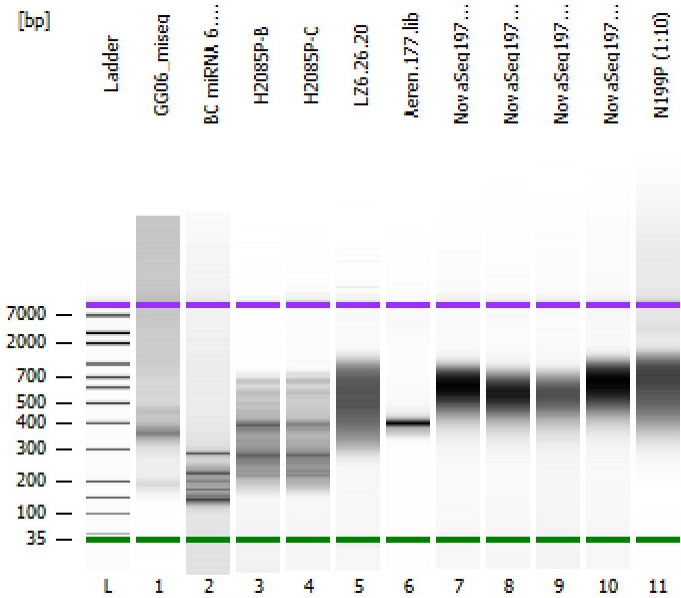


Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

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 (x86)\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

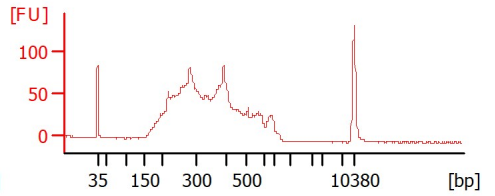
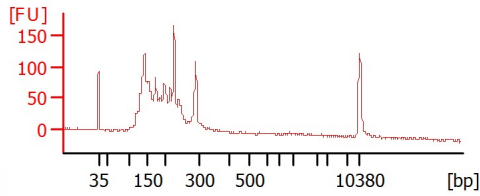
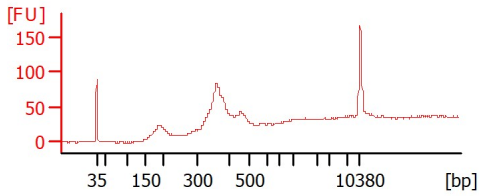
Chip Information:

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

GG06_miseq BC

BC miRNA 6.22.20

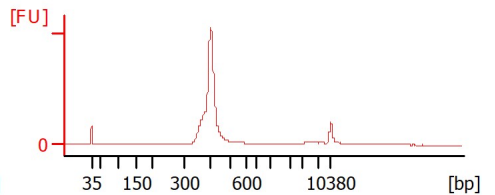
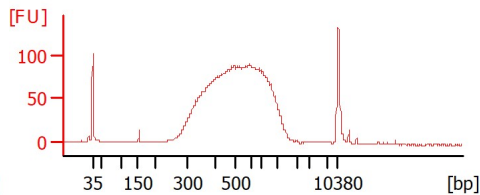
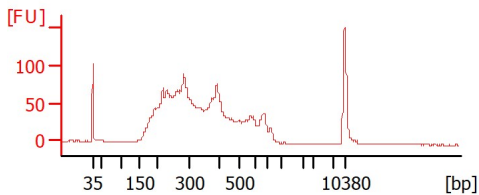
H2085P-B



H2085P-C

LZ6.26.20

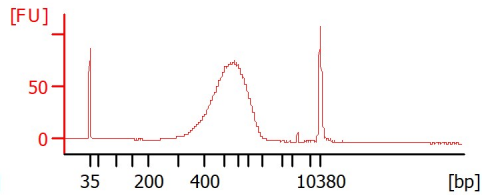
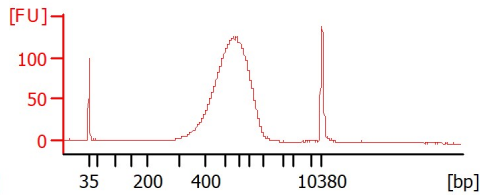
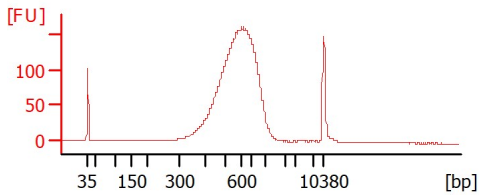
Aeren.177.lib



NovaSeq197 - 1_SS Libraries

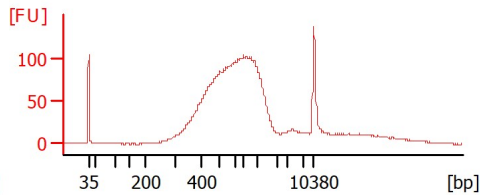
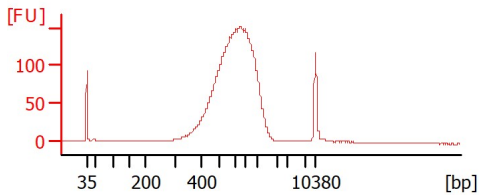
NovaSeq197 - 2_SS Libraries

