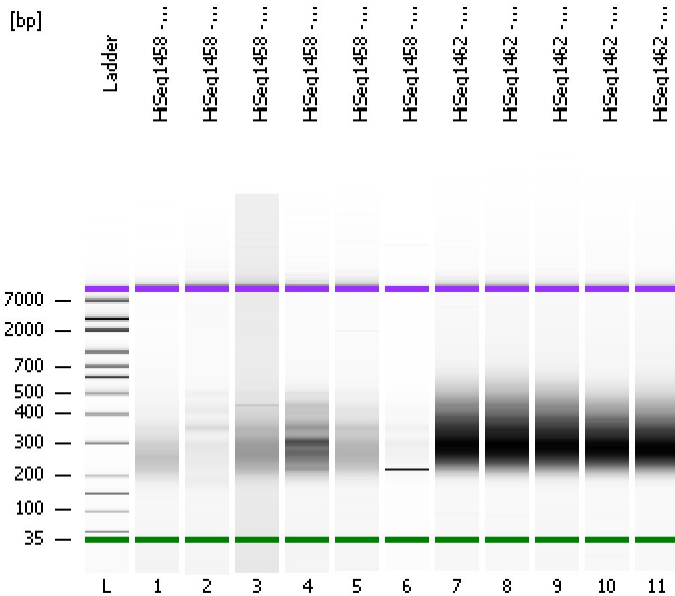


Assay Class: High Sensitivity DNA Assay
Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
Modified: 8/15/2018 4:46:06 PM

Electrophoresis File Run Summary



Instrument Information:

Instrument Name: DE34903152 Firmware: C.01.069
Serial#: DE34903152 Type: G2938C

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

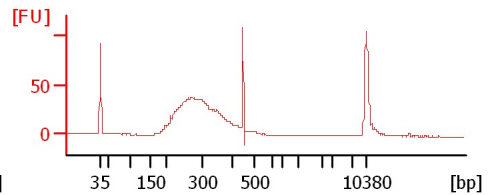
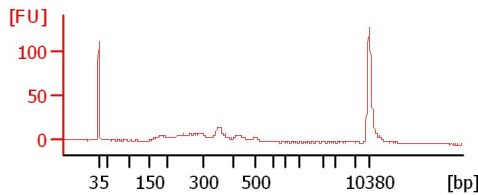
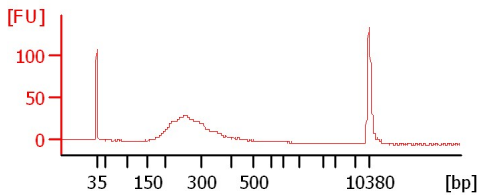
Chip Information:

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

HiSeq1458 - 9 library

HiSeq1458 - 10 library

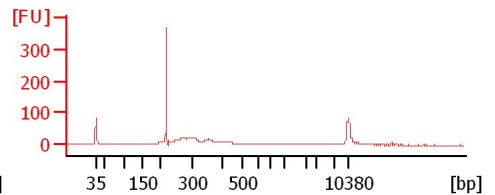
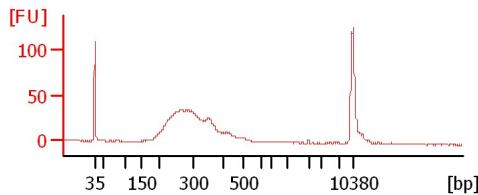
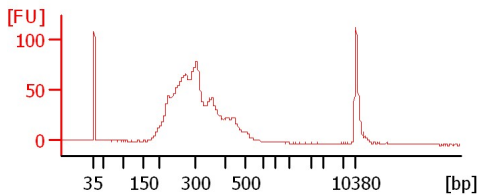
HiSeq1458 - 11 library



HiSeq1458 - 12 library

HiSeq1458 - 13 library

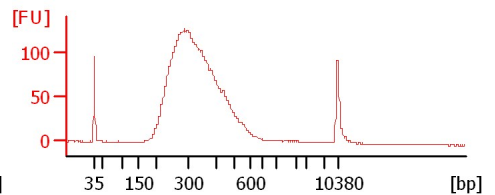
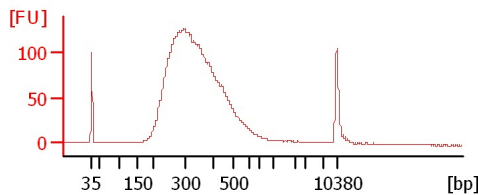
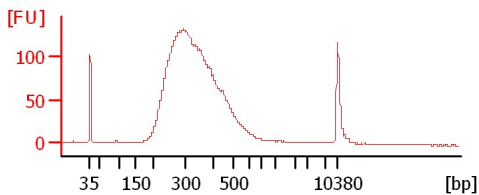
HiSeq1458 - 14 library



HiSeq1462 - 1 library

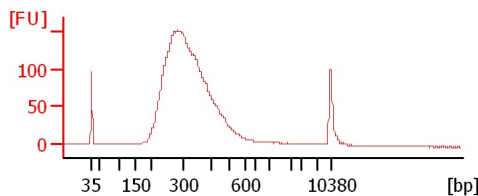
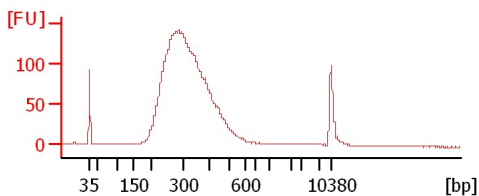
HiSeq1462 - 2 library

