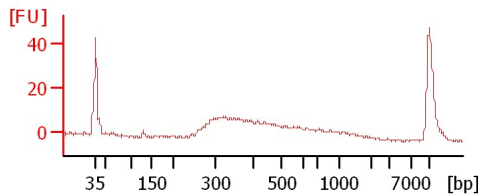
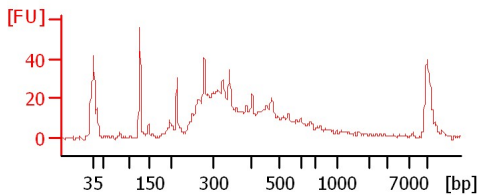
C023



C024

C025

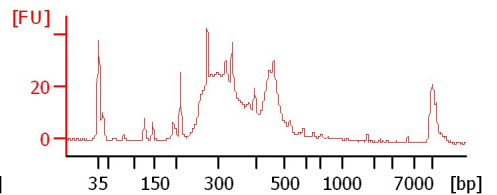
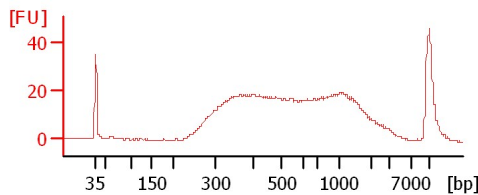
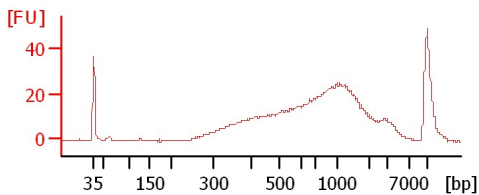
C026



C010

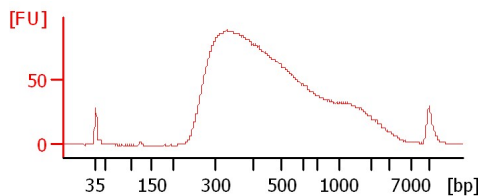
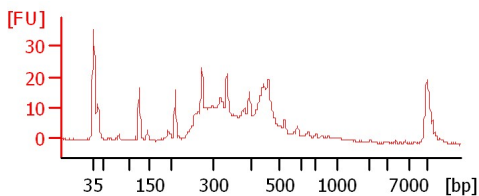
C001

S-37/38



S-39/40

L-RNAPOLII-2



Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
C012		<input type="checkbox"/>	✓			
C021		<input type="checkbox"/>	✓			
C023		<input type="checkbox"/>	✓			
C024		<input type="checkbox"/>	✓			
C025		<input type="checkbox"/>	✓			
C026		<input type="checkbox"/>	✓			
C010		<input type="checkbox"/>	✓			
C001		<input type="checkbox"/>	✓			
S-37/38		<input type="checkbox"/>	✓			
S-39/40		<input type="checkbox"/>	✓			
L-RNAPOLII-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\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

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

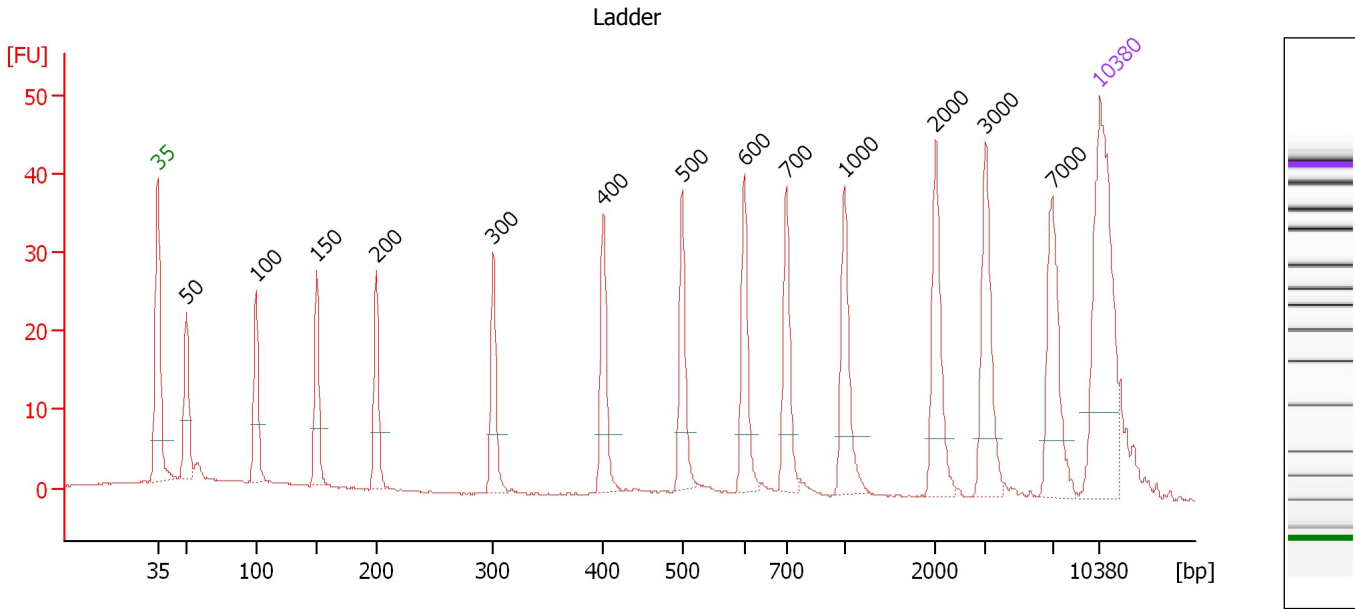
Ladder

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\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.1

