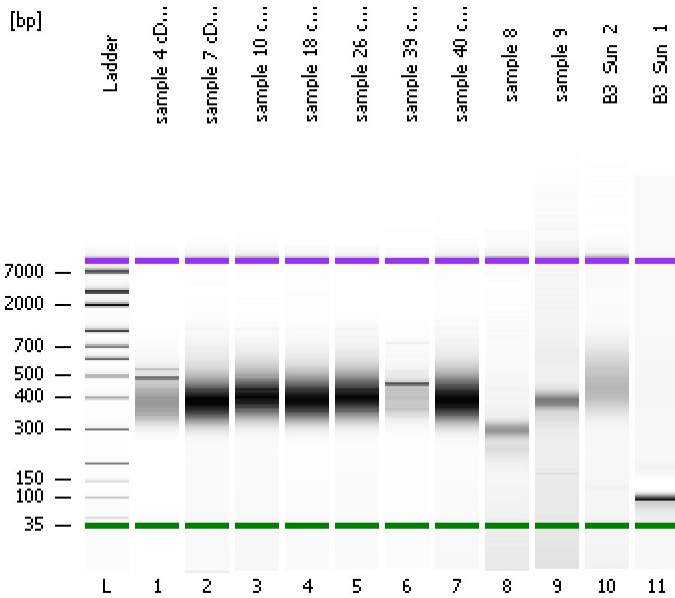


Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
Modified: 4/16/2013 11:04:10 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

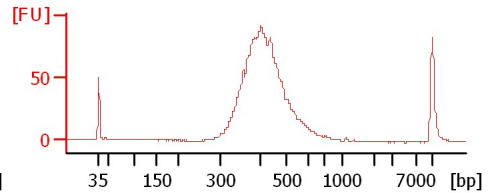
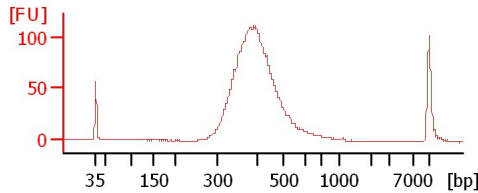
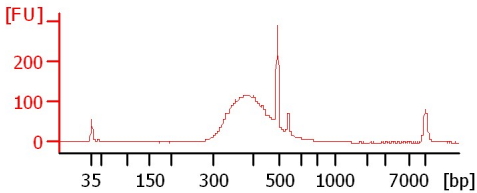
Chip Information:

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

sample 4 cDNA Lib 1:4

sample 7 cDNA Lib 1:6

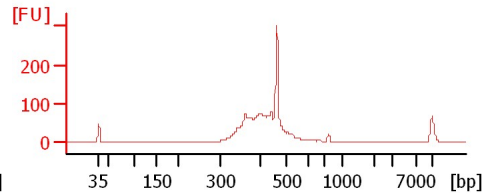
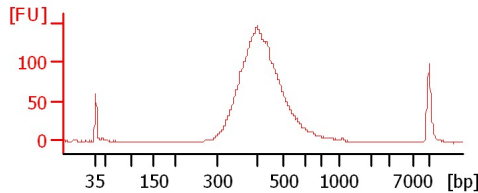
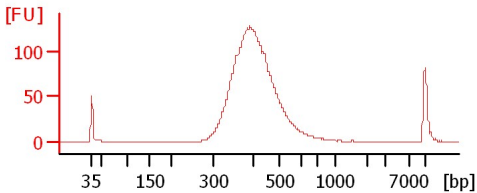
sample 10 cDNA Lib 1:8



sample 18 cDNA Lib 1:5

sample 26 cDNA Lib 1:3

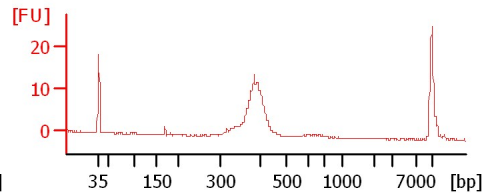
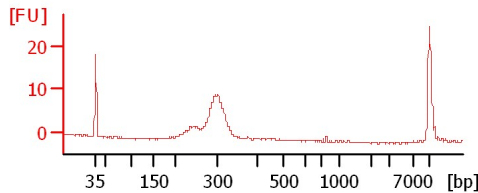
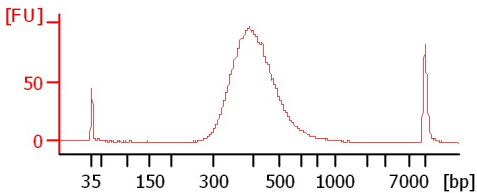
sample 39 cDNA Lib 1:7



sample 40 cDNA Lib 1:5

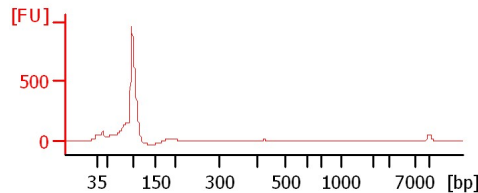
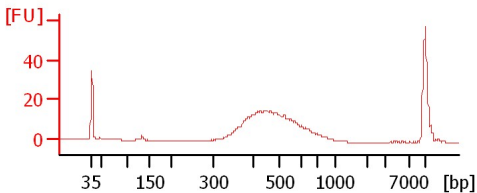
sample 8

sample 9



B3\_Sun\_2

B3\_Sun\_1



Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
Modified: 4/16/2013 11:04:10 AM

**Electrophoresis File Run Summary (Chip Summary)**

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
sample 4 cDNA Lib 1:4		<input type="checkbox"/>	✓			
sample 7 cDNA Lib 1:6		<input type="checkbox"/>	✓			
sample 10 cDNA Lib 1:8		<input type="checkbox"/>	✓			
sample 18 cDNA Lib 1:5		<input type="checkbox"/>	✓			
sample 26 cDNA Lib 1:3		<input type="checkbox"/>	✓			
sample 39 cDNA Lib 1:7		<input type="checkbox"/>	✓			
sample 40 cDNA Lib 1:5		<input type="checkbox"/>	✓			
sample 8		<input type="checkbox"/>	✓			
sample 9		<input type="checkbox"/>	✓			
B3_Sun_2		<input type="checkbox"/>	✓			
B3_Sun_1		<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\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 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