NovaSeq197 - 3_SS Libraries



NovaSeq197 - 4_SS Libraries

N199P (1:10)



Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
GG06_miseq BC		<input type="checkbox"/>	✓			
BC miRNA 6.22.20		<input type="checkbox"/>	✓			
H2085P-B		<input type="checkbox"/>	✓			
H2085P-C		<input type="checkbox"/>	✓			
LZ6.26.20		<input type="checkbox"/>	✓			
Aeren.177.lib		<input type="checkbox"/>	✓			
NovaSeq197 - 1_SS Libraries		<input type="checkbox"/>	✓			
NovaSeq197 - 2_SS Libraries		<input type="checkbox"/>	✓			
NovaSeq197 - 3_SS Libraries		<input type="checkbox"/>	✓			
NovaSeq197 - 4_SS Libraries		<input type="checkbox"/>	✓			
N199P (1:10)		<input type="checkbox"/>	✓			
Ladder		<input type="checkbox"/>	✓			

Chip Lot #

Reagent Kit Lot #

Chip Comments :

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 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

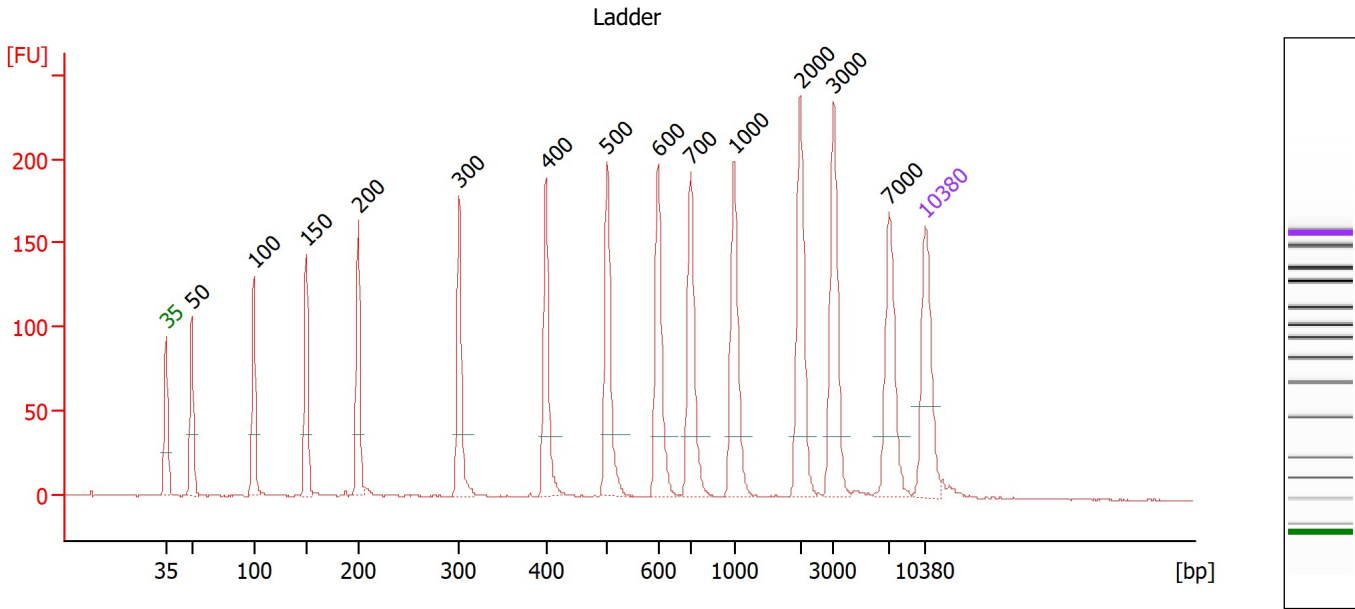
Ladder

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: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.3