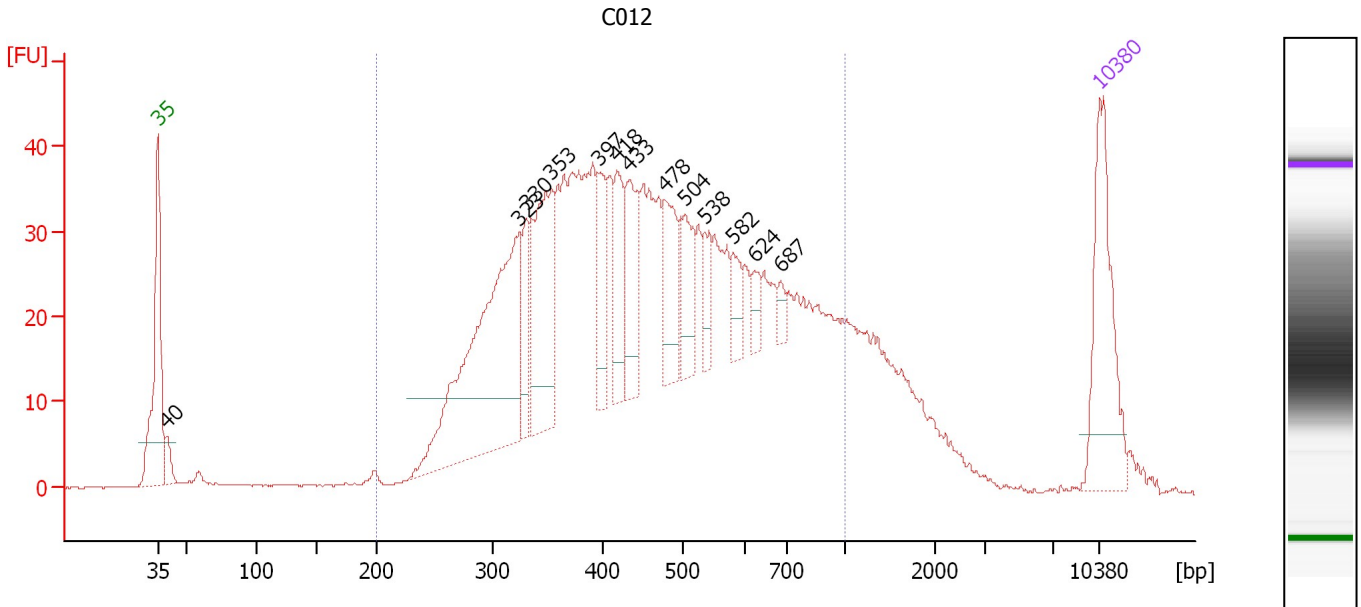
Peak table for Ladder

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\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 1 : C012

Number of peaks found: 13 Corr. Area 1: 1,093.7
 Noise: 0.1

Peak table for sample 1 : C012

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	40	15.29	581.0	
3	323	255.11	1,196.4	
4	330	41.84	191.8	
5	353	114.78	493.0	
6	397	39.70	151.7	
7	418	48.64	176.5	
8	433	53.33	186.6	
9	478	51.42	162.9	
10	504	39.06	117.5	
11	538	21.42	60.4	
12	582	18.15	47.2	
13	624	10.76	26.1	
14	687	7.71	17.0	
15	10,380	75.00	10.9	Upper Marker

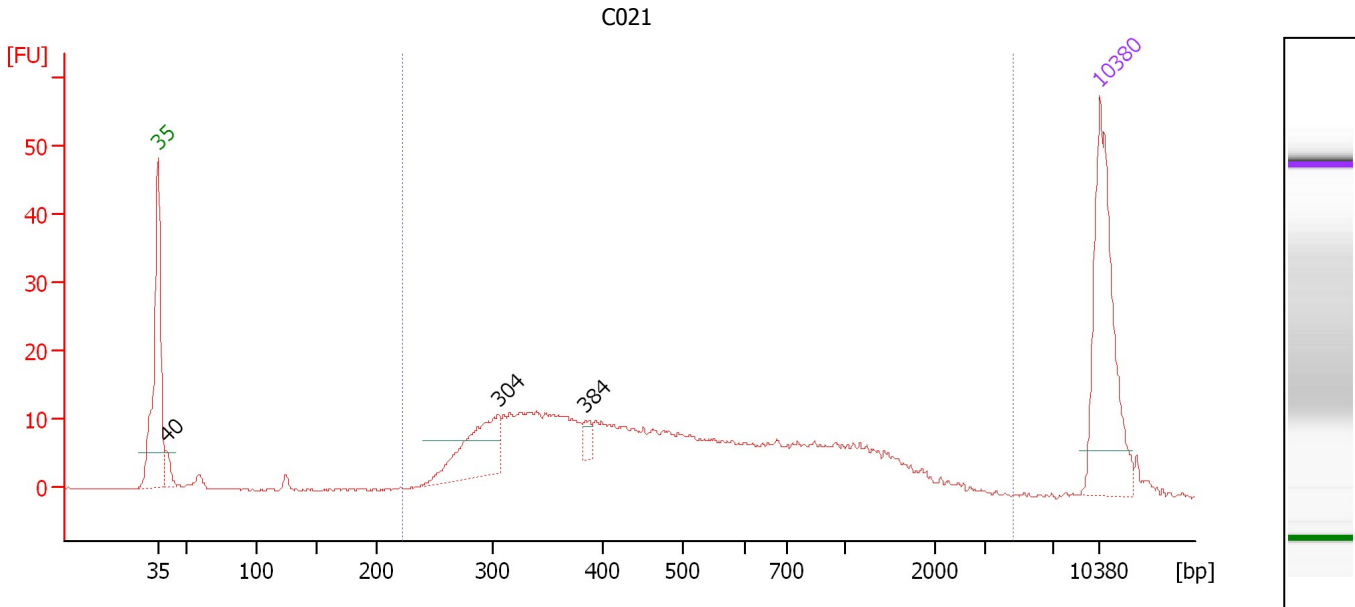
Region table for sample 1 : C012

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	6,862.6	480	1,871.50	1,000	1,093.7	86	35.0	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 2 : C021

Number of peaks found: 3 Corr. Area 1: 381.4
 Noise: 0.1

Peak table for sample 2 : C021

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	40	10.81	413.4	
3	304	58.72	292.7	
4	384	6.89	27.2	
5	10,380	75.00	10.9	Upper Marker