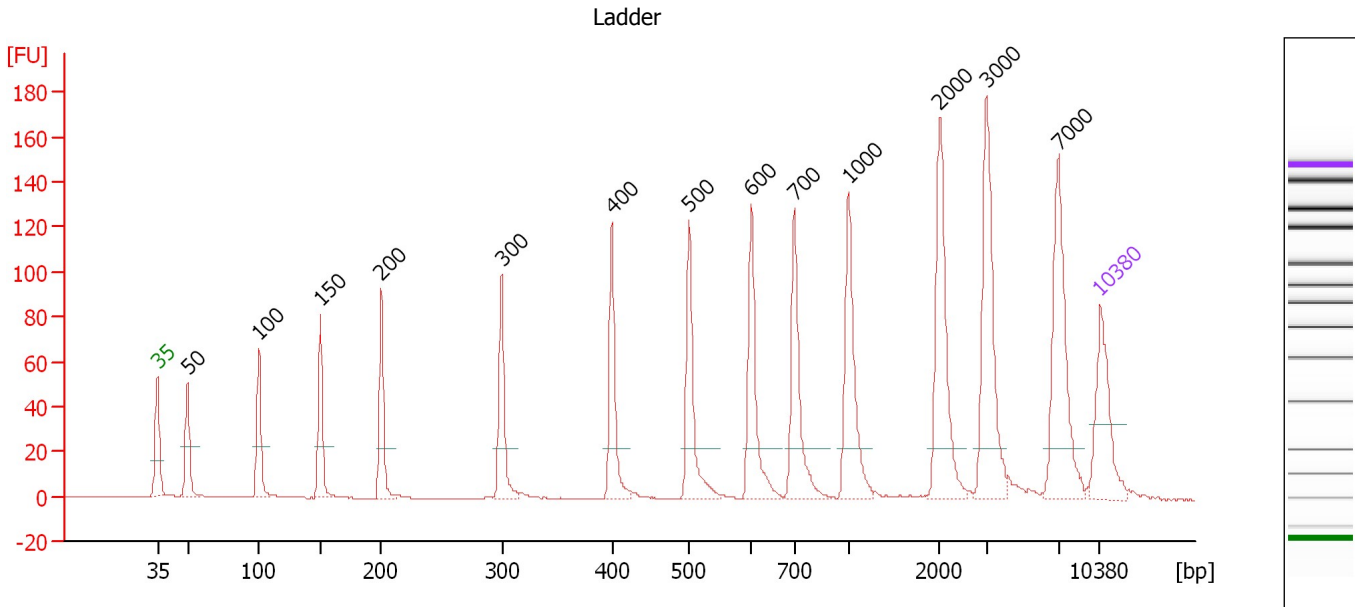
**Ladder**

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\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary**



**Overall Results for Ladder**

Noise: 0.1

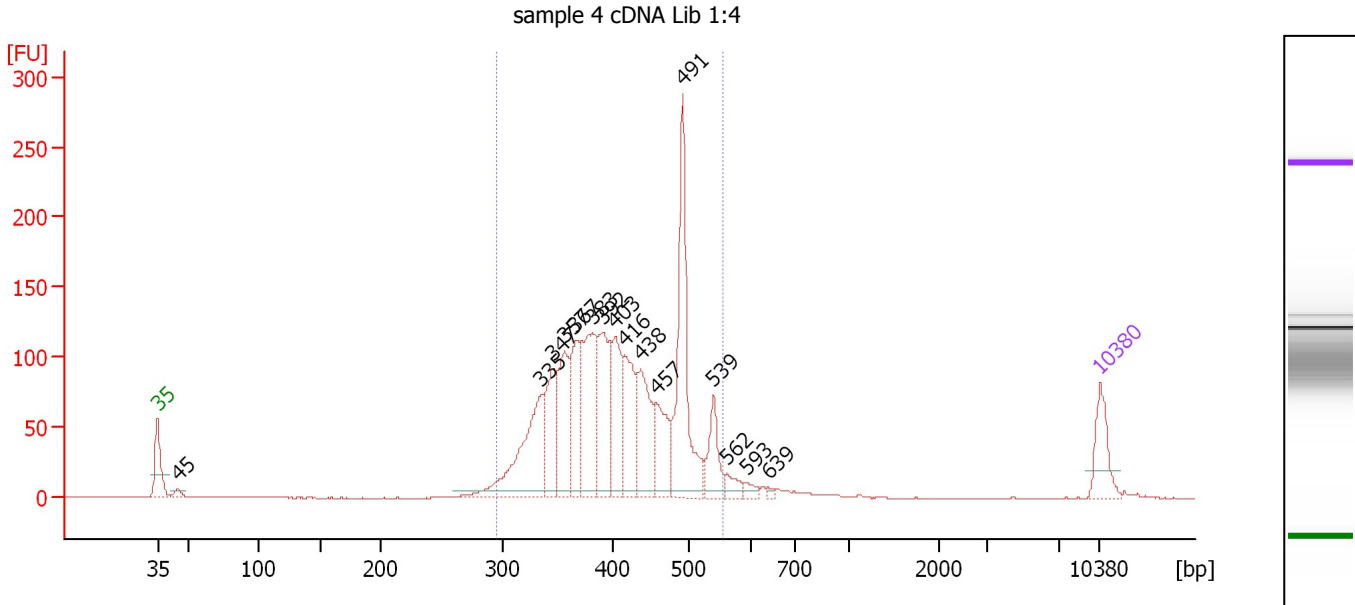
**Peak table for Ladder**

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\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 1 : sample 4 cDNA Lib 1:4**

Number of peaks found: 16                      Corr. Area 1: 1,776.5  
 Noise: 0.2

**Peak table for sample 1 : sample 4 cDNA Lib 1:4**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	45	17.06	574.3	
3	335	318.79	1,441.9	
4	347	172.93	755.6	
5	357	188.37	799.6	
6	367	161.95	668.4	
7	383	273.28	1,082.2	
8	392	220.33	852.3	
9	403	169.32	635.9	
10	416	170.98	622.1	
11	438	197.54	683.7	
12	457	125.68	416.8	
13	491	390.12	1,203.2	
14	539	96.95	272.7	
15	562	31.09	83.9	
16	593	16.31	41.7	
17	639	6.31	15.0	
18	10,380	75.00	10.9	Upper Marker

