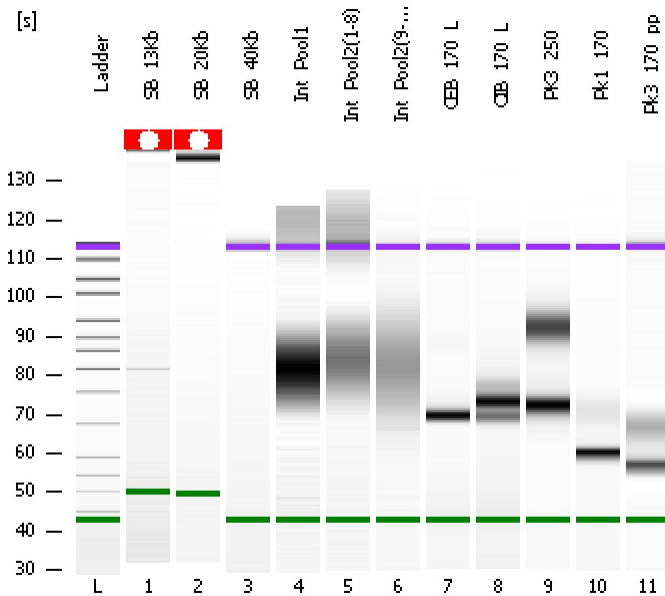


Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 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

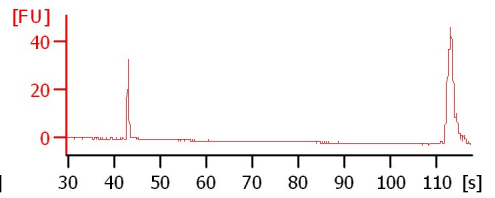
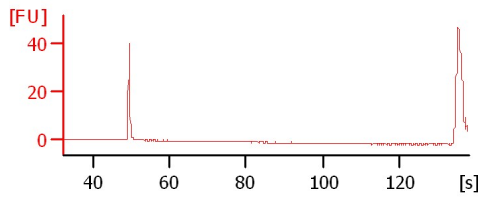
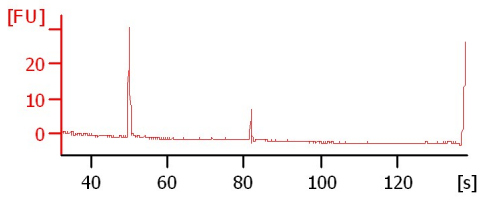
#### Chip Information:

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

SB\_13Kb

SB\_20Kb

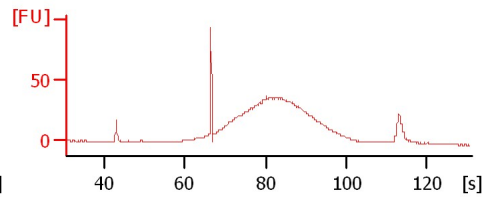
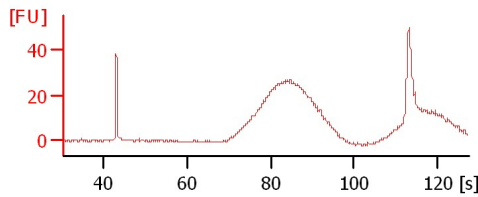
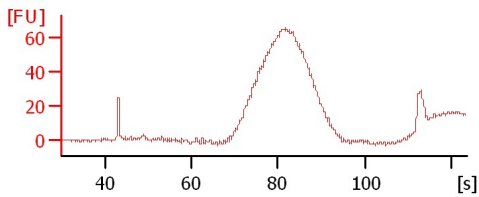
SB\_40Kb



Int\_Pool1

Int\_Pool2(1-8)

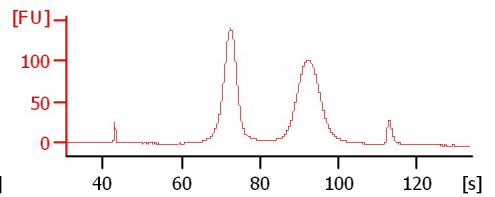
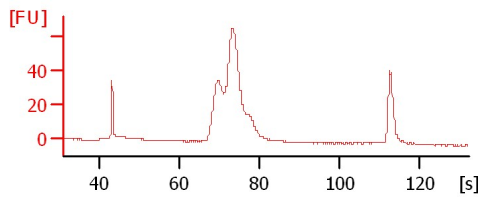
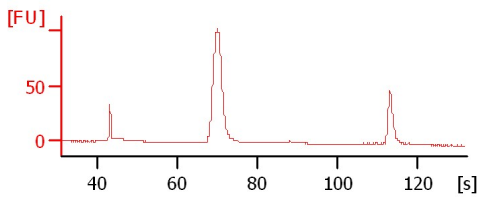
Int\_Pool2(9-48)



CEB\_170\_L

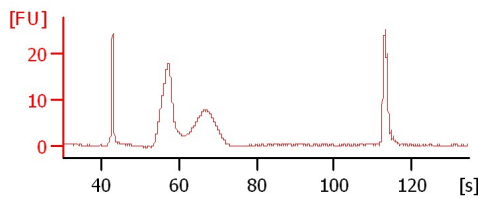
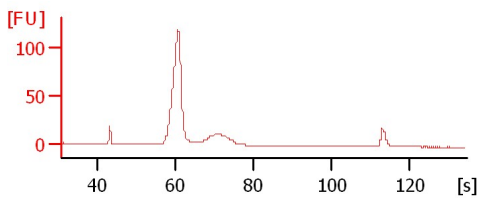
CIB\_170\_L