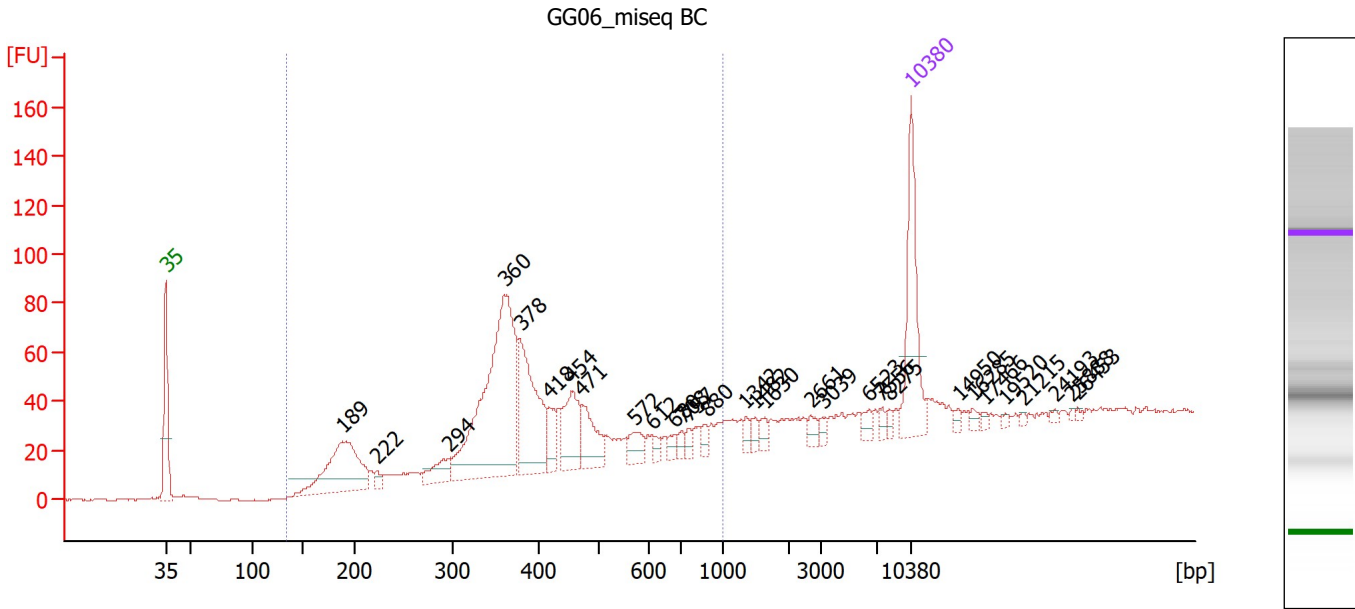
Peak table for Ladder

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: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 1 : GG06_miseq BC

Number of peaks found: 30 Corr. Area 1: 722.8
 Noise: 0.3

Peak table for sample 1 : GG06_miseq BC

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	189	144.87	1,163.6	
3	222	8.00	54.5	
4	294	28.89	148.7	
5	360	300.47	1,265.6	
6	378	127.44	511.0	
7	418	24.18	87.6	
8	454	56.76	189.2	
9	471	43.54	140.0	
10	572	19.07	50.5	
11	612	8.09	20.0	
12	680	8.15	18.2	
13	708	6.87	14.7	
14	757	7.06	14.1	
15	880	6.80	11.7	
16	1,342	6.43	7.3	
17	1,482	7.06	7.2	
18	1,630	7.49	7.0	
19	2,661	7.28	4.1	
20	3,039	5.22	2.6	
21	6,523	7.33	1.7	
22	7,556	4.70	0.9	
23	8,275	4.46	0.8	
24	10,380	75.00	10.9	Upper Marker
25	14,950	0.00	0.0	
26	16,285	0.00	0.0	

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...

... Peak table for sample 1 : GG06_miseq BC

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
27	17,466	0.00	0.0	
28	19,520	0.00	0.0	
29	21,215	0.00	0.0	
30	24,193	0.00	0.0	
31	25,888	0.00	0.0	
32	26,453	0.00	0.0	

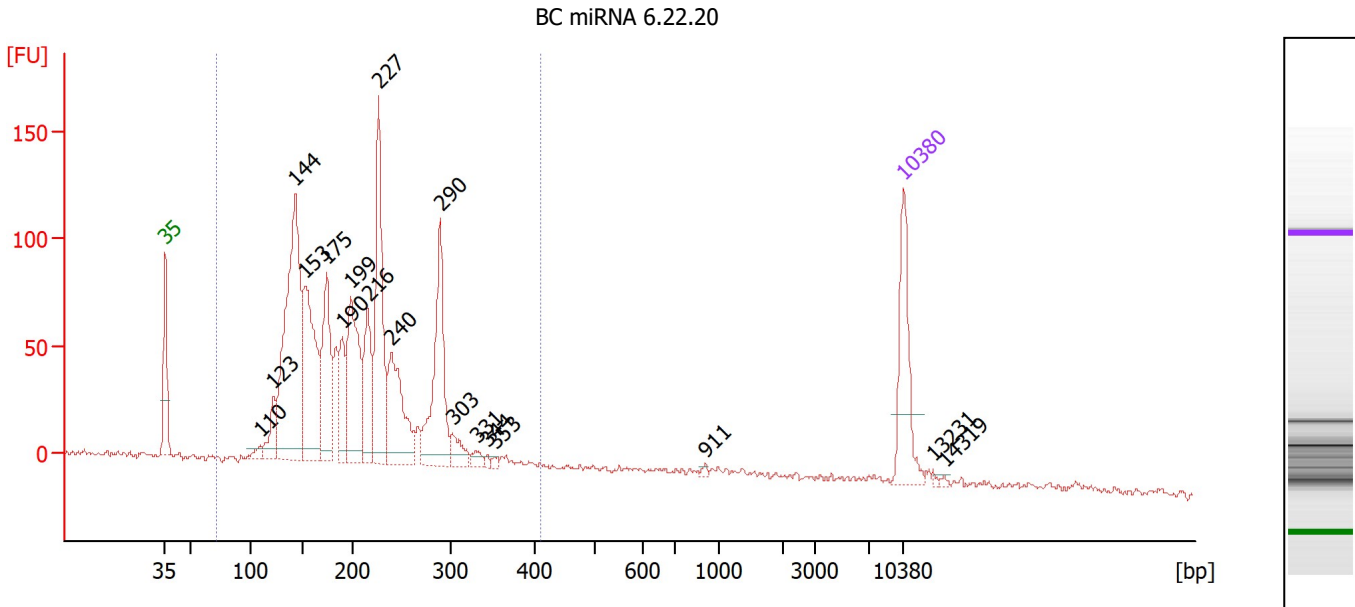
Region table for sample 1 : GG06_miseq BC