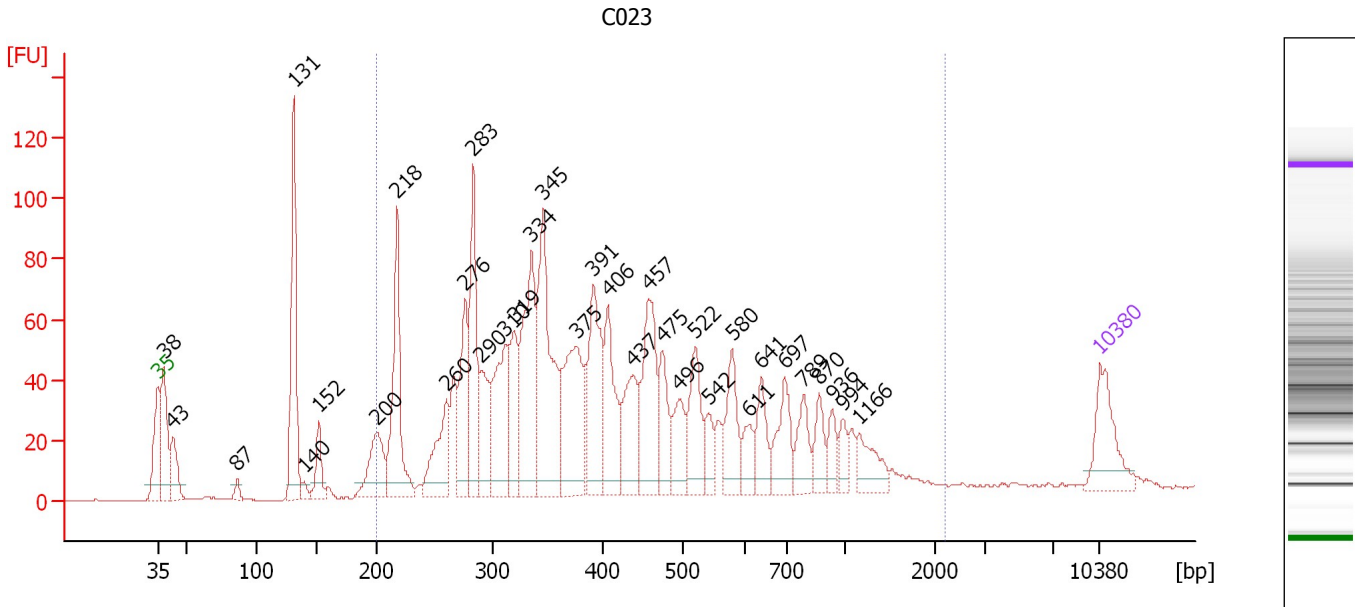
Region table for sample 2 : C021

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
222	1,752.0	625	494.29	4,689	381.4	94	73.3	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 3 : C023

Number of peaks found: 34 Corr. Area 1: 1,759.4
 Noise: 0.2

Peak table for sample 3 : C023

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	38	152.47	6,032.9	
3	43	65.83	2,317.0	
4	81	13.69	239.7	
5	131	251.18	2,897.9	
6	140	14.14	153.0	
7	152	51.78	517.0	
8	200	97.61	739.2	
9	218	208.78	1,453.4	
10	260	108.80	633.8	
11	276	123.77	679.8	
12	283	179.90	964.8	
13	290	90.90	475.2	
14	310	160.67	784.1	
15	319	103.60	492.2	
16	334	223.14	1,011.0	
17	345	267.38	1,172.8	
18	375	194.33	784.7	
19	391	169.18	654.9	
20	406	124.47	464.5	
21	437	108.10	374.4	
22	457	154.11	510.8	
23	475	74.71	238.3	
24	496	66.59	203.5	
25	522	95.59	277.5	
26	542	35.91	100.3	

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad


Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...

... Peak table for sample 3 : C023

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
27	580	78.57	205.2	
28	611	38.47	95.4	
29	641	56.66	133.9	
30	697	75.16	163.3	
31	789	53.71	103.1	
32	870	40.37	70.3	
33	936	29.92	48.5	
34	994	24.42	37.2	
35	1,166	48.65	63.2	
36	▶ 10,380	75.00	10.9	Upper Marker

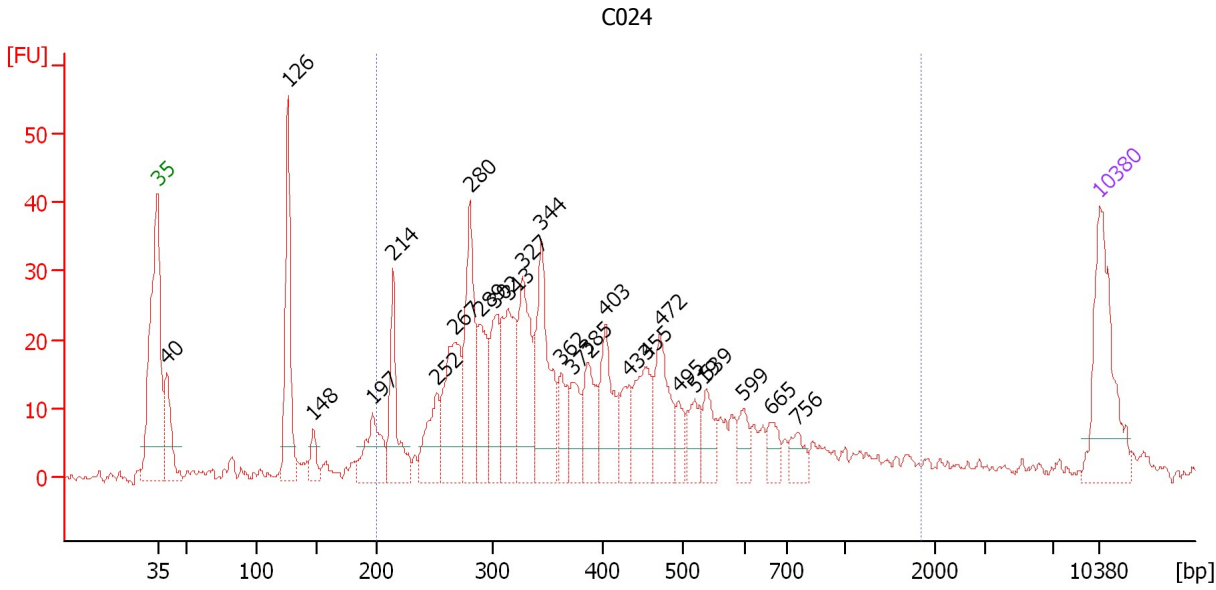
Region table for sample 3 : C023

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	13,155.3	477	3,186.45	2,174	1,759.4	86	57.1	