PK3\_250



Pk1\_170

Pk3\_170\_pp



Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 PM

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

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
SB_13Kb		<input type="checkbox"/>	✓			
SB_20Kb		<input type="checkbox"/>	✓			
SB_40Kb		<input type="checkbox"/>	✓			
Int_Pool1		<input type="checkbox"/>	✓			
Int_Pool2(1-8)		<input type="checkbox"/>	✓			
Int_Pool2(9-48)		<input type="checkbox"/>	✓			
CEB_170_L		<input type="checkbox"/>	✓			
CIB_170_L		<input type="checkbox"/>	✓			
PK3_250		<input type="checkbox"/>	✓			
Pk1_170		<input type="checkbox"/>	✓			
Pk3_170_pp		<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\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 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/ $\mu$ l] : 1950  
Uses Standard Area for Ladder Fragments  
Lower Marker Concentration [pg/ $\mu$ l] : 125  
Upper Marker Concentration [pg/ $\mu$ 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

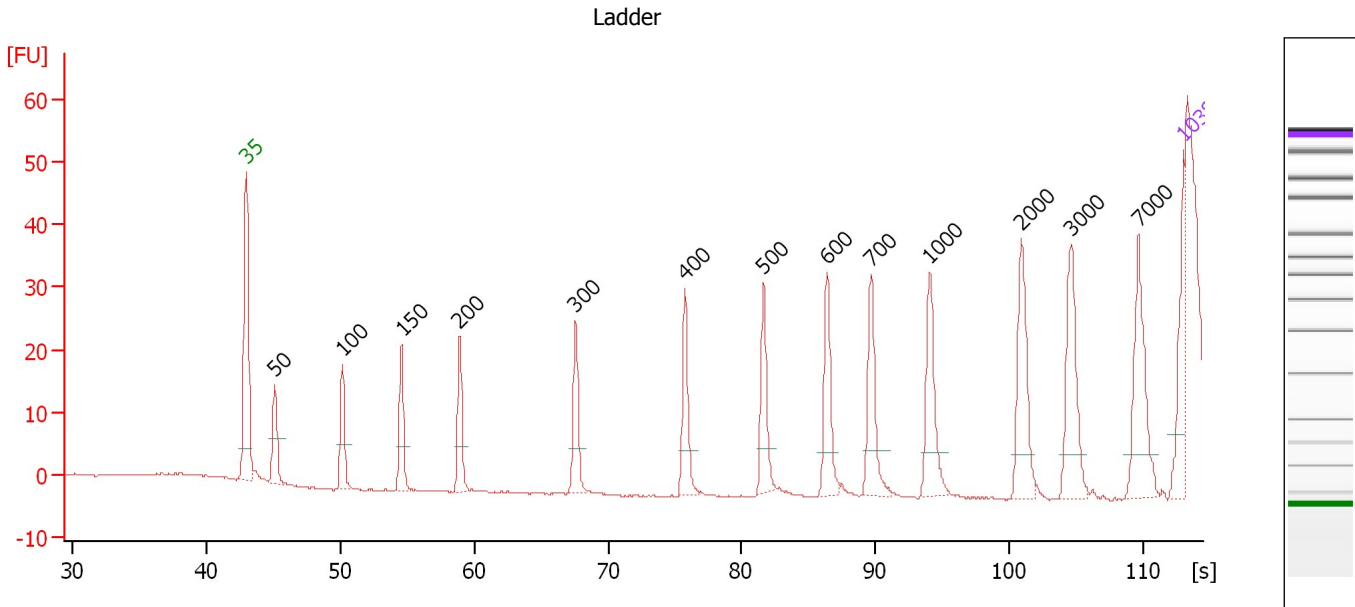
**Ladder**

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\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary**



**Overall Results for Ladder**

Noise: 0.1

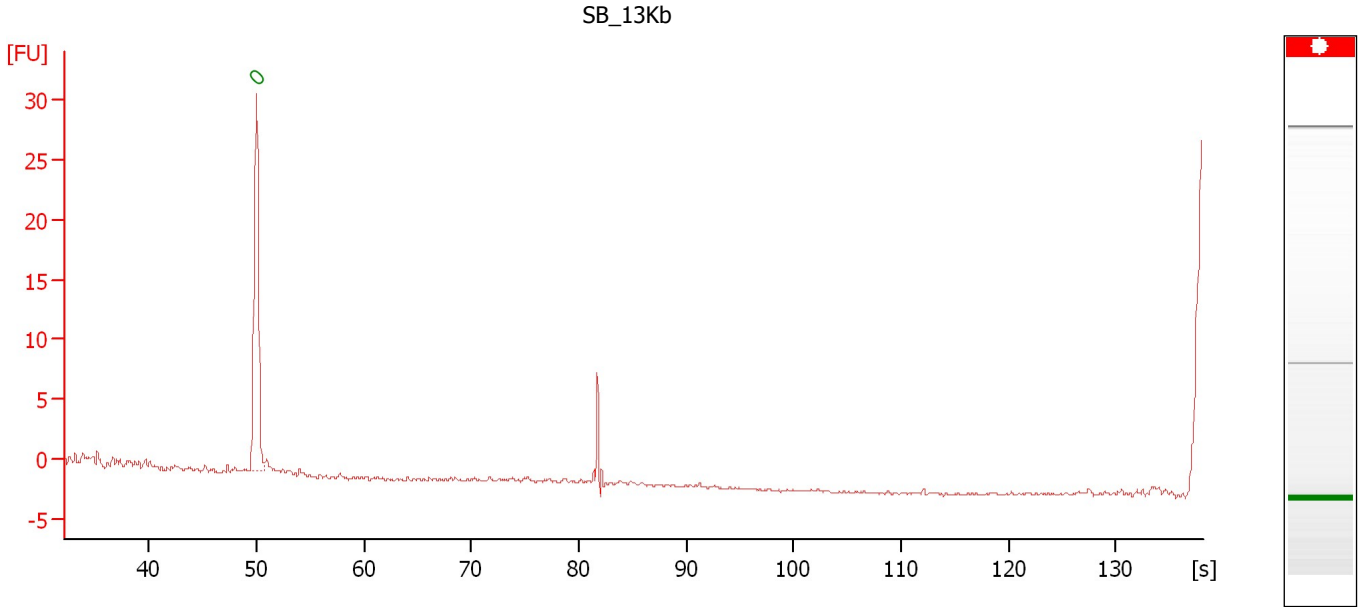
**Peak table for Ladder**

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\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 1 : SB\_13Kb**