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
133	1,000	722.8	76	419	35.7	655.91	2,802.5	

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 2 : BC miRNA 6.22.20

Number of peaks found: 18 Corr. Area 1: 1,772.9
 Noise: 1.5

Peak table for sample 2 : BC miRNA 6.22.20

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	110	12.38	171.2	
3	123	44.75	553.5	
4	144	403.37	4,250.6	
5	153	227.04	2,253.3	
6	175	143.08	1,239.5	
7	190	63.21	503.4	
8	199	168.15	1,281.9	
9	216	98.64	691.6	
10	227	200.98	1,341.7	
11	240	131.37	829.3	
12	290	166.98	872.3	
13	303	27.35	136.8	
14	331	9.99	45.8	
15	344	3.70	16.3	
16	353	4.22	18.1	
17	911	2.61	4.3	
18	10,380	75.00	10.9	Upper Marker
19	13,231	0.00	0.0	
20	14,319	0.00	0.0	

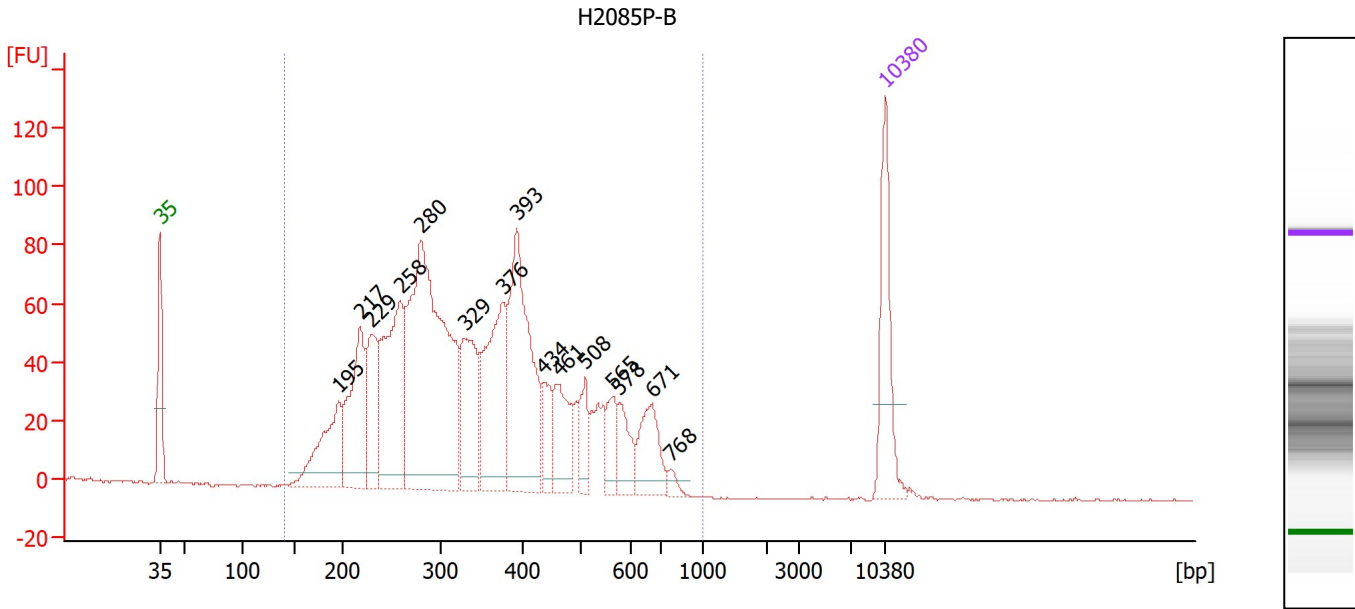
Region table for sample 2 : BC miRNA 6.22.20

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
72	410	1,772.9	89	207	28.7	1,850.28	15,140.9	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 3 : H2085P-B

Number of peaks found: 15 Corr. Area 1: 2,017.3
 Noise: 0.2

Peak table for sample 3 : H2085P-B

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	195	117.81	915.5	
3	217	152.79	1,066.9	
4	229	95.80	635.0	
5	258	199.57	1,169.9	
6	280	472.13	2,554.5	
7	329	112.63	519.0	
8	376	161.89	651.9	
9	393	220.15	848.8	
10	434	38.90	135.9	
11	461	63.36	208.3	
12	508	34.75	103.7	
13	565	32.24	86.5	
14	578	37.82	99.1	
15	671	57.98	131.0	
16	768	7.85	15.5	
17	10,380	75.00	10.9	Upper Marker