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 4 : C024

Number of peaks found: 26 Corr. Area 1: 664.9
 Noise: 0.7

Peak table for sample 4 : C024

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	40	57.79	2,193.9	
3	126	120.56	1,444.3	
4	148	18.56	190.6	
5	197	54.07	416.4	
6	214	69.78	493.7	
7	252	48.31	290.8	
8	267	94.36	536.1	
9	280	99.13	536.7	
10	289	59.82	314.1	
11	302	60.80	305.2	
12	313	80.89	391.3	
13	327	93.24	432.6	
14	344	102.18	450.1	
15	362	29.51	123.5	
16	372	34.68	141.2	
17	385	44.97	176.8	
18	403	57.81	217.4	
19	433	29.51	103.2	
20	455	54.33	181.1	
21	472	59.90	192.2	
22	495	17.47	53.4	
23	519	23.49	68.6	
24	539	27.11	76.2	
25	599	18.24	46.1	
26	665	17.42	39.7	

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...**... Peak table for sample 4 : C024**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
27	756	16.82	33.7	
28	▶ 10,380	75.00	10.9	Upper Marker

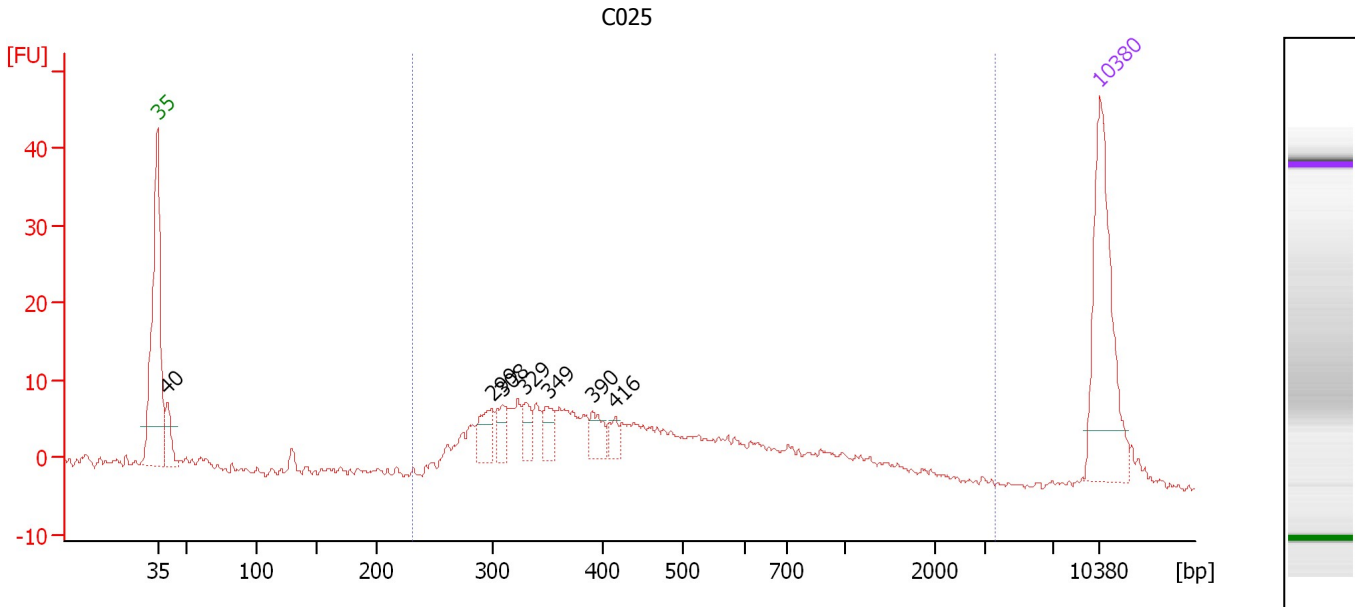
Region table for sample 4 : C024

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	5,719.5	454	1,333.94	1,841	664.9	77	58.8	■

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 5 : C025

Number of peaks found: 7 Corr. Area 1: 238.7
 Noise: 0.4

Peak table for sample 5 : C025

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	40	20.96	794.3	
3	299	20.34	103.2	
4	308	13.82	68.0	
5	329	12.43	57.2	
6	349	14.46	62.7	
7	390	14.65	56.9	
8	416	9.05	33.0	
9	10,380	75.00	10.9	Upper Marker

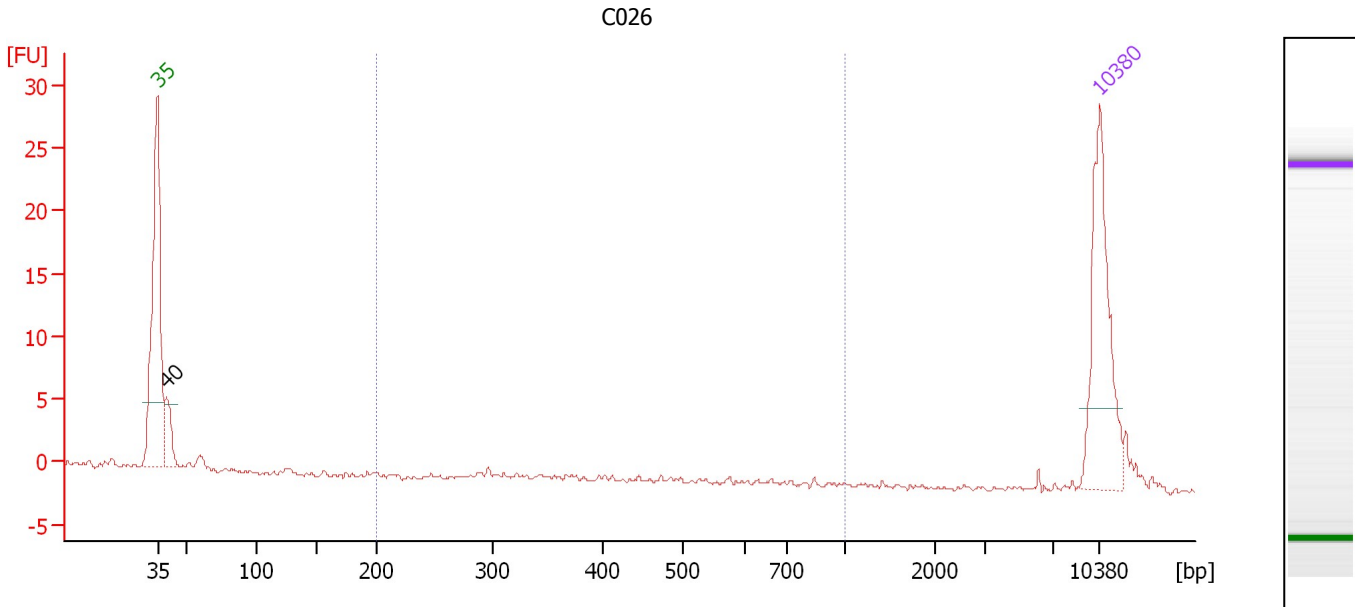
Region table for sample 5 : C025

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
231	1,457.0	549	391.65	3,583	238.7	88	68.6	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 6 : C026