Number of peaks found: 0                      Noise: 0.2

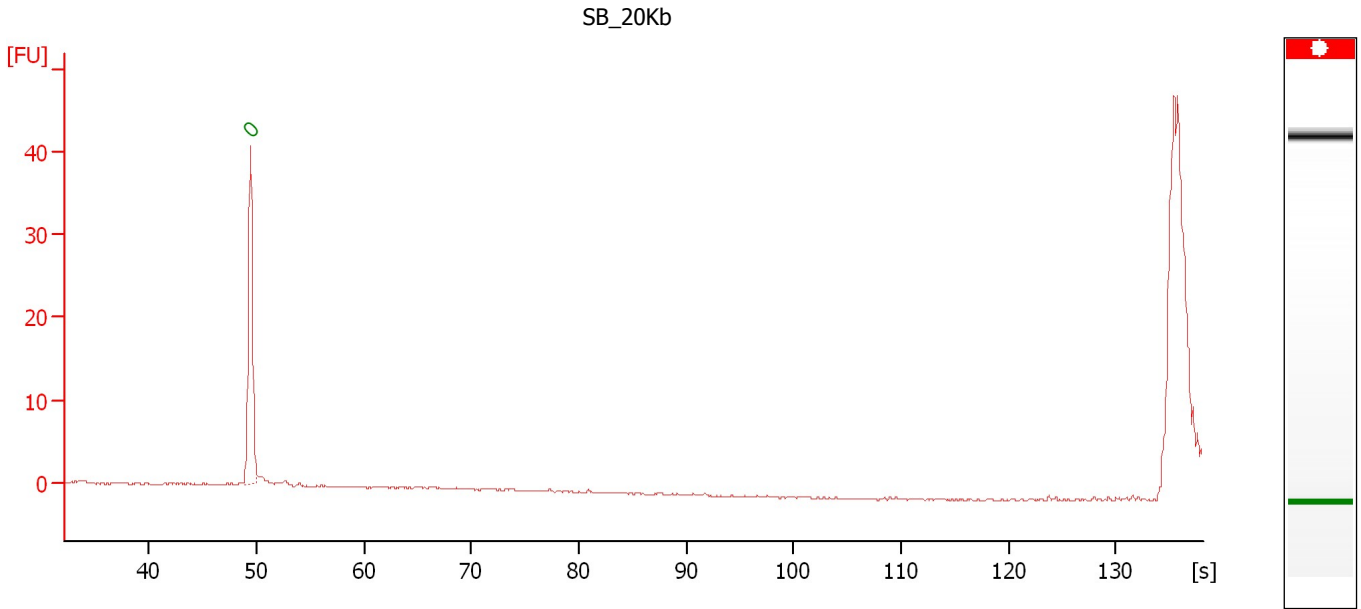
**Peak table for sample 1 : SB\_13Kb**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	0	0.00	0.0	Lower Marker

Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 2 : SB\_20Kb**

Number of peaks found: 0      Noise: 0.1

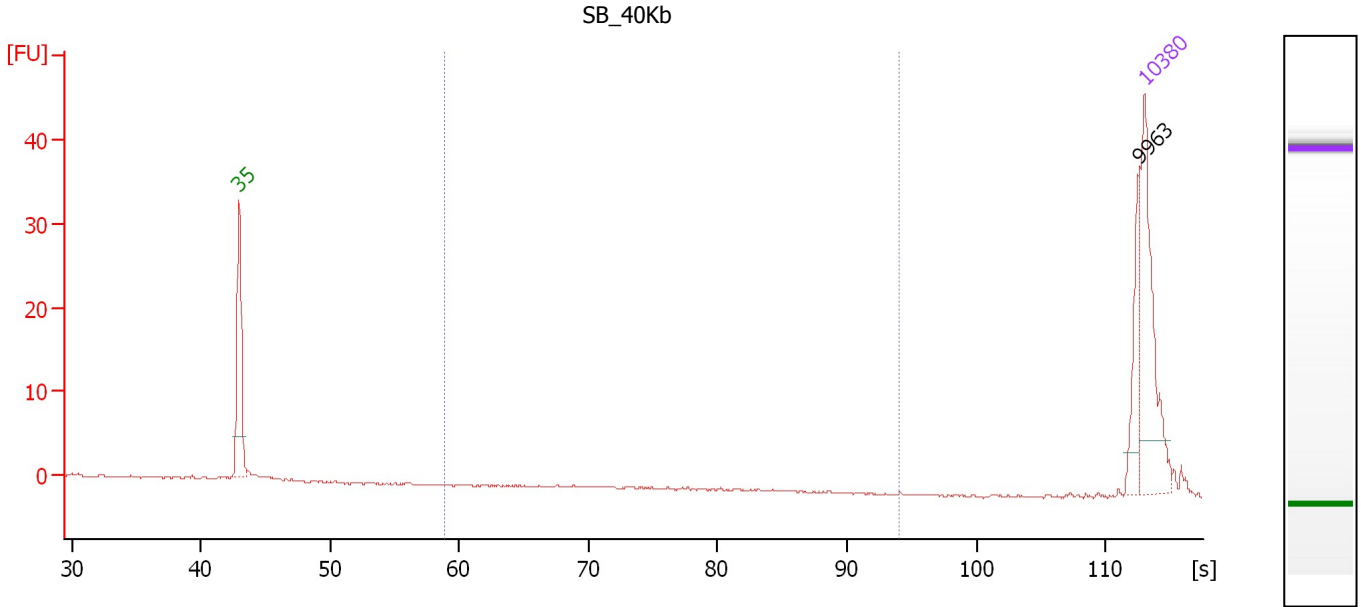
**Peak table for sample 2 : SB\_20Kb**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	0	0.00	0.0	Lower Marker

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 3 : SB\_40Kb**

Number of peaks found: 1                      Corr. Area 1: 0.0  
 Noise: 0.1

**Peak table for sample 3 : SB\_40Kb**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	9,963	33.34	5.1	
3	10,380	75.00	10.9	Upper Marker