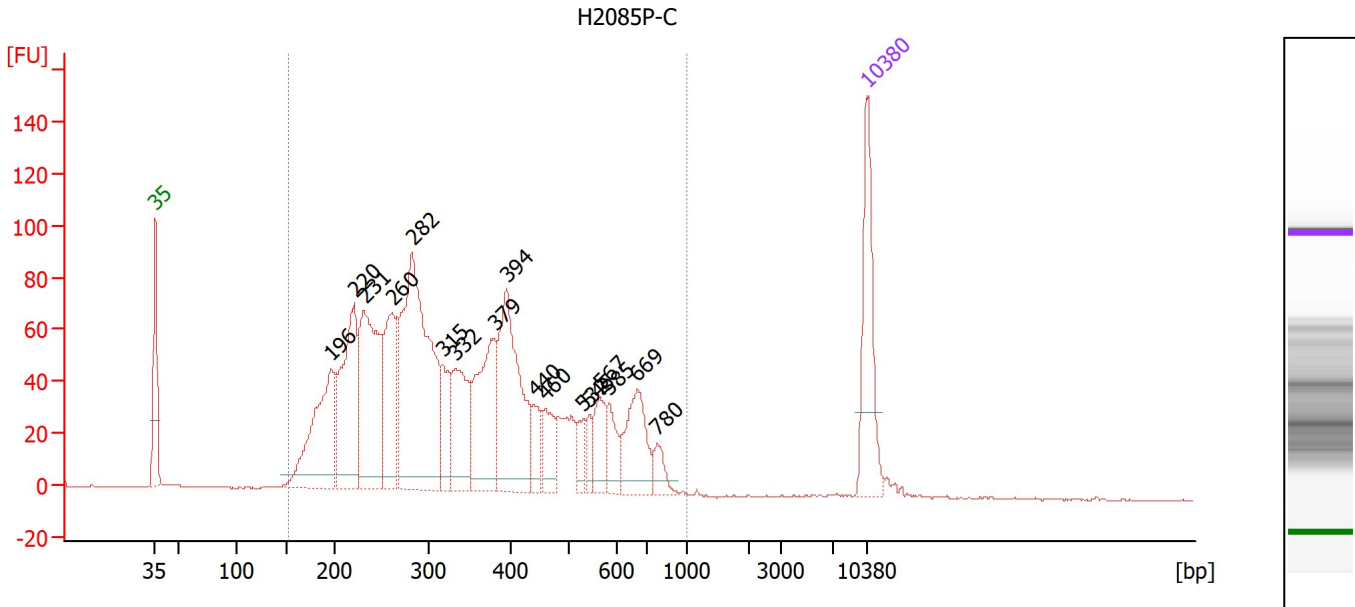
Region table for sample 3 : H2085P-B

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
140	1,000	2,017.3	100	359	34.6	1,805.27	8,937.6	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 4 : H2085P-C

Number of peaks found: 17 Corr. Area 1: 2,241.1
 Noise: 0.3

Peak table for sample 4 : H2085P-C

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	196	159.93	1,237.0	
3	220	161.62	1,112.8	
4	231	198.27	1,301.8	
5	260	114.10	664.6	
6	282	334.91	1,802.2	
7	315	47.70	229.2	
8	332	90.36	412.8	
9	379	118.27	472.3	
10	394	165.82	636.9	
11	440	26.81	92.3	
12	460	33.98	111.9	
13	532	18.39	52.4	
14	545	15.59	43.4	
15	567	33.71	90.1	
16	585	27.26	70.6	
17	669	66.42	150.4	
18	780	17.48	34.0	
19	10,380	75.00	10.9	Upper Marker