HiSeq1462 - 3 library



HiSeq1462 - 4 library

HiSeq1462 - 5 library



Assay Class: High Sensitivity DNA Assay
Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
Modified: 8/15/2018 4:46:06 PM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
HiSeq1458 -9 library		<input type="checkbox"/>	✓			
HiSeq1458 - 10 library		<input type="checkbox"/>	✓			
HiSeq1458 - 11 library		<input type="checkbox"/>	✓			
HiSeq1458 - 12 library		<input type="checkbox"/>	✓			
HiSeq1458 - 13 library		<input type="checkbox"/>	✓			
HiSeq1458 - 14 library		<input type="checkbox"/>	✓			
HiSeq1462 - 1 library		<input type="checkbox"/>	✓			
HiSeq1462 - 2 library		<input type="checkbox"/>	✓			
HiSeq1462 - 3 library		<input type="checkbox"/>	✓			
HiSeq1462 - 4 library		<input type="checkbox"/>	✓			
HiSeq1462 - 5 library		<input type="checkbox"/>	✓			
Ladder		<input type="checkbox"/>	✓			

Chip Lot #

Reagent Kit Lot #

Chip Comments :

Assay Class: High Sensitivity DNA Assay
Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
Modified: 8/15/2018 4:46:06 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

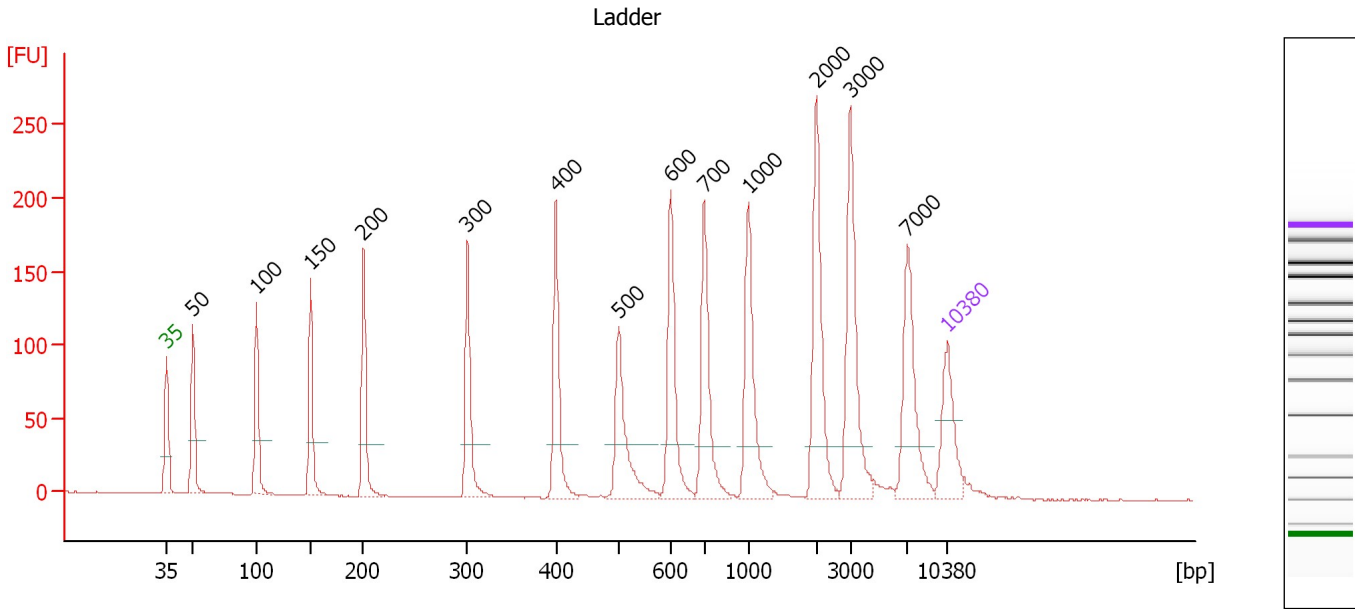
Ladder

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:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.3