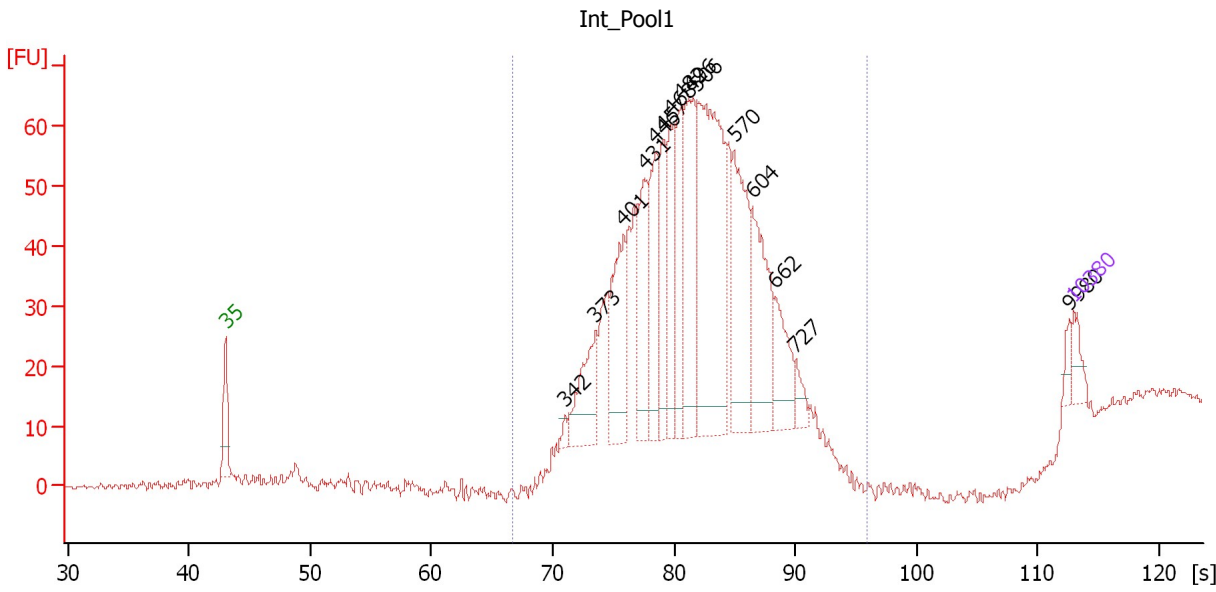
**Region table for sample 3 : SB\_40Kb**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	0.0	0	0.00	1,000	0.0	0	0.0	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 4 : Int\_Pool1**

Number of peaks found: 15      Corr. Area 1: 1,153.1  
 Noise: 0.5

**Peak table for sample 4 : Int\_Pool1**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	342	33.79	149.6	
3	373	352.67	1,434.4	
4	401	489.22	1,848.7	
5	431	410.77	1,443.4	
6	446	443.95	1,507.1	
7	457	352.76	1,169.7	
8	468	317.25	1,028.2	
9	482	354.05	1,113.2	
10	496	674.56	2,059.5	
11	506	1,345.62	4,031.9	
12	570	598.84	1,591.1	
13	604	540.12	1,354.2	
14	662	261.65	598.6	
15	727	75.46	157.3	
16	9,980	39.24	6.0	
17	10,380	75.00	10.9	Upper Marker

**Region table for sample 4 : Int\_Pool1**

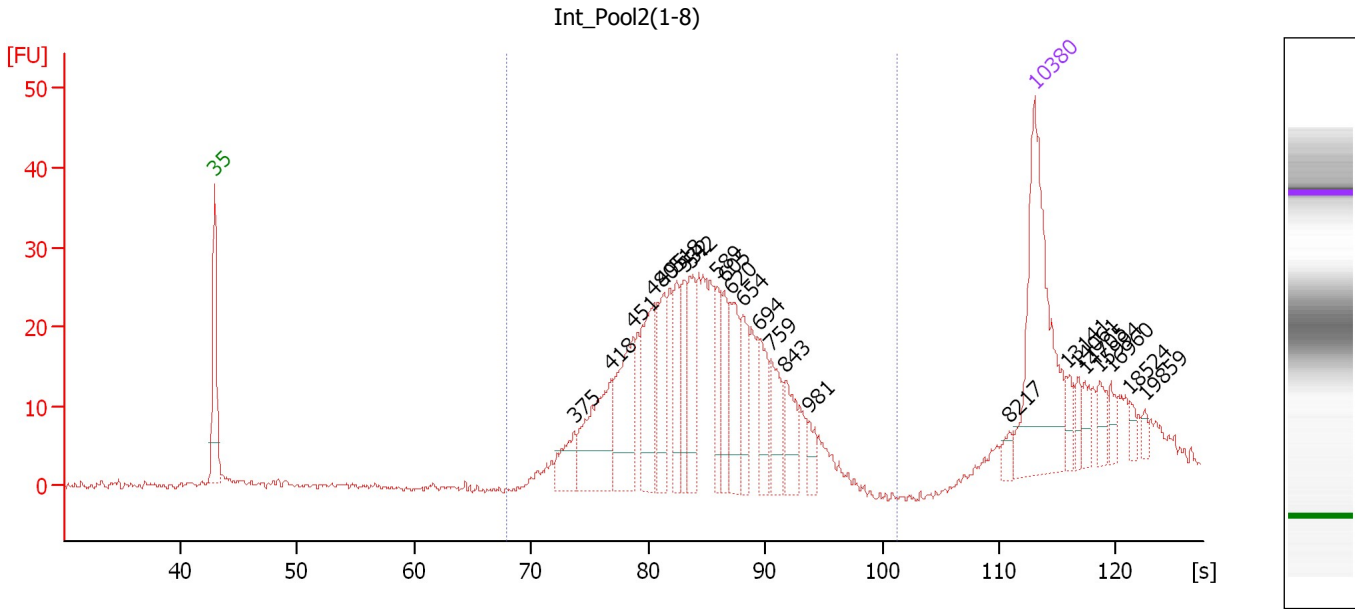
From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
291	29,597.3	519	9,501.46	1,283	1,153.1	94	23.5	Blue



Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 5 : Int\_Pool2(1-8)**

Number of peaks found: 24      Corr. Area 1: 517.9  
 Noise: 0.4

**Peak table for sample 5 : Int\_Pool2(1-8)**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	375	18.52	74.9	
3	418	53.60	194.1	
4	451	45.45	152.6	
5	480	43.12	136.0	
6	495	28.71	87.8	
7	518	24.42	71.4	
8	532	22.59	64.4	
9	542	27.93	78.2	
10	589	20.11	51.7	
11	605	19.14	47.9	
12	620	30.81	75.2	
13	654	22.00	51.0	
14	694	21.03	45.9	
15	759	19.77	39.5	
16	843	19.47	35.0	
17	981	7.99	12.3	
18	8,217	4.32	0.8	
19	10,380	75.00	10.9	Upper Marker
20	13,141	0.00	0.0	
21	14,061	0.00	0.0	
22	14,705	0.00	0.0	
23	15,994	0.00	0.0	
24	16,960	0.00	0.0	
25	18,524	0.00	0.0	
26	19,859	0.00	0.0	


Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**

... Region table for sample 5 :

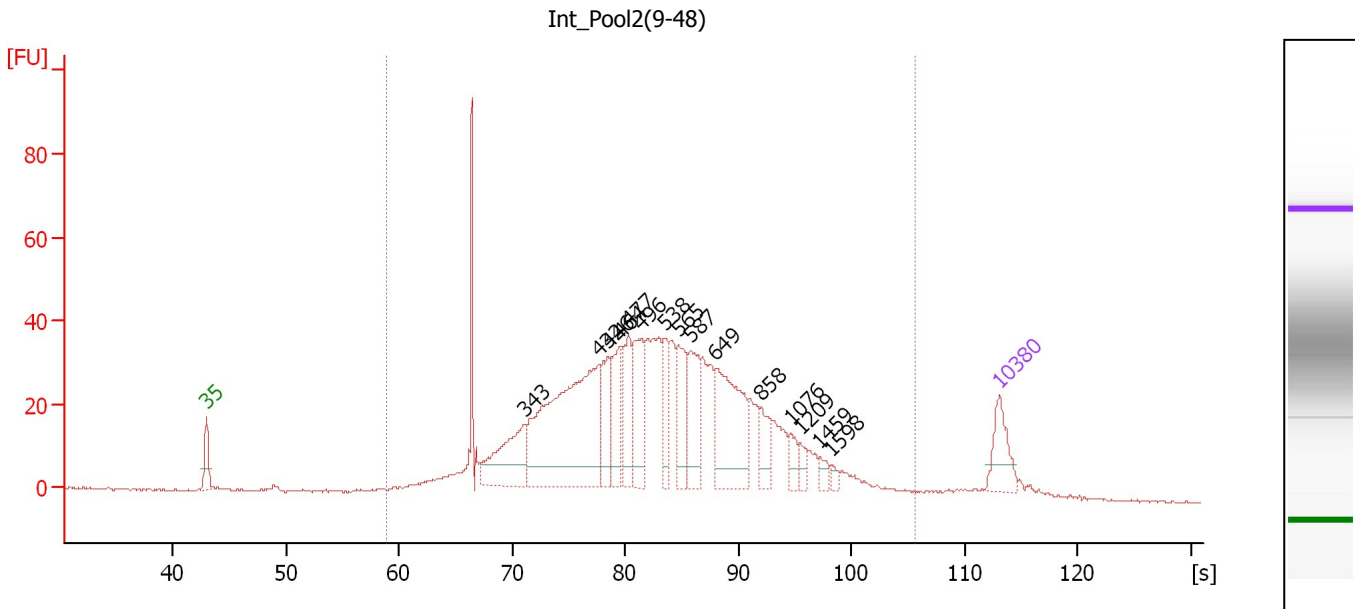
**Int Pool2(1-8)**

<b>From [bp]</b>	<b>Molarity [pmol/l]</b>	<b>Average Size [bp]</b>	<b>Conc. [pg/μl]</b>	<b>To [bp]</b>	<b>Corr. Area</b>	<b>% of Total</b>	<b>Size distribution in CV [%]</b>	<b>Co lor</b>
305	1,701.5	600	602.49	2,122	517.9	93	34.0	

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 6 : Int\_Pool2(9-48)**

Number of peaks found: 15      Corr. Area 1: 1,008.2  
 Noise: 0.3

**Peak table for sample 6 : Int\_Pool2(9-48)**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	343	211.37	934.2	
3	432	664.96	2,332.6	
4	446	116.64	396.5	
5	464	122.71	400.4	
6	477	123.05	391.3	
7	496	173.60	530.3	
8	538	89.38	251.7	
9	565	136.28	365.3	
10	587	138.97	358.6	
11	649	278.22	649.1	
12	858	63.68	112.5	
13	1,076	31.05	43.7	
14	1,209	25.52	32.0	
15	1,459	19.40	20.1	
16	1,598	11.62	11.0	
17	10,380	75.00	10.9	Upper Marker