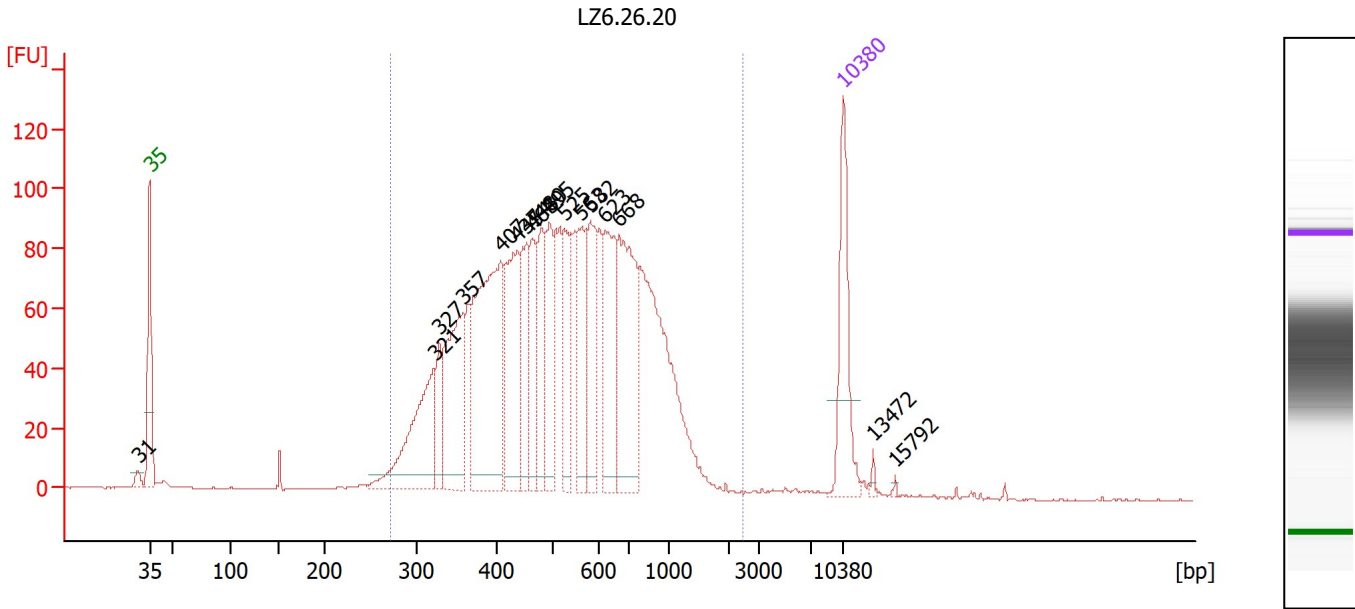
Region table for sample 4 : H2085P-C

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
151	1,000	2,241.1	99	359	39.7	1,720.85	8,855.9	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 5 : LZ6.26.20

Number of peaks found: 17 Corr. Area 1: 2,374.0
 Noise: 0.2

Peak table for sample 5 : LZ6.26.20

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	321	145.14	684.8	
4	327	41.82	193.7	
5	357	144.28	611.7	
6	407	259.51	965.7	
7	437	136.44	473.4	
8	454	79.77	266.3	
9	463	62.17	203.3	
10	480	68.08	214.7	
11	495	78.52	240.5	
12	525	69.95	202.0	
13	563	71.51	192.5	
14	582	83.20	216.5	
15	623	103.93	252.9	
16	668	165.59	375.8	
17	10,380	75.00	10.9	Upper Marker
18	13,472	0.00	0.0	
19	15,792	0.00	0.0	

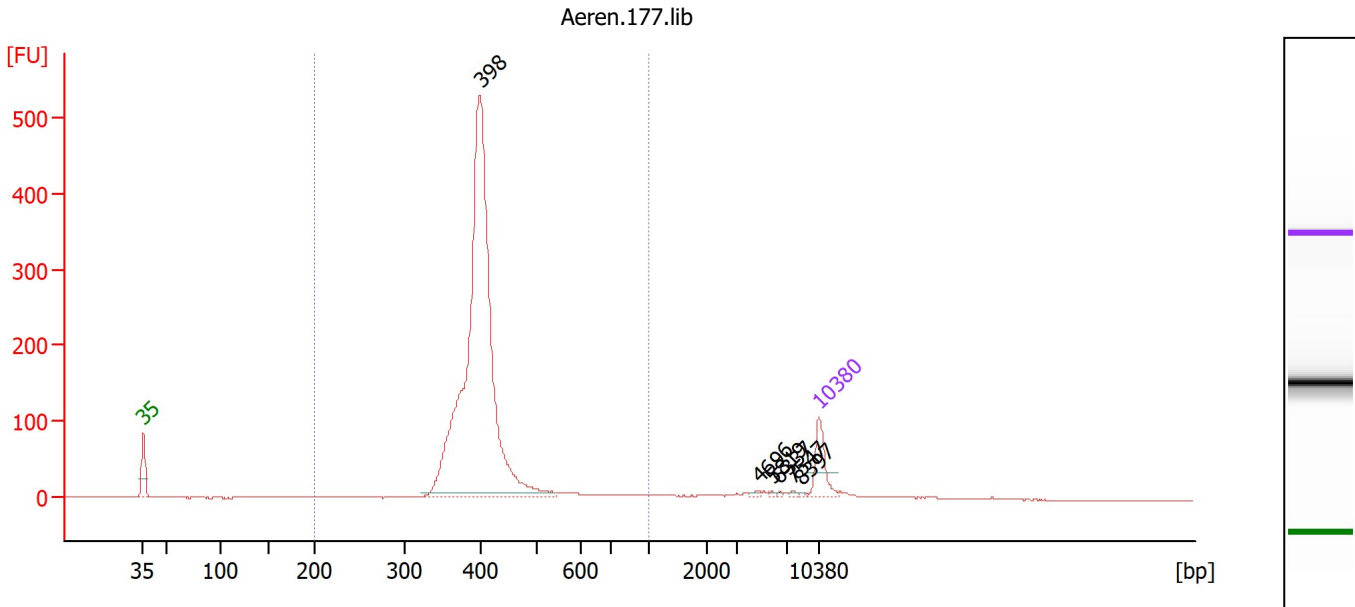
Region table for sample 5 : LZ6.26.20

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
272	2,463	2,374.0	96	566	41.0	2,021.80	6,400.3	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 6 : Aeren.177.lib