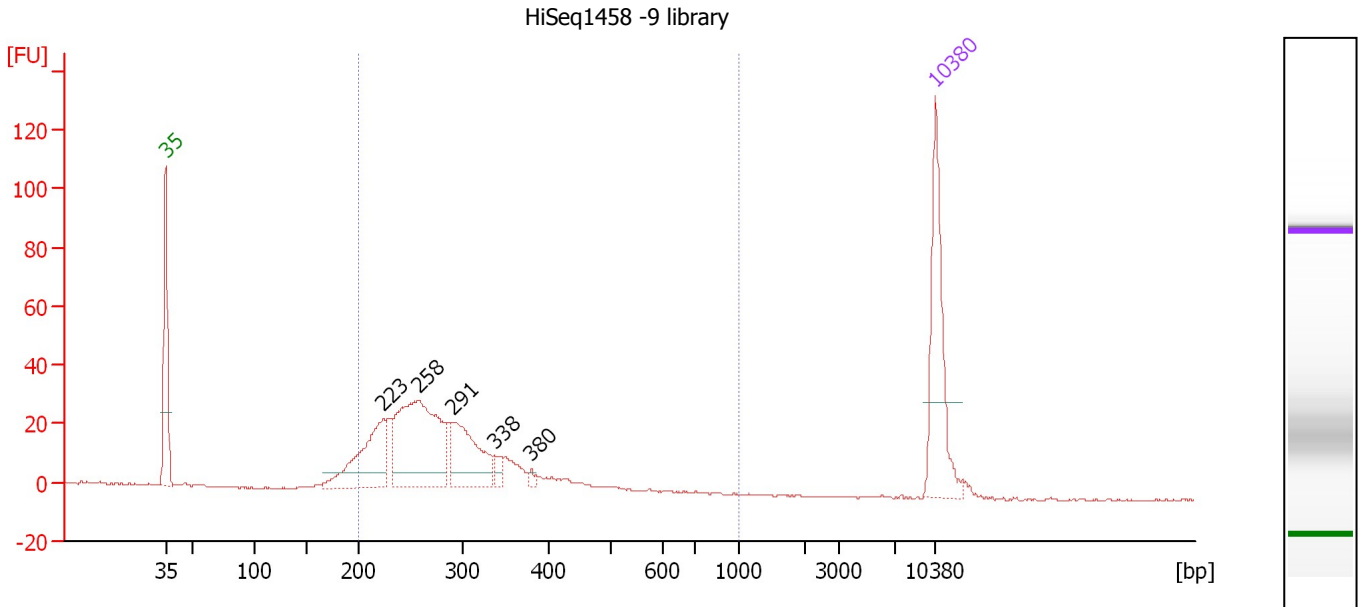
Peak table for Ladder

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	50	150.00	4,545.5	Ladder Peak	45.34
3	100	150.00	2,272.7	Ladder Peak	51.03
4	150	150.00	1,515.2	Ladder Peak	55.90
5	200	150.00	1,136.4	Ladder Peak	60.63
6	300	150.00	757.6	Ladder Peak	69.95
7	400	150.00	568.2	Ladder Peak	77.88
8	500	150.00	454.5	Ladder Peak	83.52
9	600	150.00	378.8	Ladder Peak	88.15
10	700	150.00	324.7	Ladder Peak	91.16
11	1,000	150.00	227.3	Ladder Peak	95.13
12	2,000	150.00	113.6	Ladder Peak	101.25
13	3,000	150.00	75.8	Ladder Peak	104.26
14	7,000	150.00	32.5	Ladder Peak	109.37
15	10,380	75.00	10.9	Upper Marker	113.00

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 1 : HiSeq1458 -9 library

Number of peaks found: 5 Corr. Area 1: 490.0
 Noise: 0.3

Peak table for sample 1 : HiSeq1458 -9 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	223	98.56	669.1		62.79
3	258	179.28	1,054.7		65.99
4	291	83.38	433.5		69.15
5	338	9.39	42.1		72.93
6	380	3.36	13.4		76.28
7	10,380	75.00	10.9	Upper Marker	113.00

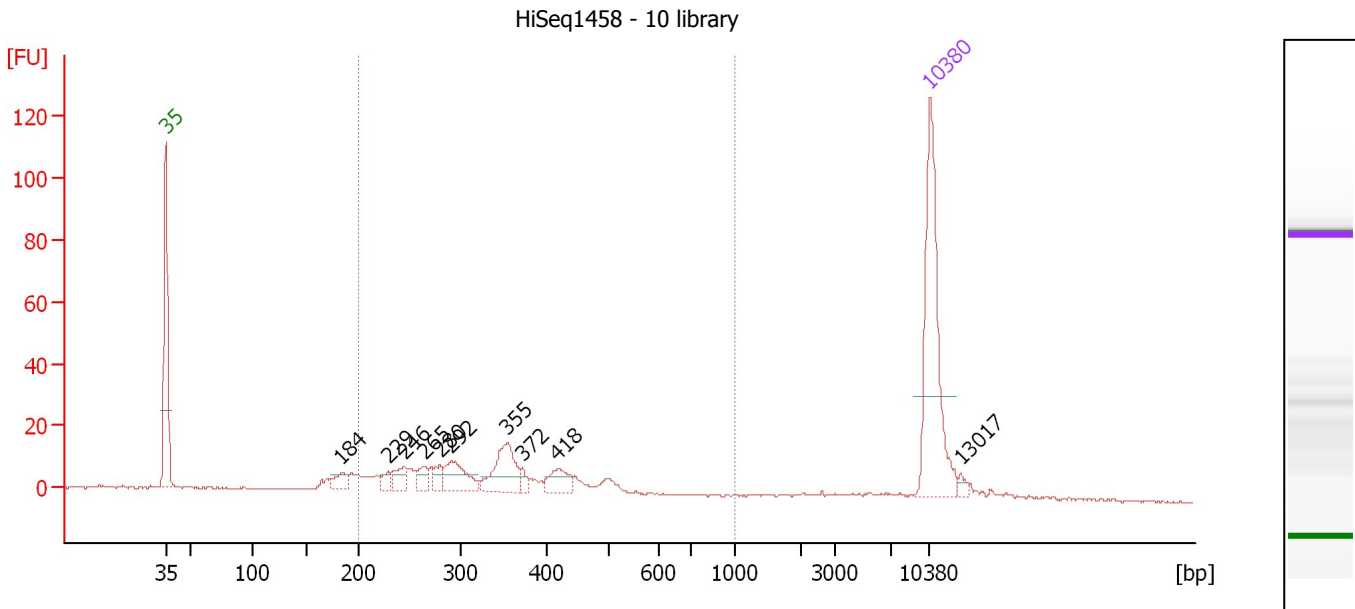
Region table for sample 1 : HiSeq1458 -9 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	286	427.76	490.0	2,377.4	93	22.4

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 2 : HiSeq1458 - 10 library

Number of peaks found: 10 Corr. Area 1: 225.2
 Noise: 0.2

Peak table for sample 2 : HiSeq1458 - 10 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	184	11.68	96.4		59.07
3	229	6.39	42.2		63.37
4	246	11.28	69.4		64.93
5	265	9.93	56.9		66.64
6	280	8.31	45.0		68.11
7	292	25.73	133.6		69.18
8	355	35.16	150.0		74.31
9	372	4.30	17.5		75.68
10	418	14.74	53.4		78.90
11	10,380	75.00	10.9	Upper Marker	113.00
12	13,017	0.00	0.0		115.83