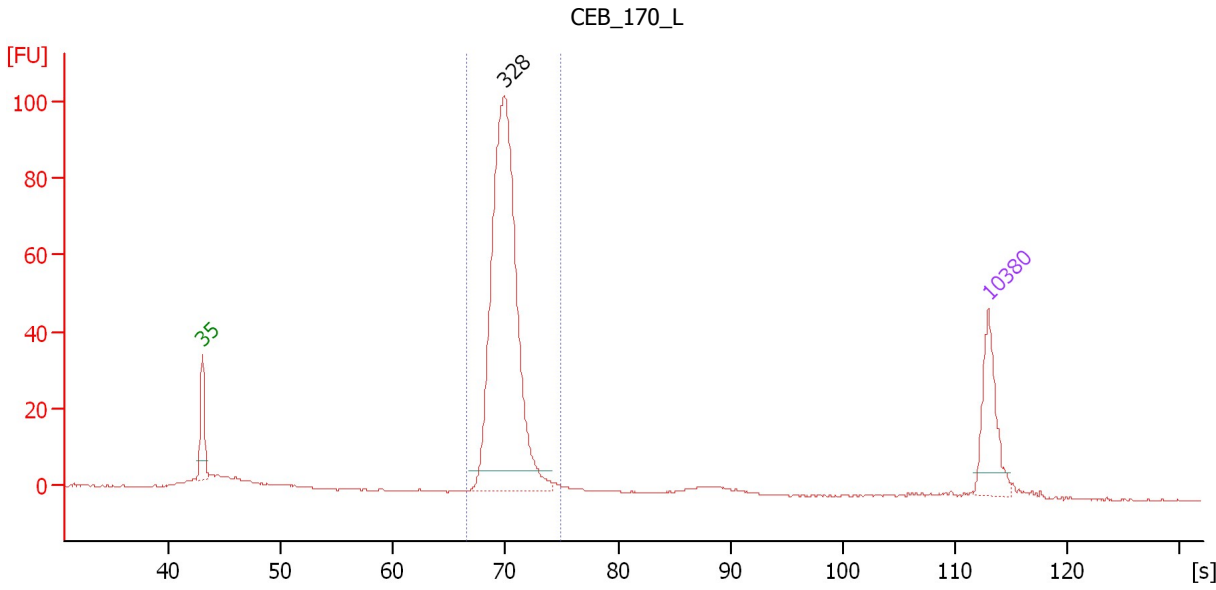
**Region table for sample 6 : Int\_Pool2(9-48)**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
200	11,185.3	614	3,481.92	3,755	1,008.2	98	60.8	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 7 : CEB\_170\_L**

Number of peaks found: 1      Corr. Area 1: 381.0  
 Noise: 0.2

**Peak table for sample 7 : CEB\_170\_L**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	328	741.46	3,426.3	
3	10,380	75.00	10.9	Upper Marker

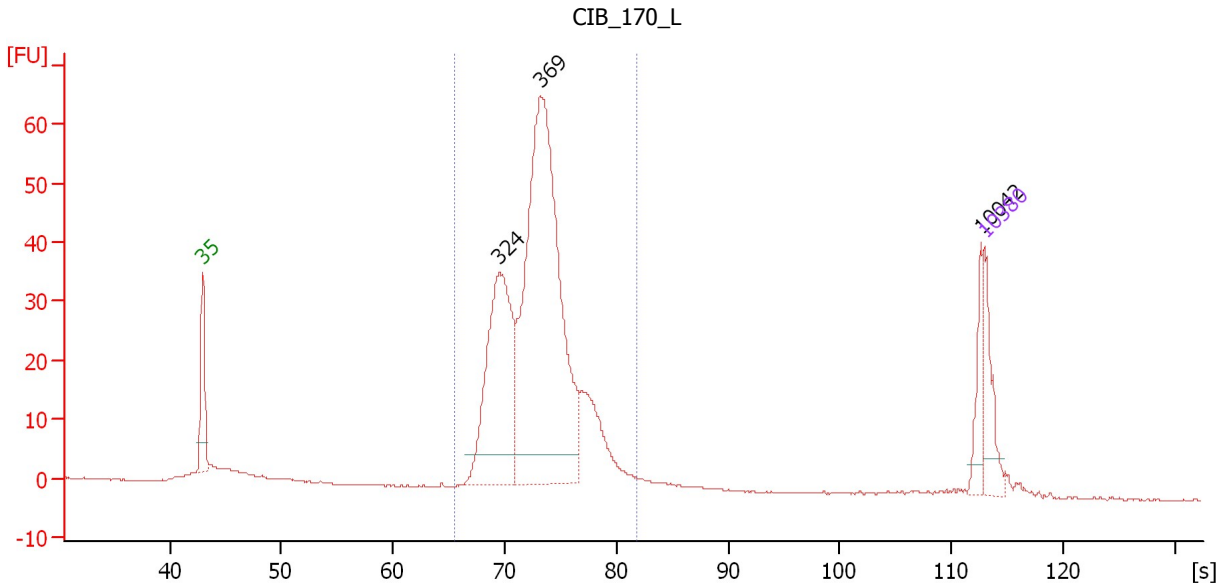
**Region table for sample 7 : CEB\_170\_L**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
288	3,407.1	329	740.30	389	381.0	90	4.2	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 8 : CIB 170 L**

Number of peaks found: 3                      Corr. Area 1: 510.2  
 Noise: 0.1

**Peak table for sample 8 : CIB 170 L**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	324	522.09	2,443.0	
3	369	1,133.09	4,652.0	
4	10,042	59.85	9.0	
5	10,380	75.00	10.9	Upper Marker