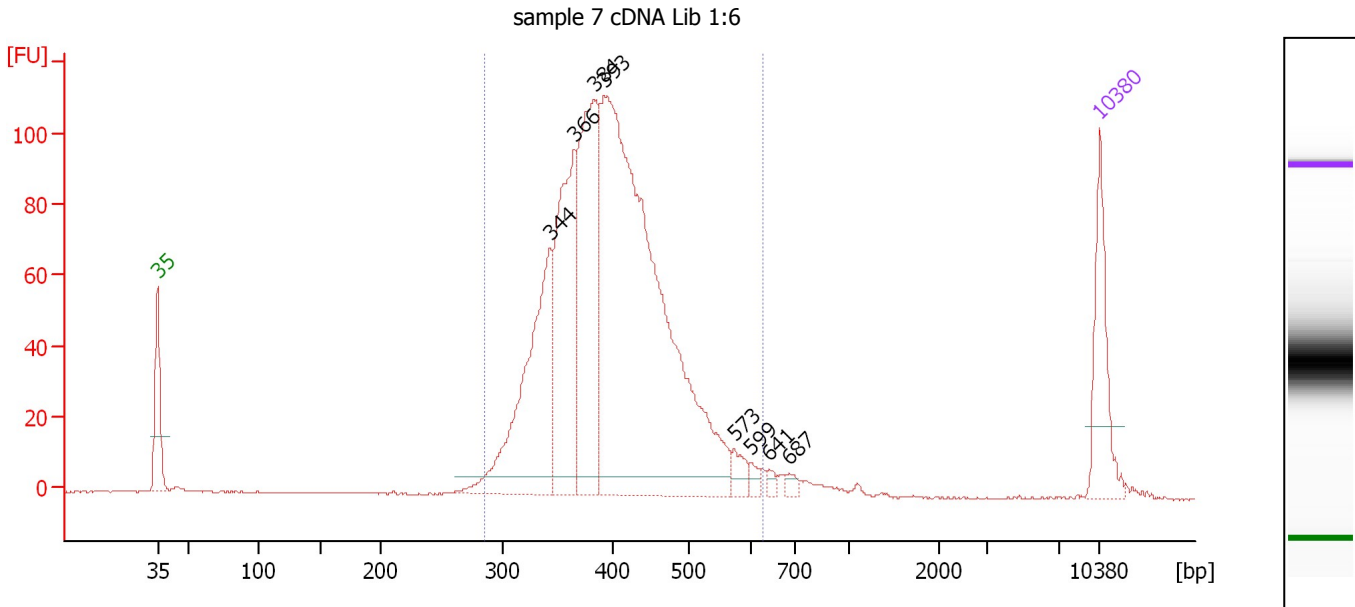
**Region table for sample 1 : sample 4 cDNA Lib 1:4**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
296	555	412	9,467.0	2,506.89	1,776.5	95	14.8	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 2 : sample 7 cDNA Lib 1:6**

Number of peaks found: 8                      Corr. Area 1: 1,470.3  
 Noise: 0.2

**Peak table for sample 2 : sample 7 cDNA Lib 1:6**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	344	293.36	1,292.9	
3	366	255.92	1,060.1	
4	384	288.14	1,137.2	
5	393	896.41	3,458.5	
6	573	19.10	50.5	
7	599	8.63	21.8	
8	641	6.25	14.8	
9	687	6.95	15.3	
10	10,380	75.00	10.9	Upper Marker

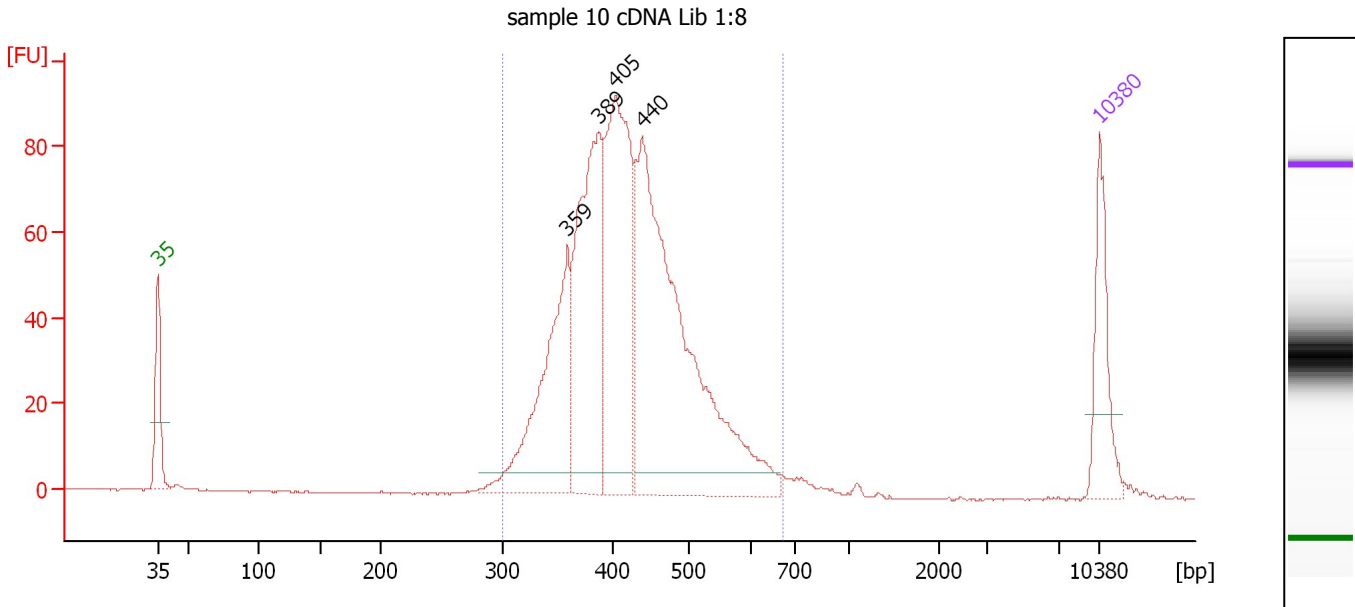
**Region table for sample 2 : sample 7 cDNA Lib 1:6**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
285	630	406	6,718.5	1,752.37	1,470.3	94	15.3	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 3 : sample 10 cDNA Lib 1:8**