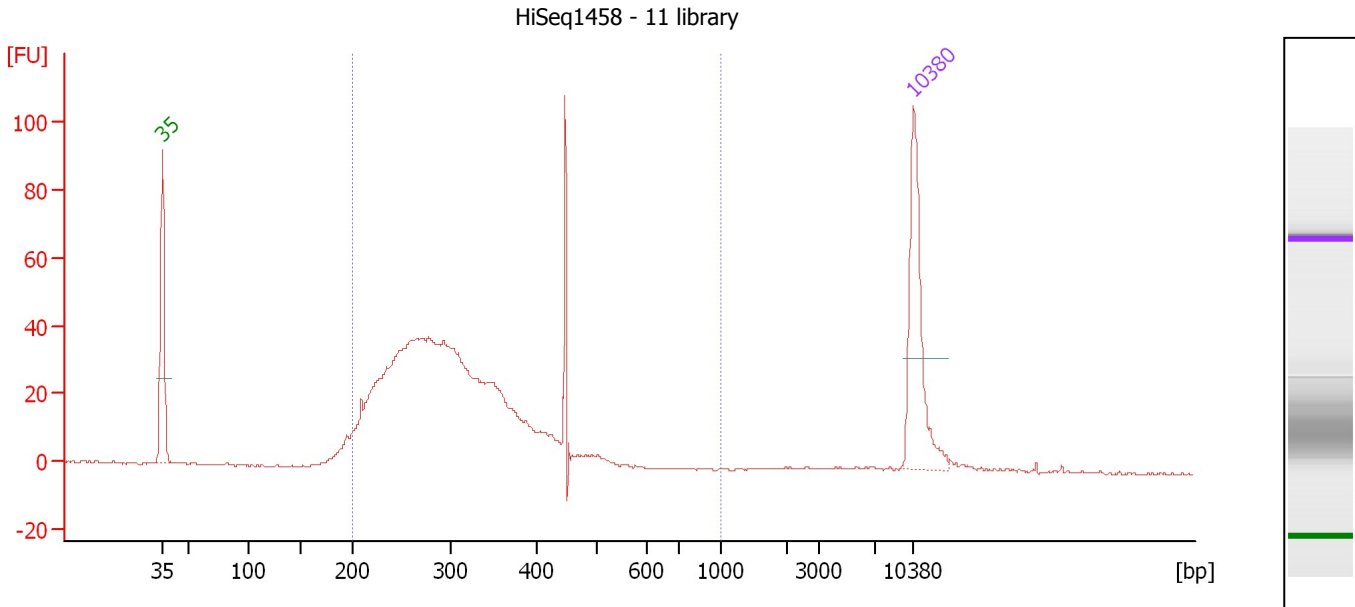
Region table for sample 2 : HiSeq1458 - 10 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	337	169.48	225.2	832.2	77	26.3

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 3 : HiSeq1458 - 11 library

Number of peaks found: 0 Corr. Area 1: 755.5
 Noise: 0.3

Peak table for sample 3 : HiSeq1458 - 11 library

Pea k	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	10,380	75.00	10.9	Upper Marker	113.00

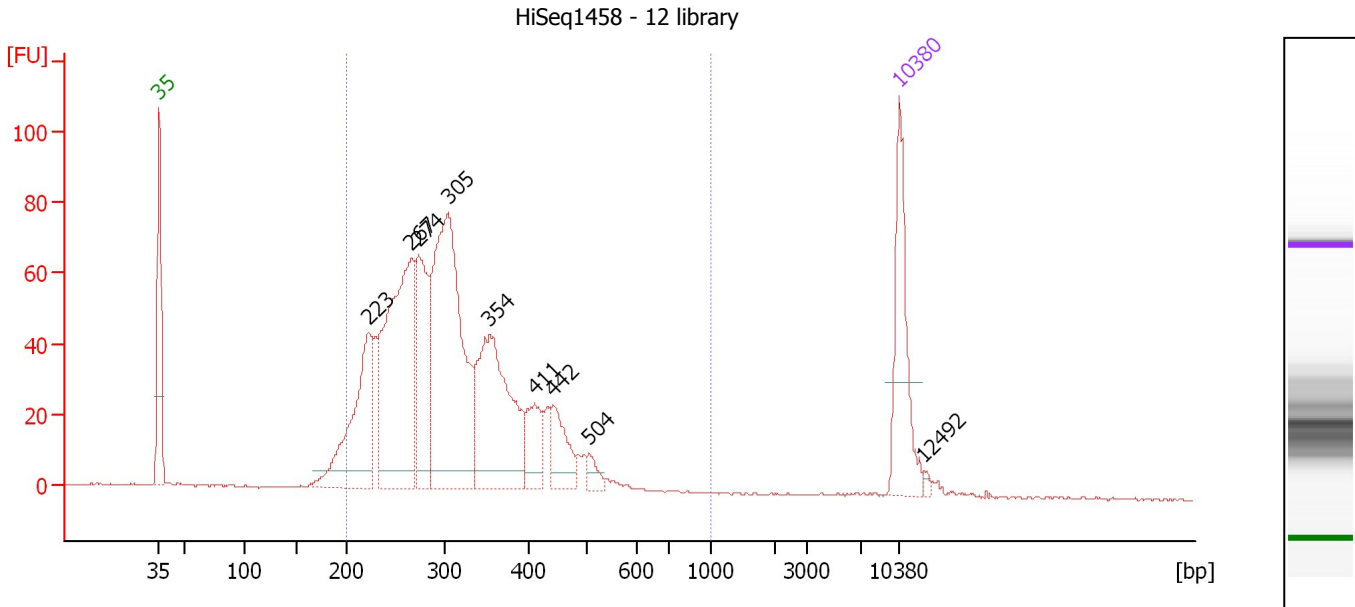
Region table for sample 3 : HiSeq1458 - 11 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	309	741.05	755.5	3,863.8	96	22.8

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 4 : HiSeq1458 - 12 library

Number of peaks found: 9 Corr. Area 1: 1,351.5
 Noise: 0.3

Peak table for sample 4 : HiSeq1458 - 12 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	223	170.20	1,156.7		62.77
3	267	299.26	1,699.5		66.85
4	274	125.40	692.5		67.56
5	305	345.54	1,717.3		70.33
6	354	196.40	841.0		74.22
7	411	43.87	161.7		78.50
8	442	46.38	158.8		80.27
9	504	12.45	37.5		83.70
10	10,380	75.00	10.9	Upper Marker	113.00
11	12,492	0.00	0.0		115.27