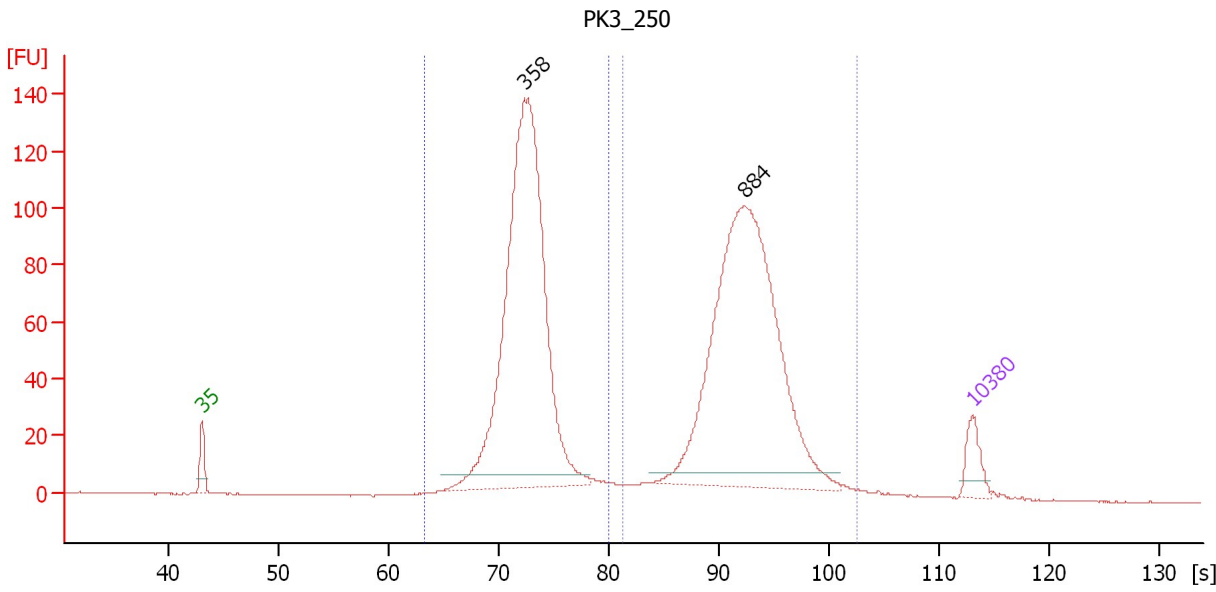
**Region table for sample 8 : CIB 170 L**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
276	7,722.9	368	1,858.78	503	510.2	89	10.4	Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 9 : PK3\_250**

Number of peaks found: 2                      Corr. Area 1: 830.5  
 Noise: 0.1                                      Corr. Area 2: 839.7

**Peak table for sample 9 : PK3\_250**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	358	2,262.17	9,580.5	
3	884	1,790.37	3,067.2	
4	10,380	75.00	10.9	Upper Marker

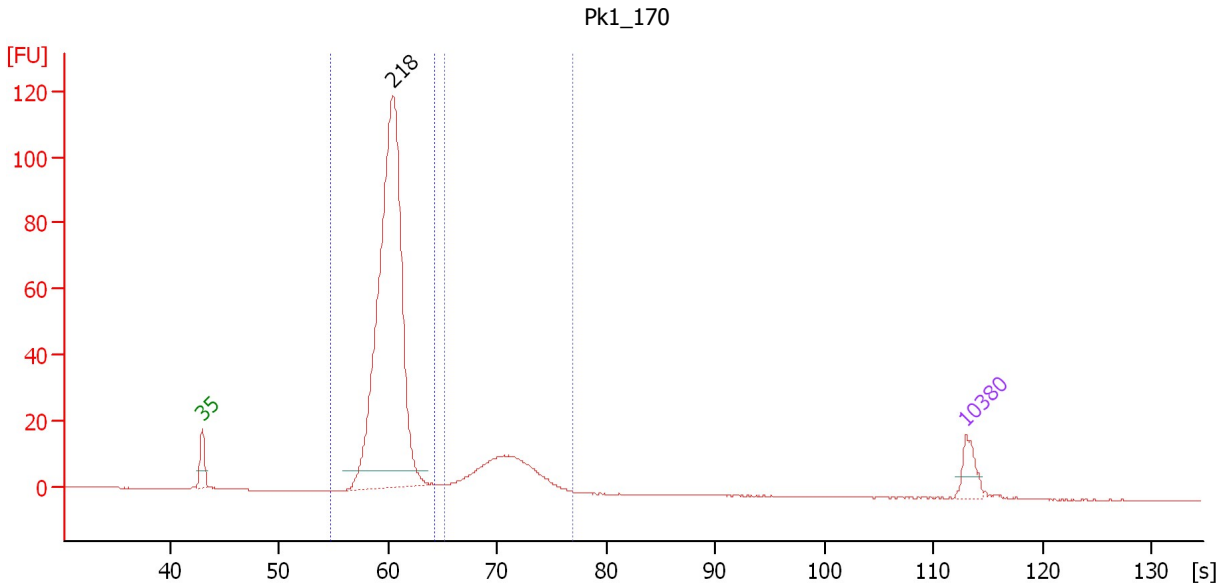
**Region table for sample 9 : PK3\_250**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
249	10,434.8	359	2,460.53	473	839.7	49	7.9	Blue
493	3,522.0	948	2,018.69	2,464	830.5	49	31.4	Dark Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 10 : Pk1\_170**

Number of peaks found: 1                      Corr. Area 1: 100.5  
 Noise: 0.1                                      Corr. Area 2: 489.8

**Peak table for sample 10 : Pk1\_170**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	218	2,780.95	19,338.2	
3	10,380	75.00	10.9	Upper Marker

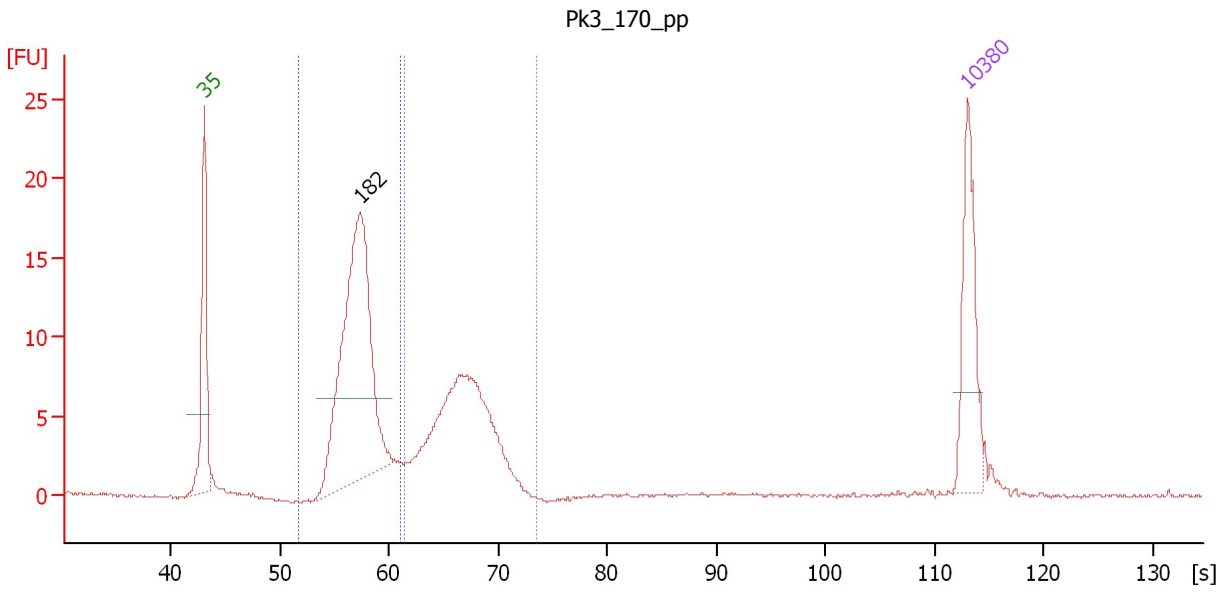
**Region table for sample 10 : Pk1\_170**