Number of peaks found: 6 Corr. Area 1: 2,015.3
 Noise: 0.3

Peak table for sample 6 : Aeren.177.lib

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	398	1,885.22	7,177.4	
3	4,696	5.31	1.7	
4	5,819	2.87	0.7	
5	6,337	2.59	0.6	
6	7,547	3.41	0.7	
7	8,397	2.71	0.5	
8	10,380	75.00	10.9	Upper Marker

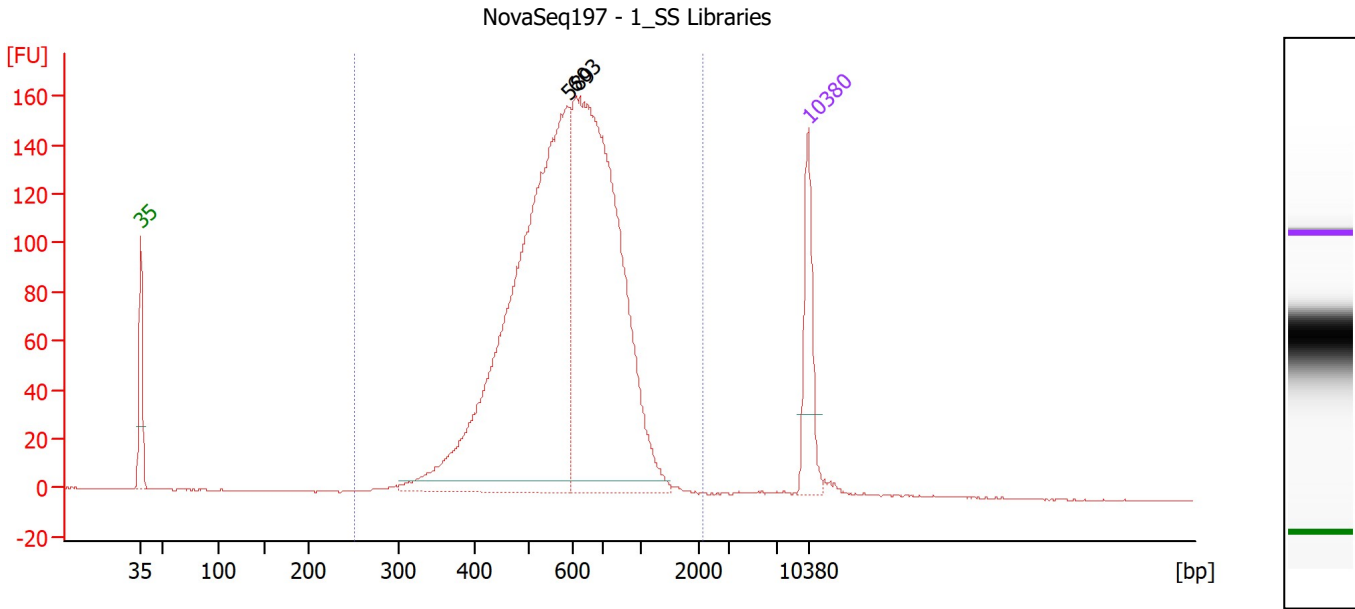
Region table for sample 6 : Aeren.177.lib

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
200	1,000	2,015.3	91	410	16.9	2,036.88	7,701.3	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 7 : NovaSeq197 - 1 SS Libraries

Number of peaks found: 2 Corr. Area 1: 2,358.7
 Noise: 0.2

Peak table for sample 7 : NovaSeq197 - 1 SS Libraries

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	589	876.93	2,255.9	
3	603	754.71	1,895.3	
4	10,380	75.00	10.9	Upper Marker

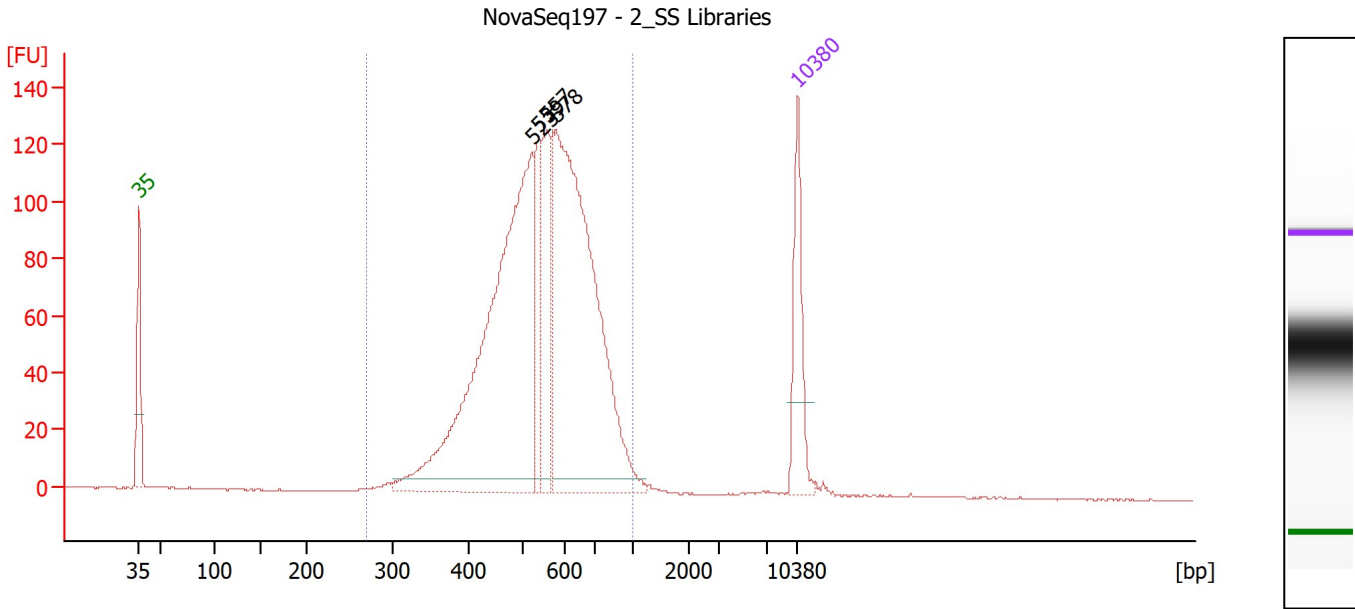
Region table for sample 7 : NovaSeq197 - 1 SS Libraries