Number of peaks found: 1 Corr. Area 1: 0.3
 Noise: 0.2

Peak table for sample 6 : C026

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	40	26.47	1,012.1	
3	10,380	75.00	10.9	Upper Marker

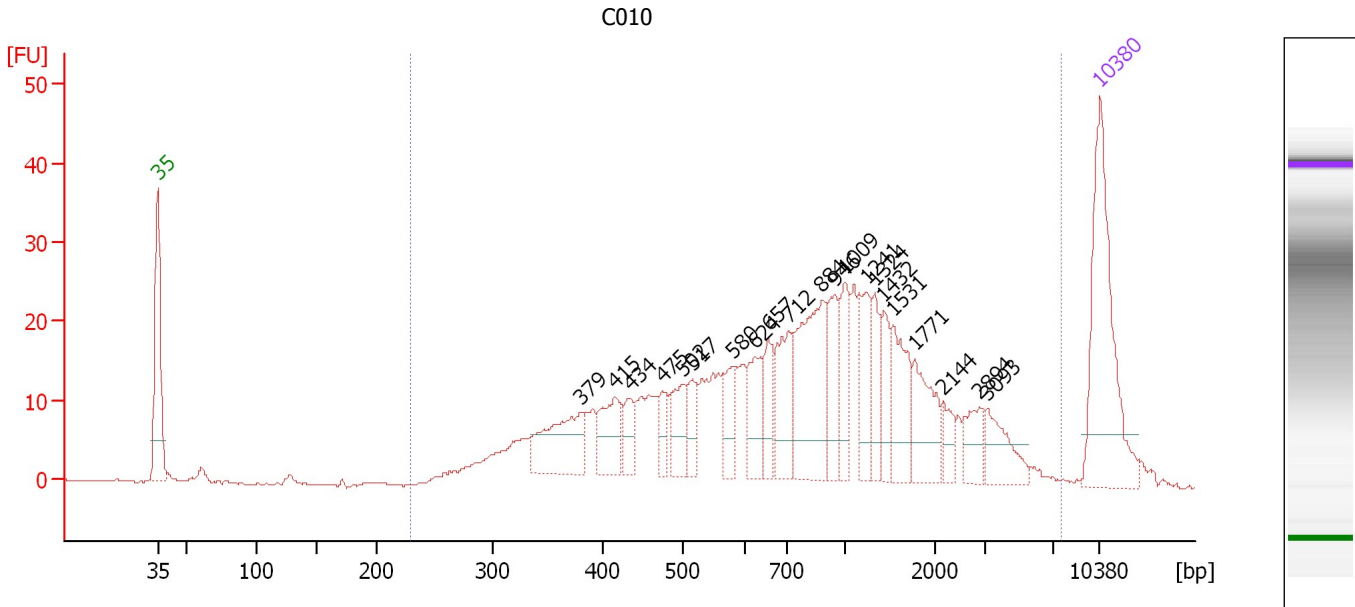
Region table for sample 6 : C026

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	3.2	491	0.82	1,000	0.3	2	42.4	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 7 : C010

Number of peaks found: 21 Corr. Area 1: 601.4
 Noise: 0.1

Peak table for sample 7 : C010

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	379	49.88	199.4	
3	415	29.87	109.1	
4	434	14.65	51.2	
5	475	13.68	43.6	
6	502	22.99	69.4	
7	517	14.99	44.0	
8	580	19.24	50.3	
9	624	24.37	59.1	
10	657	21.46	49.5	
11	712	36.26	77.2	
12	884	70.14	120.3	
13	946	27.39	43.9	
14	1,009	24.34	36.5	
15	1,241	24.36	29.7	
16	1,324	19.85	22.7	
17	1,432	17.87	18.9	
18	1,531	30.68	30.4	
19	1,771	30.00	25.7	
20	2,144	9.41	6.7	
21	2,894	14.33	7.5	
22	3,093	20.04	9.8	
23	10,380	75.00	10.9	Upper Marker


Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...

... Region table for sample 7 :

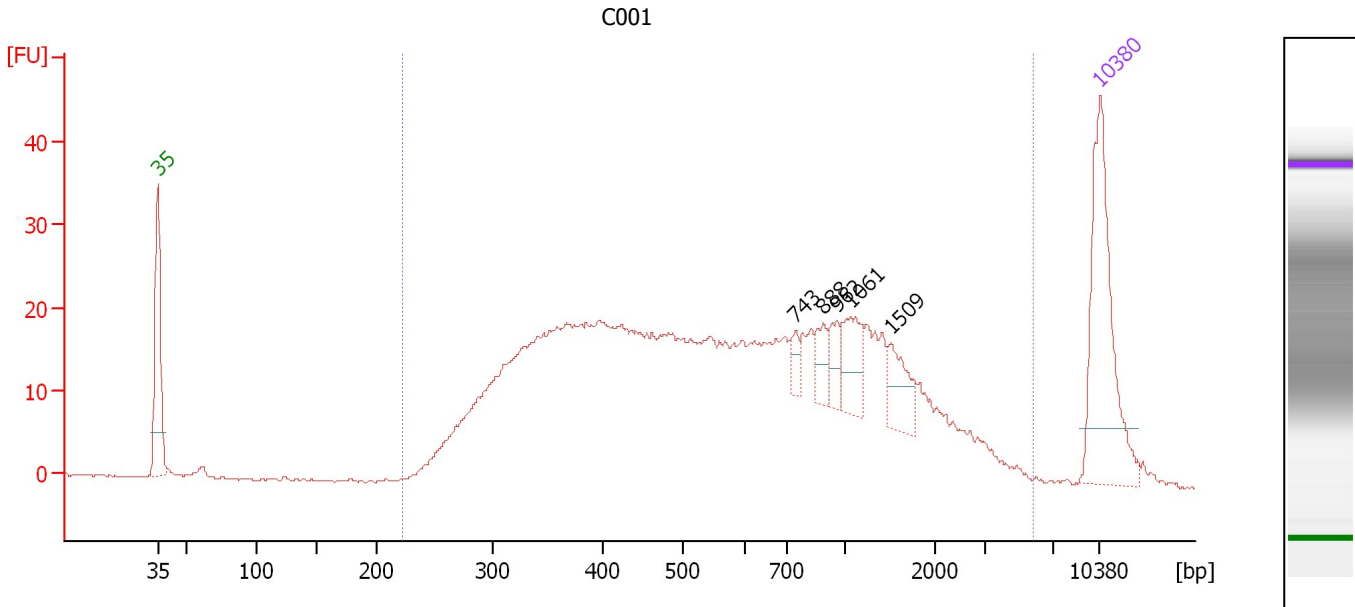
C010

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Co lor
230	1,981.3	1,124	819.77	7,534	601.4	97	89.5	