Number of peaks found: 4                      Corr. Area 1: 1,122.0  
 Noise: 0.2

**Peak table for sample 3 : sample 10 cDNA Lib 1:8**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	359	263.75	1,112.4	
3	389	318.66	1,242.3	
4	405	349.86	1,309.5	
5	440	608.51	2,097.7	
6	10,380	75.00	10.9	Upper Marker

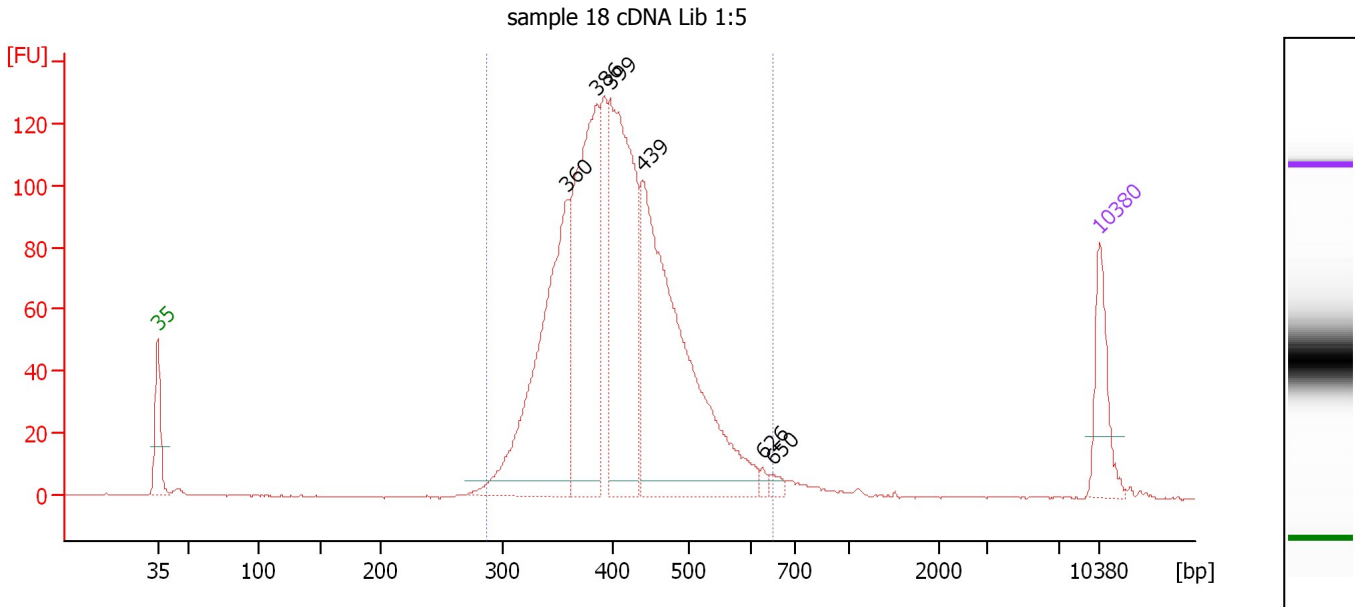
**Region table for sample 3 : sample 10 cDNA Lib 1:8**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
301	675	425	5,571.6	1,520.83	1,122.0	97	15.6	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 4 : sample 18 cDNA Lib 1:5**

Number of peaks found: 6                      Corr. Area 1: 1,658.2  
 Noise: 0.2

**Peak table for sample 4 : sample 18 cDNA Lib 1:5**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	360	500.51	2,109.5	
3	386	473.41	1,856.6	
4	399	493.53	1,876.0	
5	439	663.74	2,291.7	
6	626	7.49	18.1	
7	650	11.25	26.2	
8	10,380	75.00	10.9	Upper Marker

**Region table for sample 4 : sample 18 cDNA Lib 1:5**

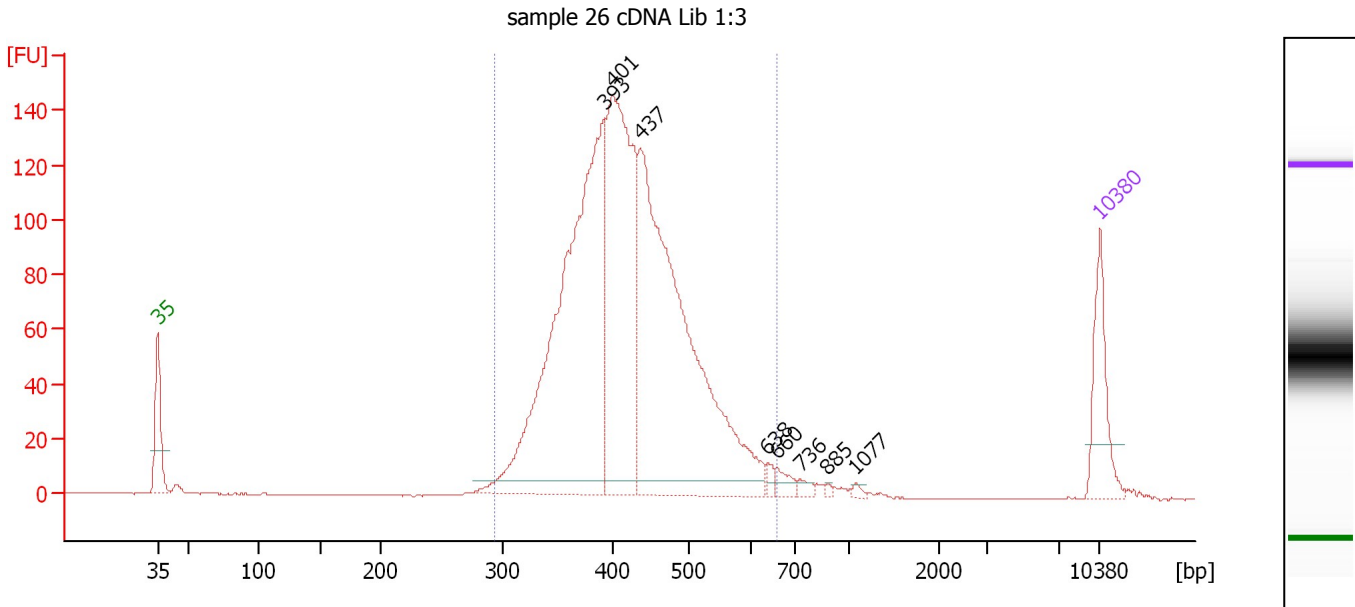
From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
287	651	414	8,610.5	2,289.45	1,658.2	97	15.5	Blue



Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 5 : sample 26 cDNA Lib 1:3**

Number of peaks found: 8                      Corr. Area 1: 1,792.1  
 Noise: 0.2

**Peak table for sample 5 : sample 26 cDNA Lib 1:3**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	393	806.30	3,105.4	
3	401	508.49	1,922.1	
4	437	787.84	2,733.4	
5	638	9.06	21.5	
6	660	16.59	38.1	
7	736	8.88	18.3	
8	885	3.23	5.5	
9	1,077	4.77	6.7	
10	10,380	75.00	10.9	Upper Marker

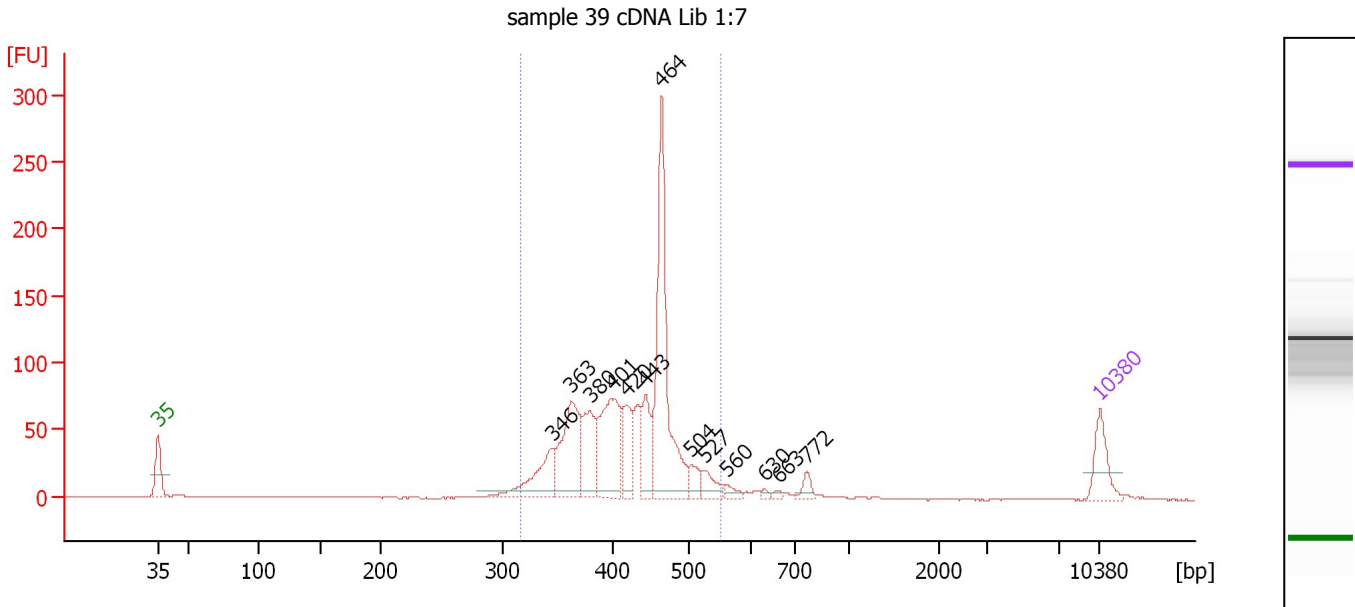
**Region table for sample 5 : sample 26 cDNA Lib 1:3**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
295	658	425	7,870.5	2,145.66	1,792.1	96	15.6	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 6 : sample 39 cDNA Lib 1:7**

Number of peaks found: 13                      Corr. Area 1: 1,060.6  
 Noise: 0.1

**Peak table for sample 6 : sample 39 cDNA Lib 1:7**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	346	158.62	694.5	
3	363	259.80	1,084.0	
4	380	155.65	620.3	
5	401	274.48	1,036.3	
6	420	108.80	392.9	
7	443	124.20	424.7	
8	464	531.20	1,734.8	
9	504	44.00	132.3	
10	527	47.47	136.6	
11	560	18.62	50.4	
12	630	8.11	19.5	
13	663	8.47	19.4	
14	772	25.26	49.6	
15	10,380	75.00	10.9	Upper Marker

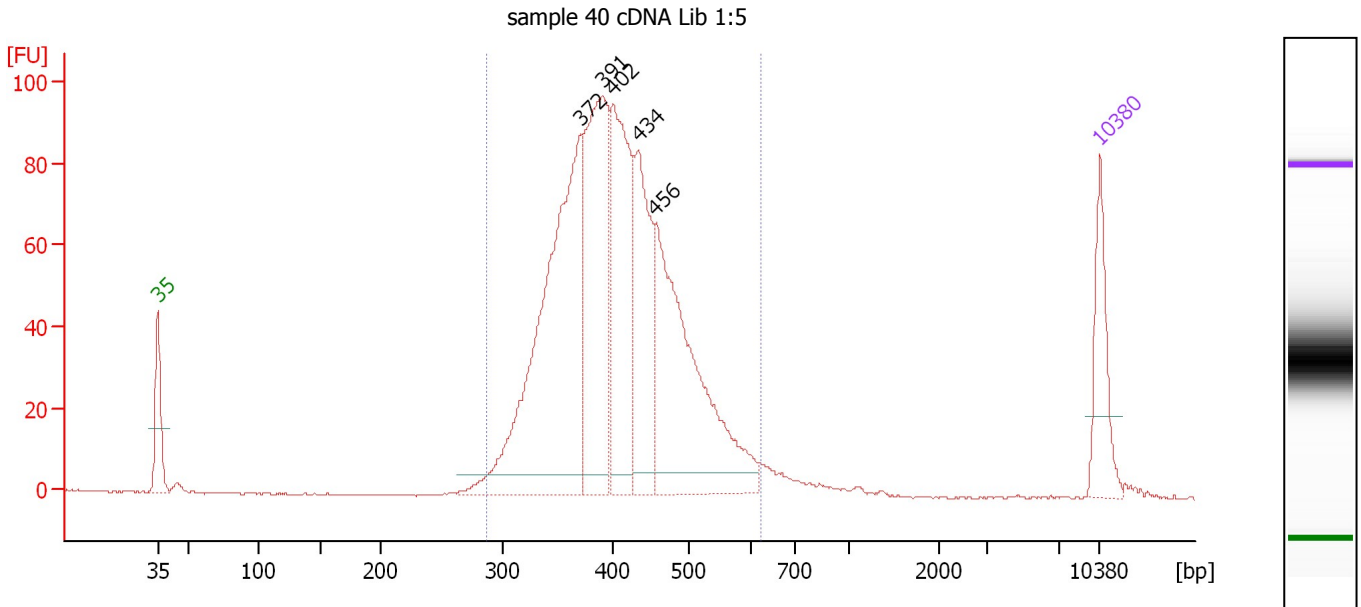
**Region table for sample 6 : sample 39 cDNA Lib 1:7**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
317	551	422	6,521.4	1,785.70	1,060.6	93	11.9	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 7 : sample 40 cDNA Lib 1:5**