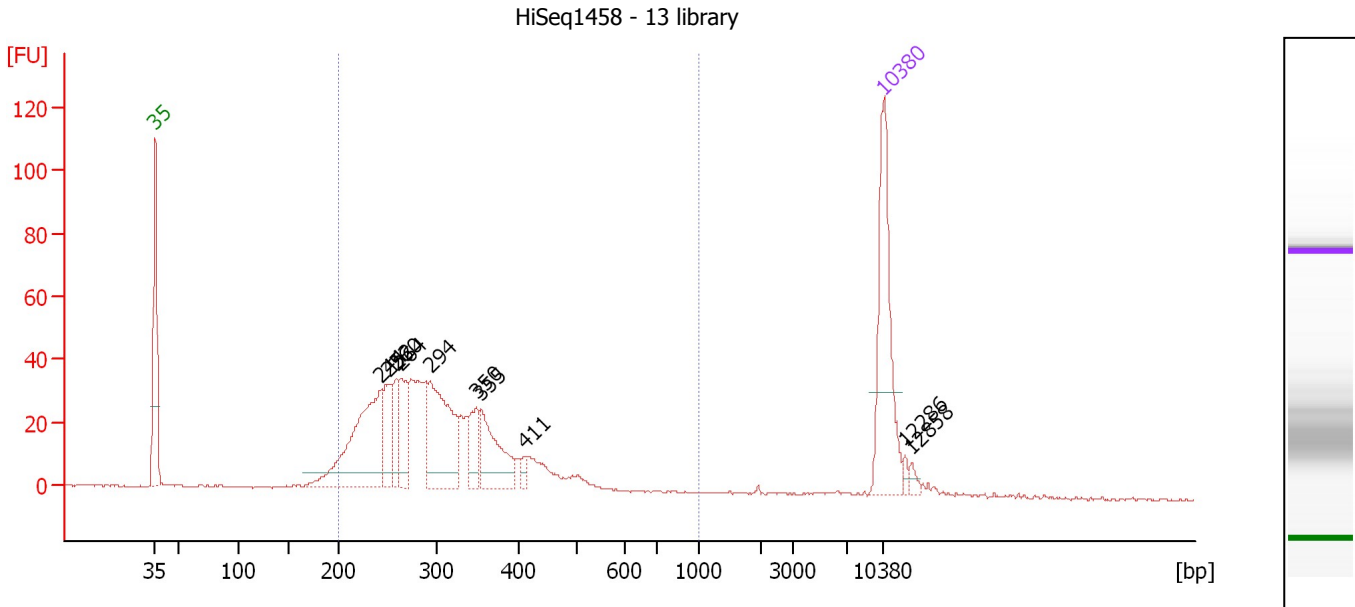
Region table for sample 4 : HiSeq1458 - 12 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]
200	1,000	315	1,301.22	1,351.5	6,692.1	95	25.0

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 5 : HiSeq1458 - 13 library

Number of peaks found: 10 Corr. Area 1: 717.3
 Noise: 0.3

Peak table for sample 5 : HiSeq1458 - 13 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	244	136.11	845.9		64.71
3	252	40.17	241.5		65.48
4	260	29.78	173.7		66.20
5	264	38.80	222.6		66.61
6	294	103.21	531.3		69.42
7	350	26.43	114.6		73.88
8	355	54.51	232.9		74.29
9	411	6.15	22.7		78.49
10	10,380	75.00	10.9	Upper Marker	113.00
11	12,286	0.00	0.0		115.05
12	12,858	0.00	0.0		115.66

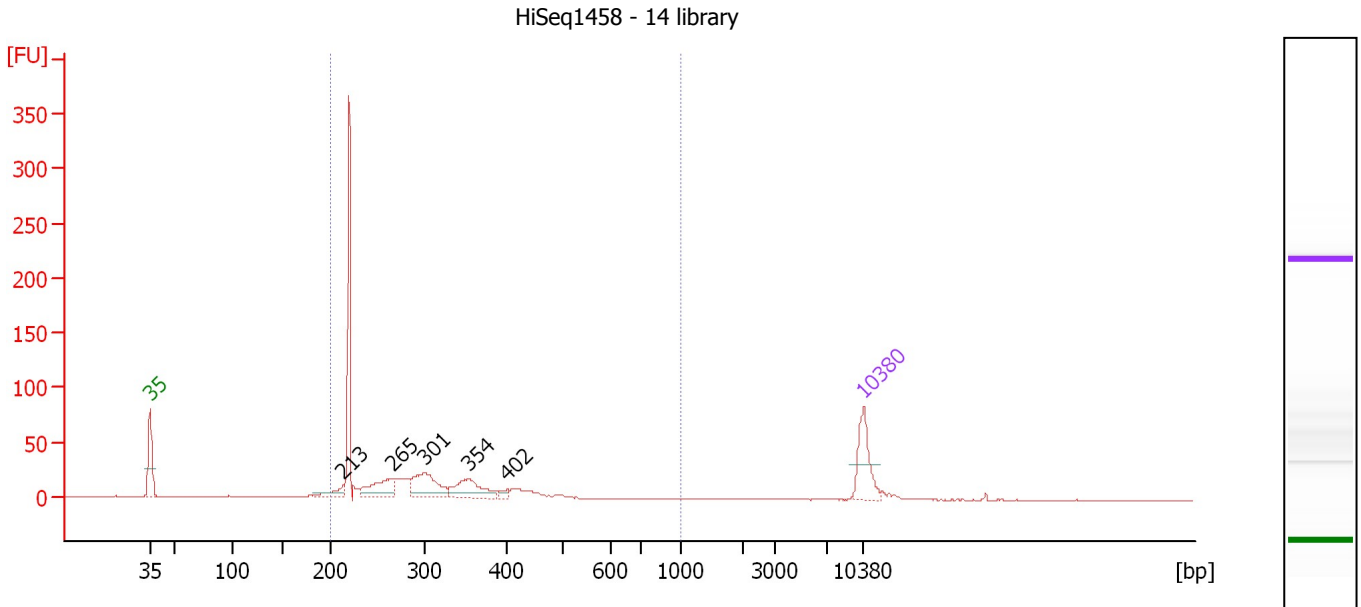
Region table for sample 5 : HiSeq1458 - 13 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	311	587.83	717.3	3,068.6	91	26.4