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 8 : C001

Number of peaks found: 5 Corr. Area 1: 736.1
 Noise: 0.1

Peak table for sample 8 : C001

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	743	8.21	16.7	
3	888	12.48	21.3	
4	962	13.22	20.8	
5	1,061	22.53	32.2	
6	1,509	20.13	20.2	
7	10,380	75.00	10.9	Upper Marker

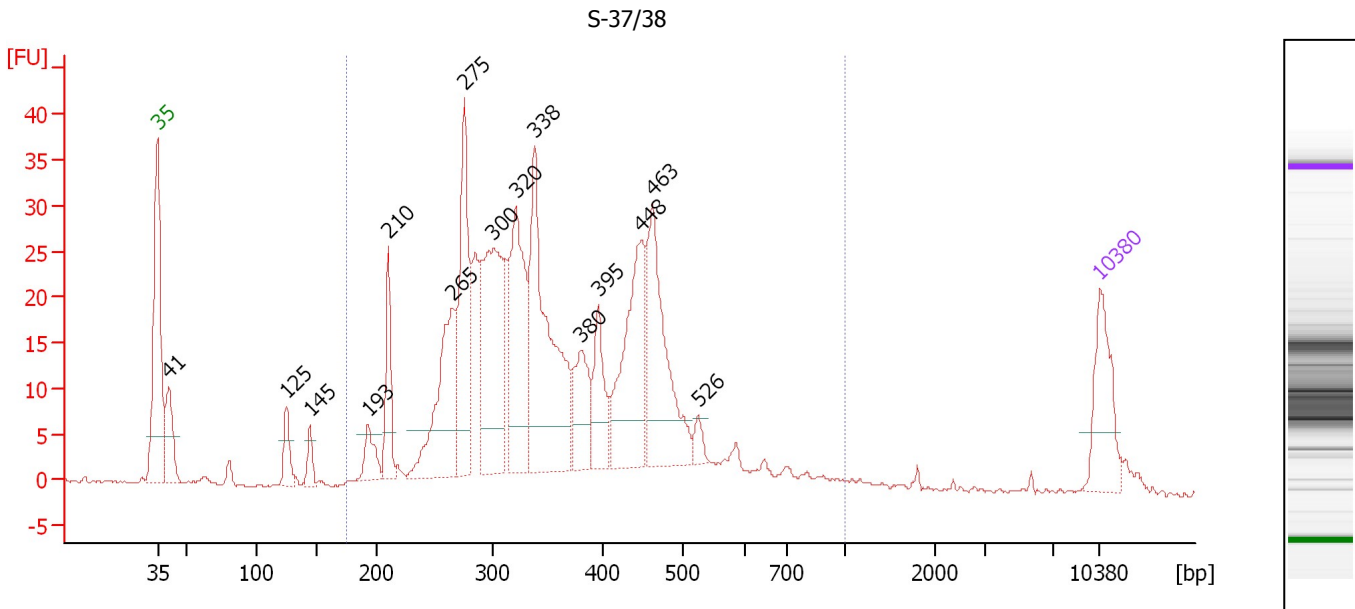
Region table for sample 8 : C001

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
223	3,398.1	809	1,097.34	5,868	736.1	98	85.3	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 9 : S-37/38

Number of peaks found: 15 Corr. Area 1: 562.1
 Noise: 0.2

Peak table for sample 9 : S-37/38

Peak	Size [bp]	Conc. [pg/µl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	41	76.37	2,855.1	
3	125	41.54	503.0	
4	145	25.68	269.0	
5	193	39.82	312.7	
6	210	82.16	591.7	
7	265	196.77	1,126.2	
8	275	198.35	1,092.0	
9	300	254.83	1,286.7	
10	320	210.95	997.7	
11	338	315.36	1,414.4	
12	380	82.87	330.6	
13	395	76.66	293.9	
14	448	195.86	661.7	
15	463	202.20	661.7	
16	526	15.87	45.8	
17	10,380	75.00	10.9	Upper Marker