Number of peaks found: 5                      Corr. Area 1: 1,363.1  
 Noise: 0.2

**Peak table for sample 7 : sample 40 cDNA Lib 1:5**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	372	613.71	2,501.9	
3	391	373.32	1,447.0	
4	402	295.84	1,116.4	
5	434	218.15	762.3	
6	456	422.20	1,401.4	
7	10,380	75.00	10.9	Upper Marker

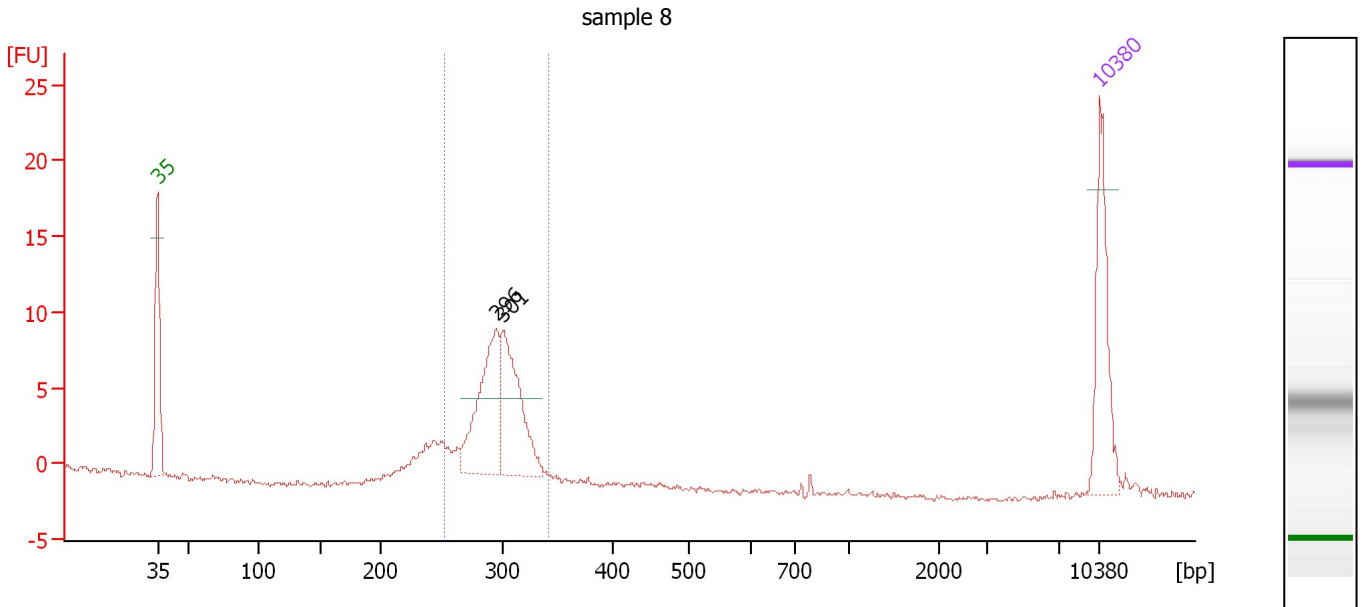
**Region table for sample 7 : sample 40 cDNA Lib 1:5**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
287	622	413	7,354.7	1,947.20	1,363.1	97	15.4	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 8 : sample 8**

Number of peaks found: 2                      Corr. Area 1: 53.7  
 Noise: 0.2

**Peak table for sample 8 : sample 8**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	296	139.29	712.8	
3	301	131.90	664.3	
4	10,380	75.00	10.9	Upper Marker

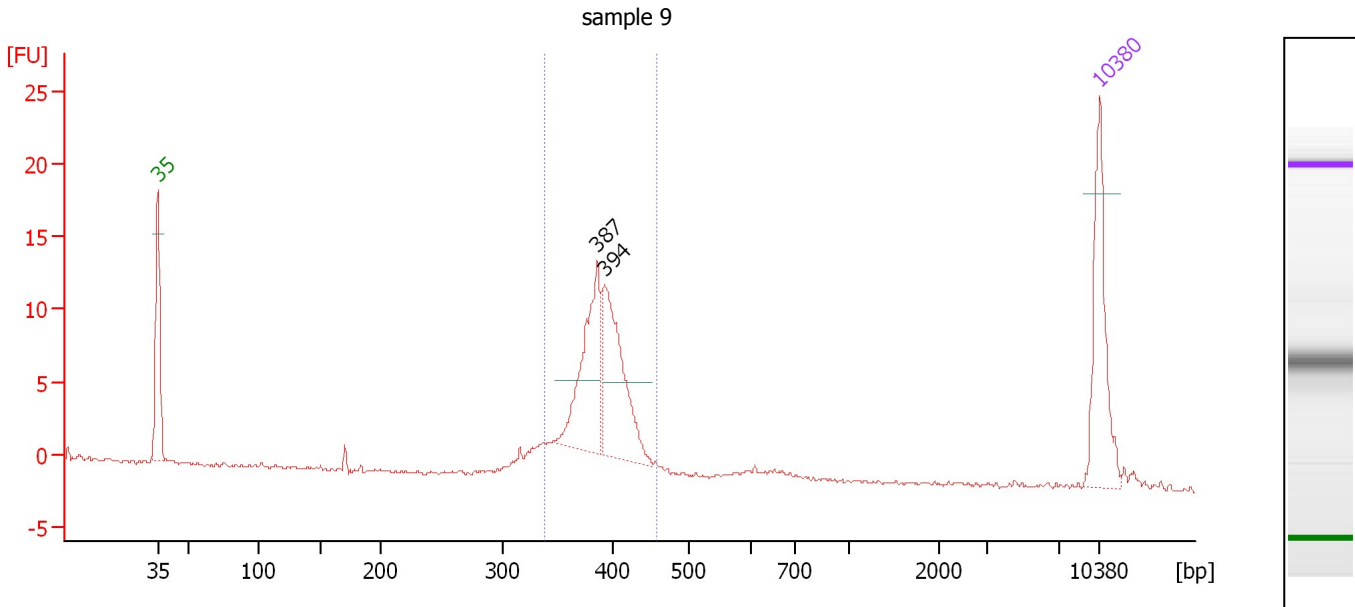
**Region table for sample 8 : sample 8**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
253	342	296	1,468.5	286.37	53.7	88	5.8	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 9 : sample 9**