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 6 : HiSeq1458 - 14 library

Number of peaks found: 5 Corr. Area 1: 511.5
 Noise: 0.3

Peak table for sample 6 : HiSeq1458 - 14 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	213	37.37	265.3		61.89
3	265	85.90	490.9		66.70
4	301	110.78	558.4		70.00
5	354	88.25	377.7		74.23
6	402	9.44	35.6		78.00
7	10,380	75.00	10.9	Upper Marker	113.00

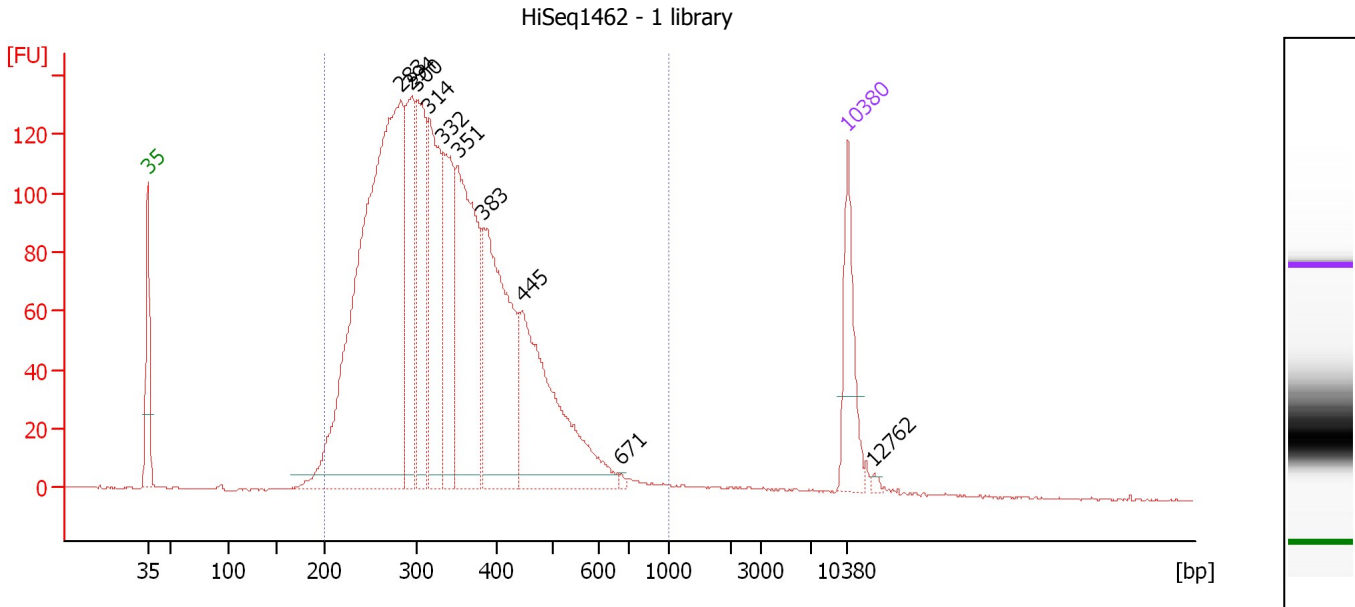
Region table for sample 6 : HiSeq1458 - 14 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	291	658.70	511.5	3,683.6	92	25.2

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 7 : HiSeq1462 - 1 library

Number of peaks found: 10 Corr. Area 1: 2,986.0
 Noise: 0.3

Peak table for sample 7 : HiSeq1462 - 1 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	283	1,020.73	5,462.3		68.38
3	294	196.80	1,014.2		69.39
4	300	211.14	1,067.4		69.92
5	314	231.56	1,115.7		71.10
6	332	201.45	919.5		72.48
7	351	326.89	1,409.3		74.03
8	383	317.65	1,256.6		76.53
9	445	298.22	1,015.1		80.43
10	671	2.78	6.3		90.29
11	10,380	75.00	10.9	Upper Marker	113.00
12	12,762	0.00	0.0		115.56

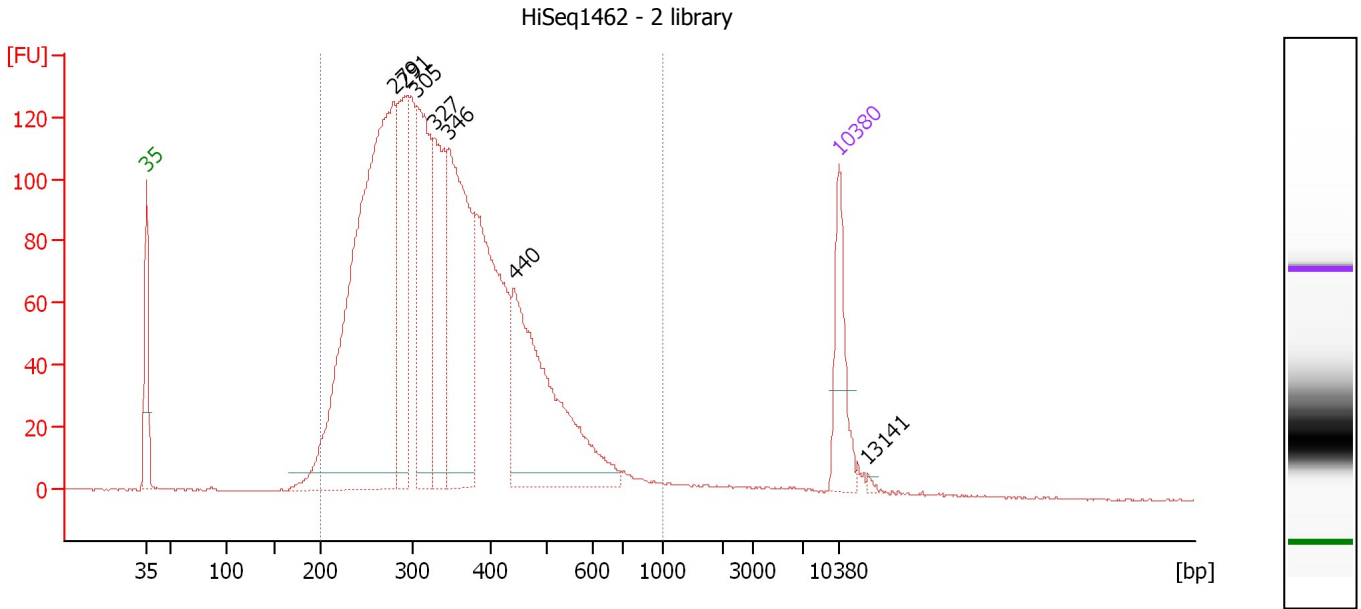
Region table for sample 7 : HiSeq1462 - 1 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	344	2,920.98	2,986.0	14,056.7	97	28.1