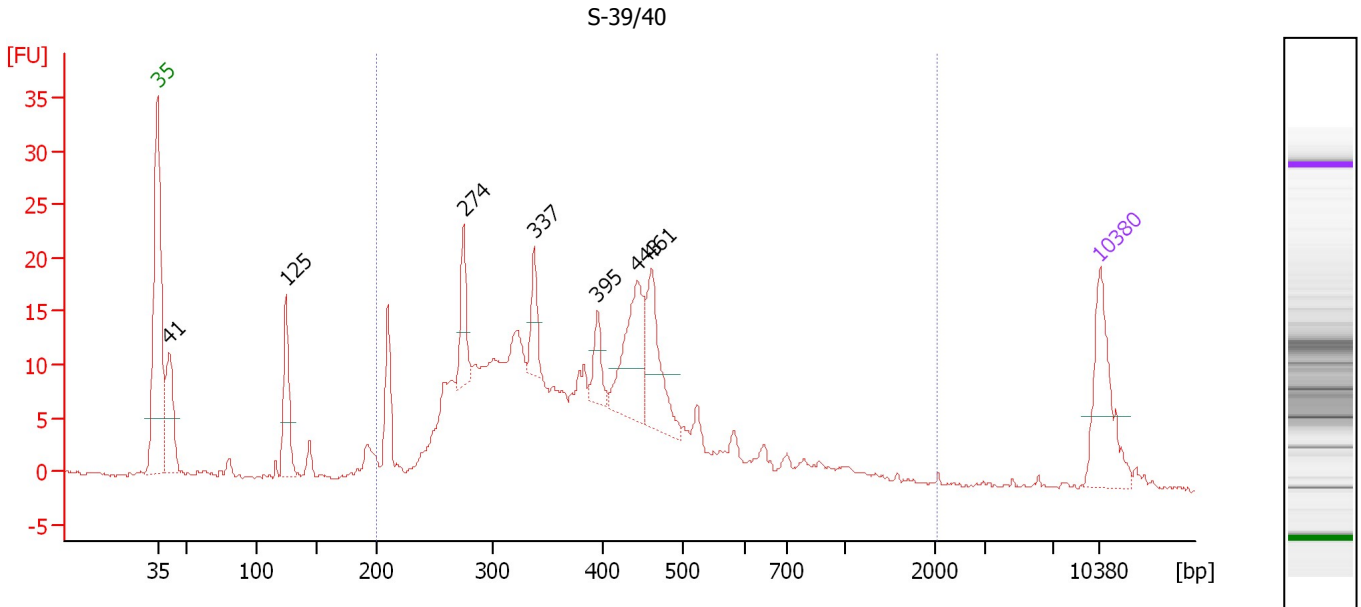
Region table for sample 9 : S-37/38

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/µl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
176	10,716.9	369	2,347.63	1,000	562.1	93	29.9	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 10 : S-39/40

Number of peaks found: 7 Corr. Area 1: 335.8
 Noise: 0.2

Peak table for sample 10 : S-39/40

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	41	92.80	3,430.7	
3	125	85.90	1,042.0	
4	274	52.54	290.0	
5	337	36.91	166.0	
6	395	28.90	110.9	
7	443	108.69	372.0	
8	461	88.47	290.6	
9	10,380	75.00	10.9	Upper Marker

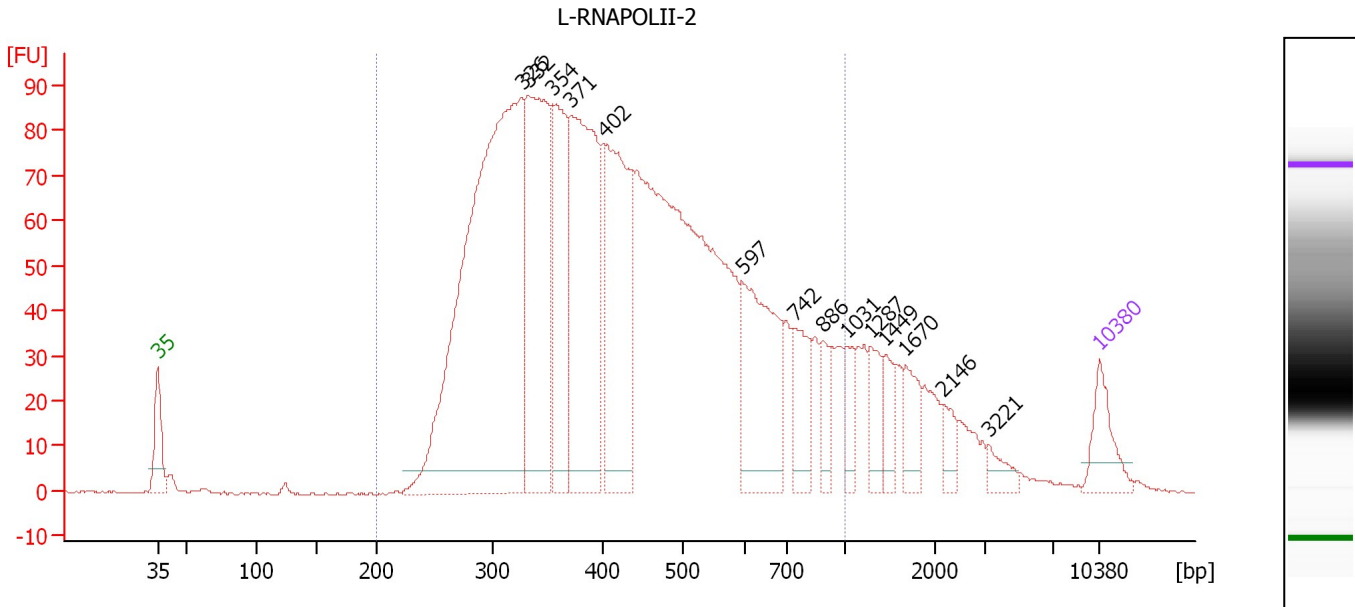
Region table for sample 10 : S-39/40

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	6,512.9	416	1,514.09	2,031	335.8	87	47.8	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

Electropherogram Summary Continued ...



Overall Results for sample 11 : L-RNAPOLII-2

Number of peaks found: 14 Corr. Area 1: 2,271.0
 Noise: 0.2

Peak table for sample 11 : L-RNAPOLII-2

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	326	1,656.34	7,693.7	
3	332	638.31	2,914.2	
4	354	376.73	1,613.0	
5	371	691.69	2,825.5	
6	402	537.84	2,027.1	
7	597	343.91	873.3	
8	742	129.05	263.6	
9	886	59.79	102.2	
10	1,031	54.31	79.8	
11	1,287	69.83	82.2	
12	1,449	56.48	59.1	
13	1,670	71.81	65.2	
14	2,146	39.05	27.6	
15	3,221	28.60	13.5	
16	10,380	75.00	10.9	Upper Marker