From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
153	20,434.5	214	2,879.73	261	489.8	82	6.1	Blue
272	2,308.4	339	512.72	421	100.5	17	8.9	Dark Blue

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 11 : Pk3 170 pp**

Number of peaks found: 1                      Corr. Area 1: 70.4  
 Noise: 0.1                                      Corr. Area 2: 98.2

**Peak table for sample 11 : Pk3 170 pp**

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	182	415.82	3,470.7	
3	10,380	75.00	10.9	Upper Marker

**Region table for sample 11 : Pk3 170 pp**

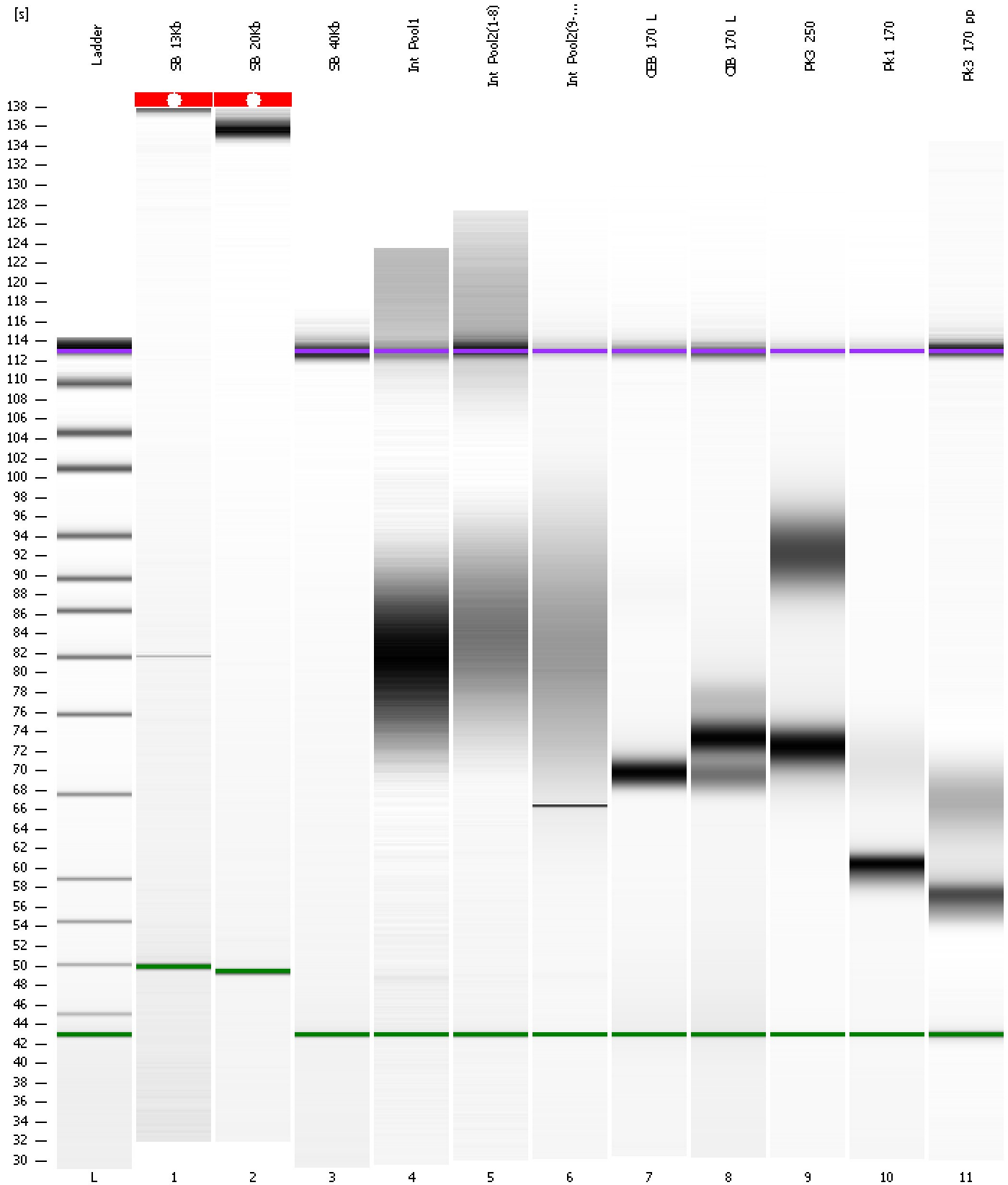
From [bp]	Molarity [pmol/l]	Average Size [bp]	Conc. [pg/μl]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Color
117	4,082.7	179	480.22	225	98.2	56	9.1	Blue
228	1,588.3	289	300.38	372	70.4	40	9.8	Dark Blue



Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
Modified: 4/12/2012 5:47:50 PM

**Gel Image**



Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2012-04-12\2012-04-12\_005.xad

Created: 4/12/2012 2:37:44 PM  
 Modified: 4/12/2012 5:47:50 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		4/12/2012 3:19:02 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2012-04-12\2012-04-12_005.xad)		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		4/12/2012 2:37:50 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1