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 8 : HiSeq1462 - 2 library

Number of peaks found: 7 Corr. Area 1: 2,969.2
 Noise: 0.2

Peak table for sample 8 : HiSeq1462 - 2 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	279	1,012.17	5,490.2		68.02
3	291	234.92	1,221.1		69.16
4	305	293.20	1,456.7		70.34
5	327	224.56	1,041.4		72.07
6	346	396.89	1,735.8		73.63
7	440	369.05	1,269.7		80.16
8	10,380	75.00	10.9	Upper Marker	113.00
9	13,141	0.00	0.0		115.97

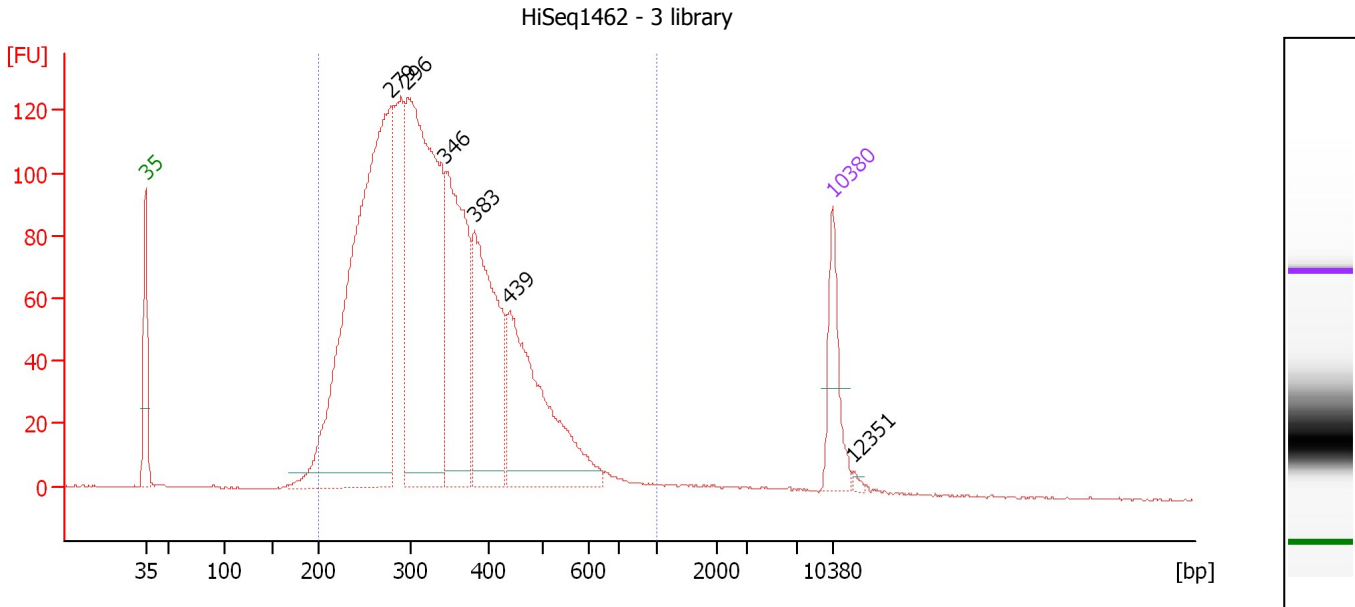
Region table for sample 8 : HiSeq1462 - 2 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]
200	1,000	348	3,112.21	2,969.2	14,915.0	97	29.7

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 9 : HiSeq1462 - 3 library

Number of peaks found: 6 Corr. Area 1: 2,749.4
 Noise: 0.2

Peak table for sample 9 : HiSeq1462 - 3 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	279	1,064.41	5,783.0		67.98
3	296	818.62	4,185.2		69.61
4	346	380.31	1,666.8		73.57
5	383	334.08	1,322.7		76.51
6	439	339.76	1,172.1		80.09
7	10,380	75.00	10.9	Upper Marker	113.00
8	12,351	0.00	0.0		115.12