Number of peaks found: 2                      Corr. Area 1: 65.6  
 Noise: 0.2

**Peak table for sample 9 : sample 9**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	387	114.56	449.0	
3	394	122.29	470.8	
4	10,380	75.00	10.9	Upper Marker

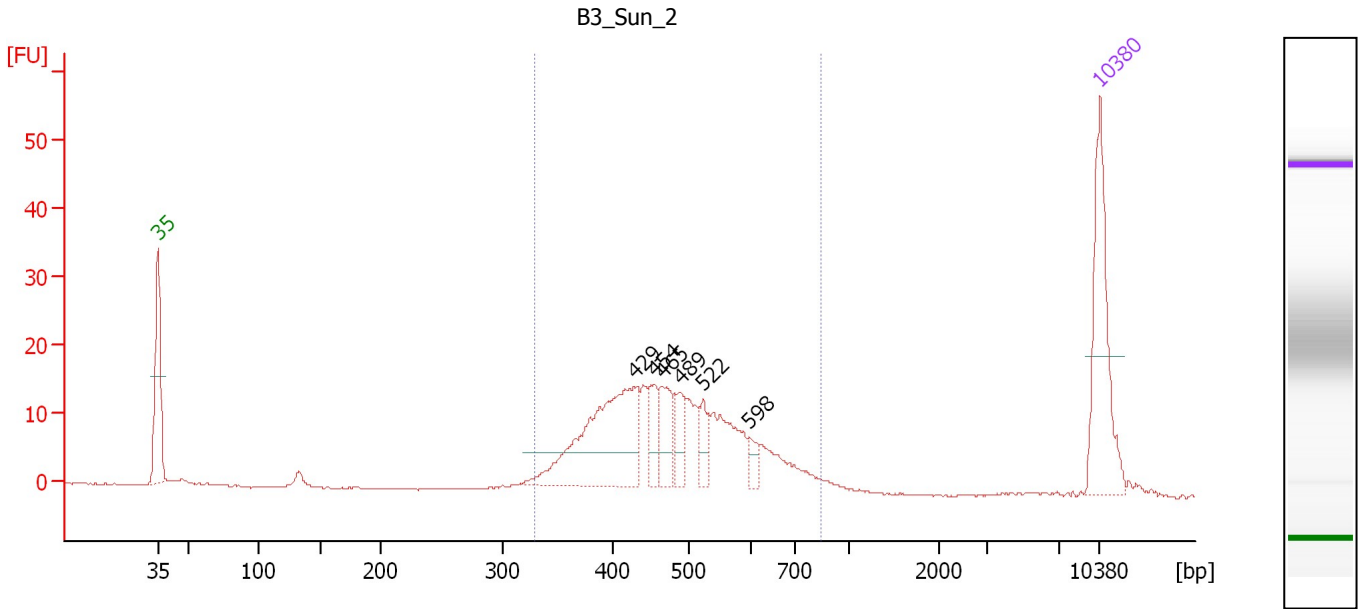
**Region table for sample 9 : sample 9**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
340	458	391	1,175.7	302.40	65.6	89	5.6	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Overall Results for sample 10 : B3 Sun 2**

Number of peaks found: 6                      Corr. Area 1: 237.4  
 Noise: 0.1

**Peak table for sample 10 : B3 Sun 2**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	429	150.57	531.8	
3	454	23.93	79.8	
4	465	31.37	102.2	
5	489	22.93	71.1	
6	522	16.64	48.3	
7	598	9.33	23.7	
8	10,380	75.00	10.9	Upper Marker

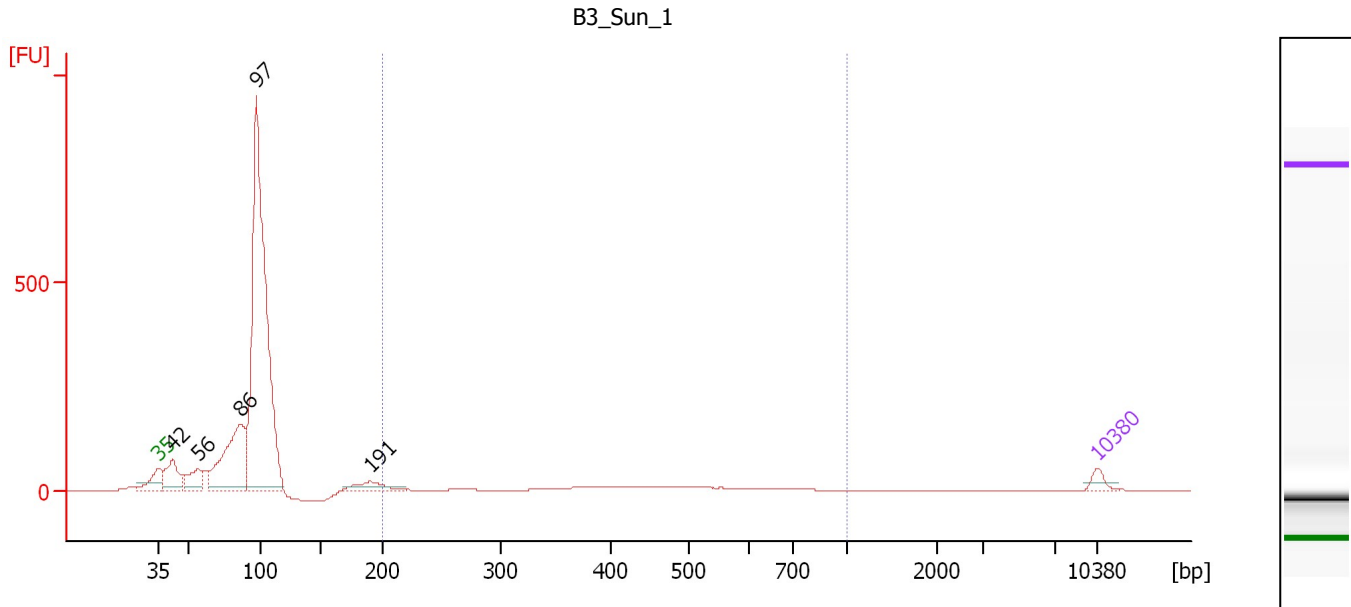
**Region table for sample 10 : B3 Sun 2**