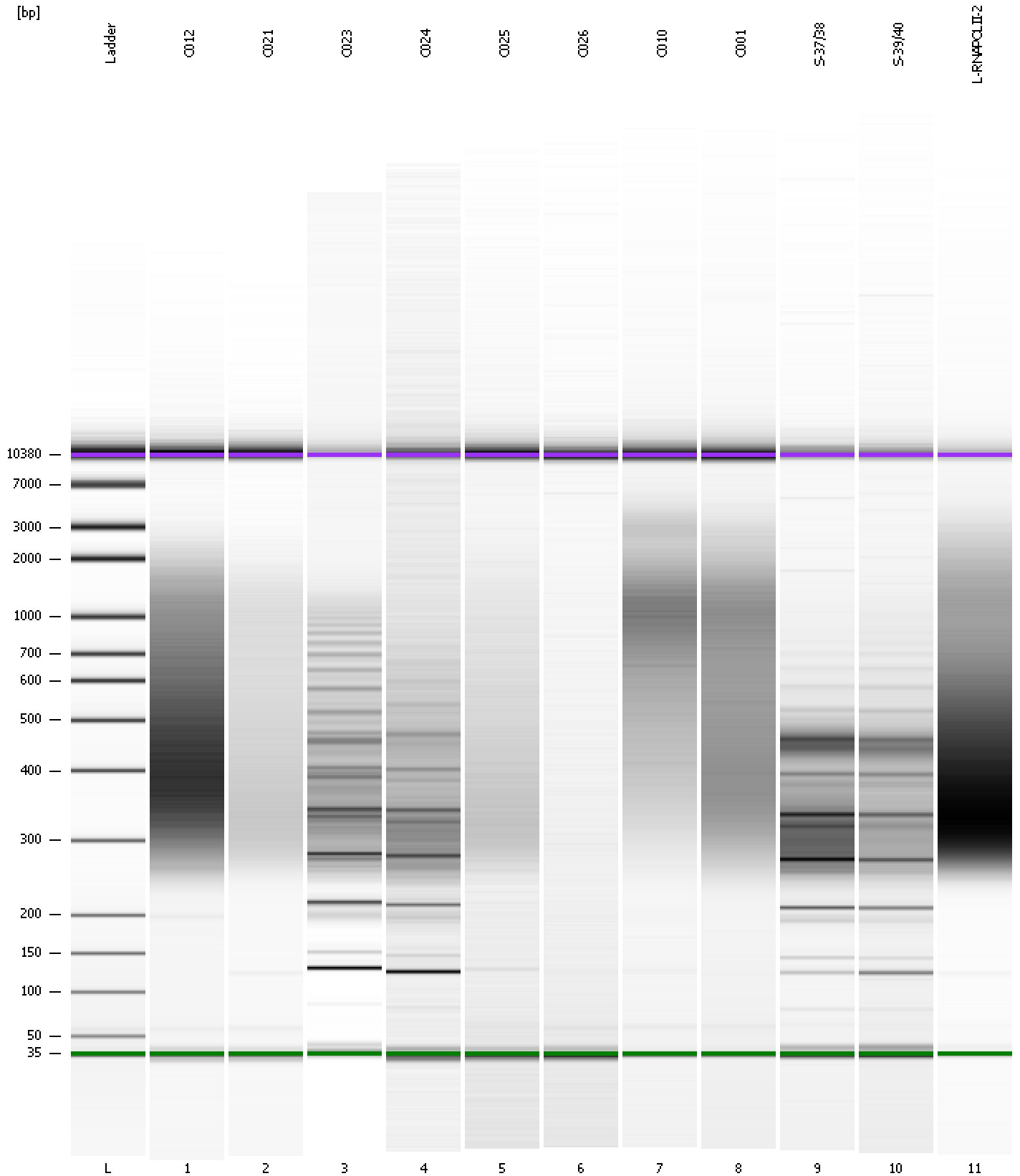
Region table for sample 11 : L-RNAPOLII-2

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	24,365.5	449	6,277.72	1,000	2,271.0	88	35.3	Blue

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

Gel Image

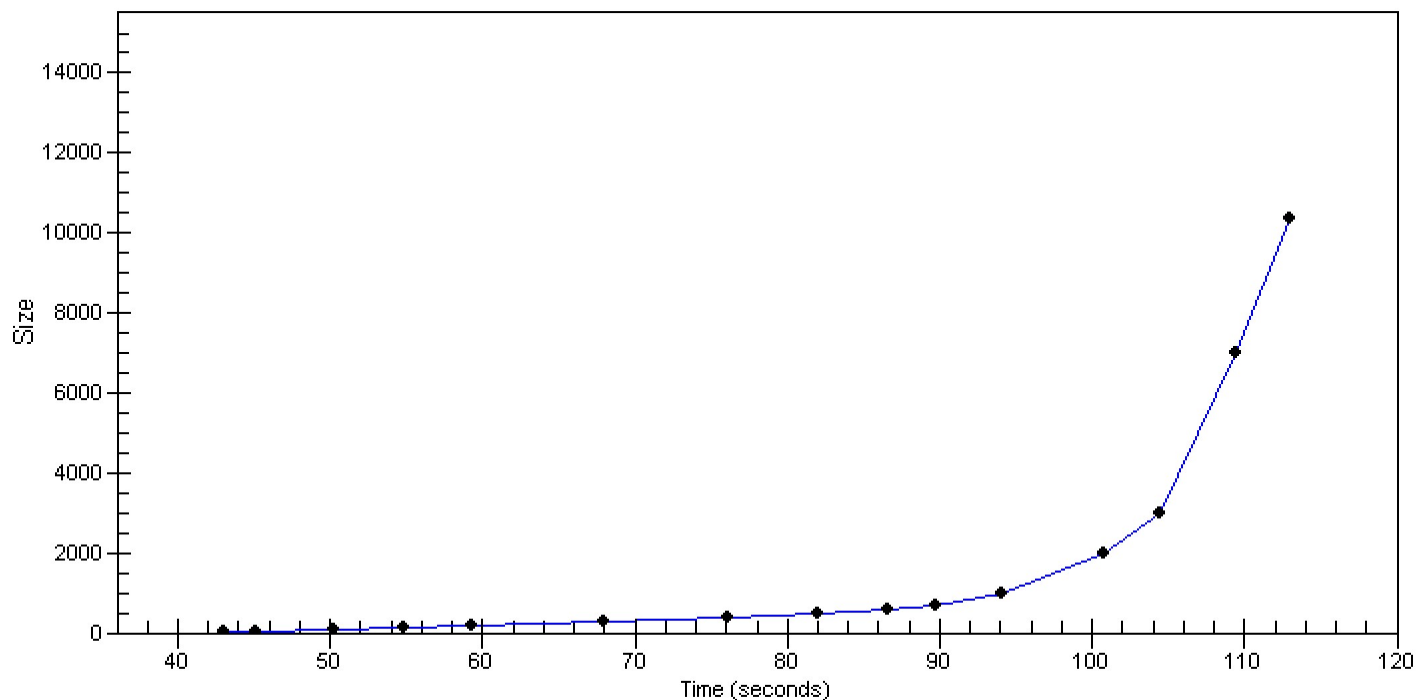


Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
Modified: 3/5/2012 11:21:38 AM

Curves

Standard Curve



Assay Class: High Sensitivity DNA Assay
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad

Created: 3/5/2012 10:40:15 AM
 Modified: 3/5/2012 11:21:38 AM

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		3/5/2012 11:21:33 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2012-03-05\2012-03-05_002.xad)		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		3/5/2012 10:40:20 AM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1