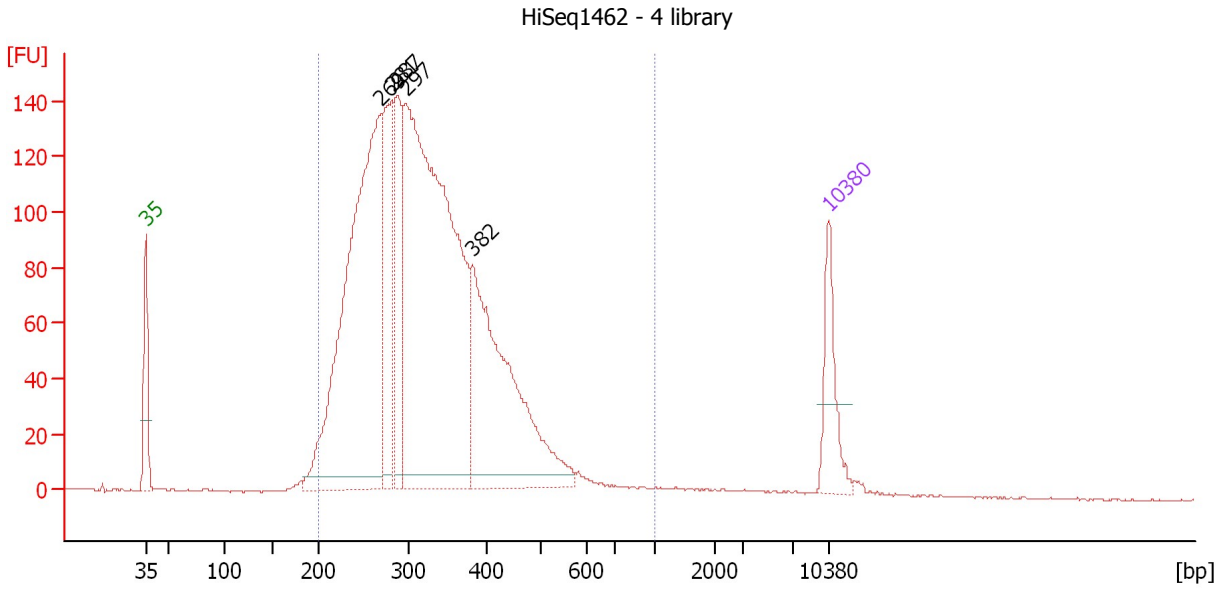
Region table for sample 9 : HiSeq1462 - 3 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	342	3,282.28	2,749.4	15,883.0	96	28.4

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 10 : HiSeq1462 - 4 library

Number of peaks found: 5 Corr. Area 1: 2,869.3
 Noise: 0.2

Peak table for sample 10 : HiSeq1462 - 4 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	269	910.89	5,130.2		67.06
3	281	257.25	1,385.3		68.21
4	287	208.58	1,100.3		68.76
5	297	1,180.99	6,032.8		69.63
6	382	480.37	1,904.3		76.47
7	10,380	75.00	10.9	Upper Marker	113.00

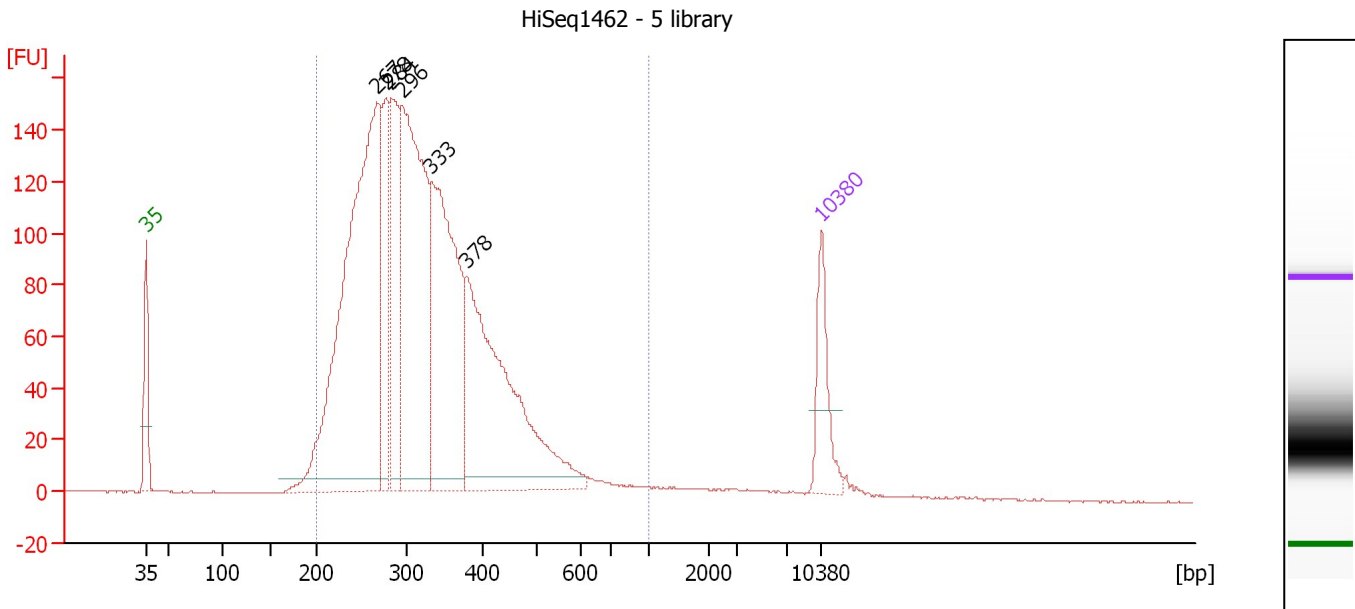
Region table for sample 10 : HiSeq1462 - 4 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]
200	1,000	328	3,078.35	2,869.3	15,330.4	97	26.5

Assay Class: High Sensitivity DNA Assay
 Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
 Modified: 8/15/2018 4:46:06 PM

Electropherogram Summary Continued ...



Overall Results for sample 11 : HiSeq1462 - 5 library

Number of peaks found: 6 Corr. Area 1: 3,079.7
 Noise: 0.2

Peak table for sample 11 : HiSeq1462 - 5 library

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations	Aligned Migration Time [s]
1	35	125.00	5,411.3	Lower Marker	43.00
2	267	1,000.88	5,681.2		66.87
3	278	192.40	1,047.9		67.92
4	284	240.36	1,284.5		68.41
5	296	627.59	3,212.6		69.57
6	333	501.57	2,282.8		72.56
7	378	519.52	2,081.5		76.15
8	10,380	75.00	10.9	Upper Marker	113.00

Region table for sample 11 : HiSeq1462 - 5 library

From [bp]	To [bp]	Average Size [bp]	Conc. [pg/μl]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]
200	1,000	330	3,128.68	3,079.7	15,575.1	96	28.4

Assay Class: High Sensitivity DNA Assay
Data Path: C:\... bioanalyzer\2100 expert\data\2018-08-15\2018-08-15_003.xad

Created: 8/15/2018 4:04:46 PM
Modified: 8/15/2018 4:46:06 PM

Gel Image