From [bp]	To [bp]	Average Size [bp]	Molarity [pmol/l]	Conc. [pg/μl]	Corr. Area	% of Total	Size distribution in CV [%]	Color
331	852	485	1,397.0	426.49	237.4	95	19.8	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 AM

**Electropherogram Summary Continued ...**



**Setpoint Deviations for sample 11 : B3 Sun 1**

Height Threshold [FU] : 10

**Overall Results for sample 11 : B3 Sun 1**

Number of peaks found: 5                      Corr. Area 1: 201.9  
 Noise: 0.2

**Peak table for sample 11 : B3 Sun 1**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	42	588.10	21,285.0	
3	56	399.39	10,802.9	
4	86	1,769.64	31,061.4	
5	97	6,665.15	103,744.7	
6	191	212.48	1,686.1	
7	10,380	75.00	10.9	Upper Marker

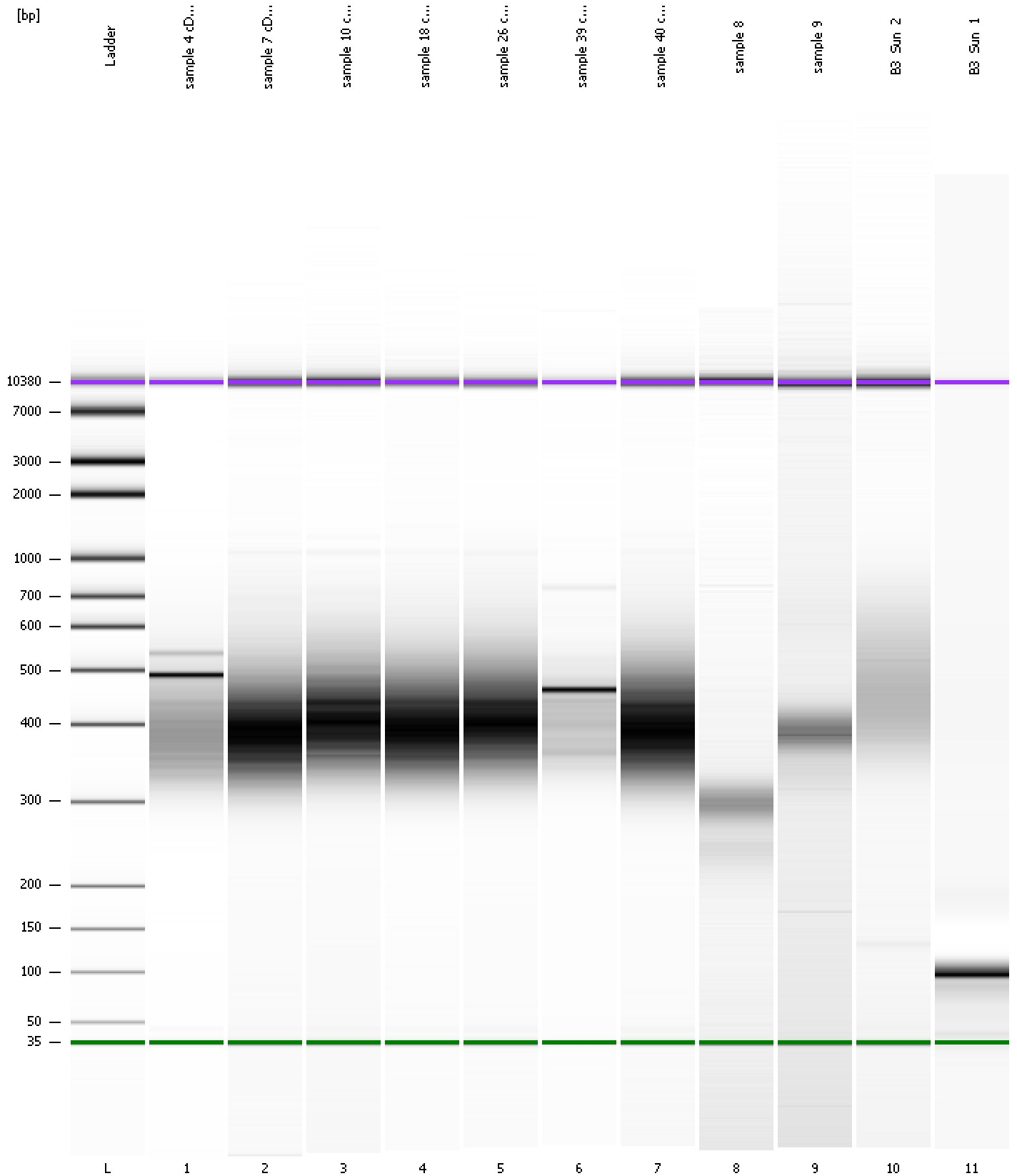
**Region table for sample 11 : B3 Sun 1**

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	453	1,652.6	422.65	201.9	6	30.3	Blue

Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
Modified: 4/16/2013 11:04:10 AM

**Gel Image**





Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2013-04-15\2013-04-15\_005.xad

Created: 4/15/2013 4:39:53 PM  
 Modified: 4/16/2013 11:04:10 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		4/15/2013 5:21:12 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2013-04-15\2013-04-15_005.xad)		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		4/15/2013 4:39:59 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1