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
251	2,142	2,358.7	99	620	28.7	1,735.23	4,637.6	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 8 : NovaSeq197 - 2 SS Libraries

Number of peaks found: 4 Corr. Area 1: 1,790.7
 Noise: 0.2

Peak table for sample 8 : NovaSeq197 - 2 SS Libraries

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	523	648.93	1,878.7	
3	539	92.32	259.5	
4	557	112.18	305.0	
5	578	588.99	1,544.1	
6	10,380	75.00	10.9	Upper Marker

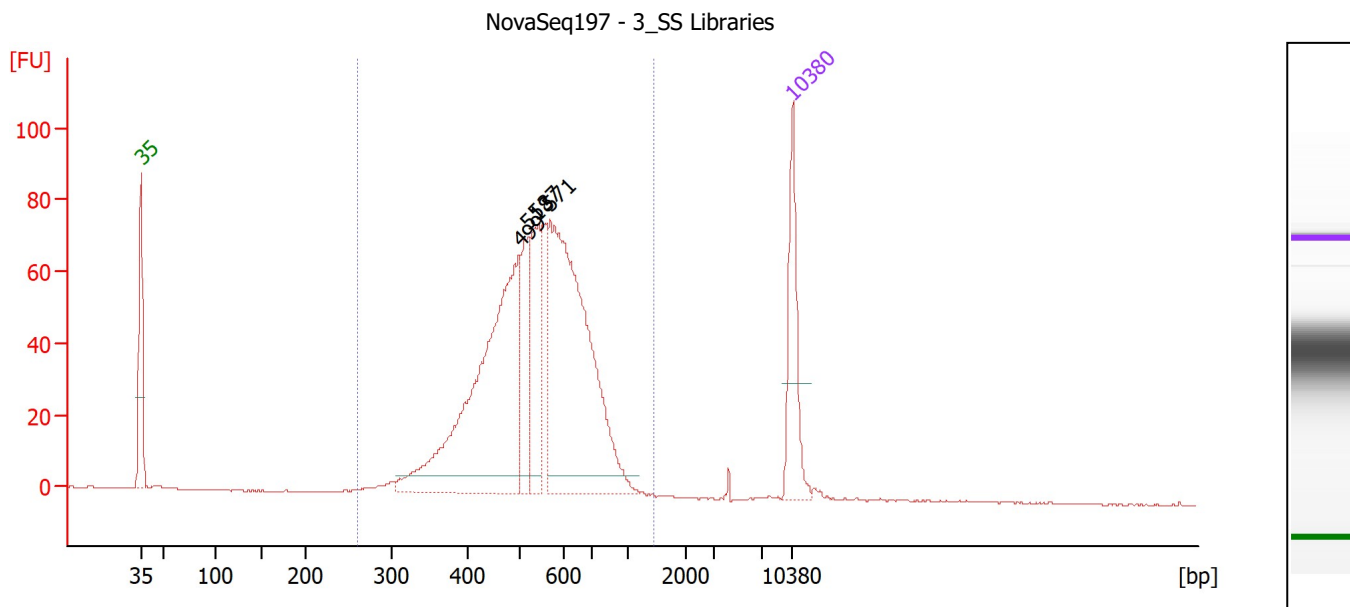
Region table for sample 8 : NovaSeq197 - 2 SS Libraries

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
270	1,000	1,790.7	98	557	21.5	1,487.77	4,298.9	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 9 : NovaSeq197 - 3 SS Libraries

Number of peaks found: 4 Corr. Area 1: 1,102.0
 Noise: 0.2

Peak table for sample 9 : NovaSeq197 - 3 SS Libraries

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	499	437.86	1,330.0	
3	518	88.05	257.5	
4	537	105.02	296.6	
5	571	423.48	1,124.0	
6	10,380	75.00	10.9	Upper Marker

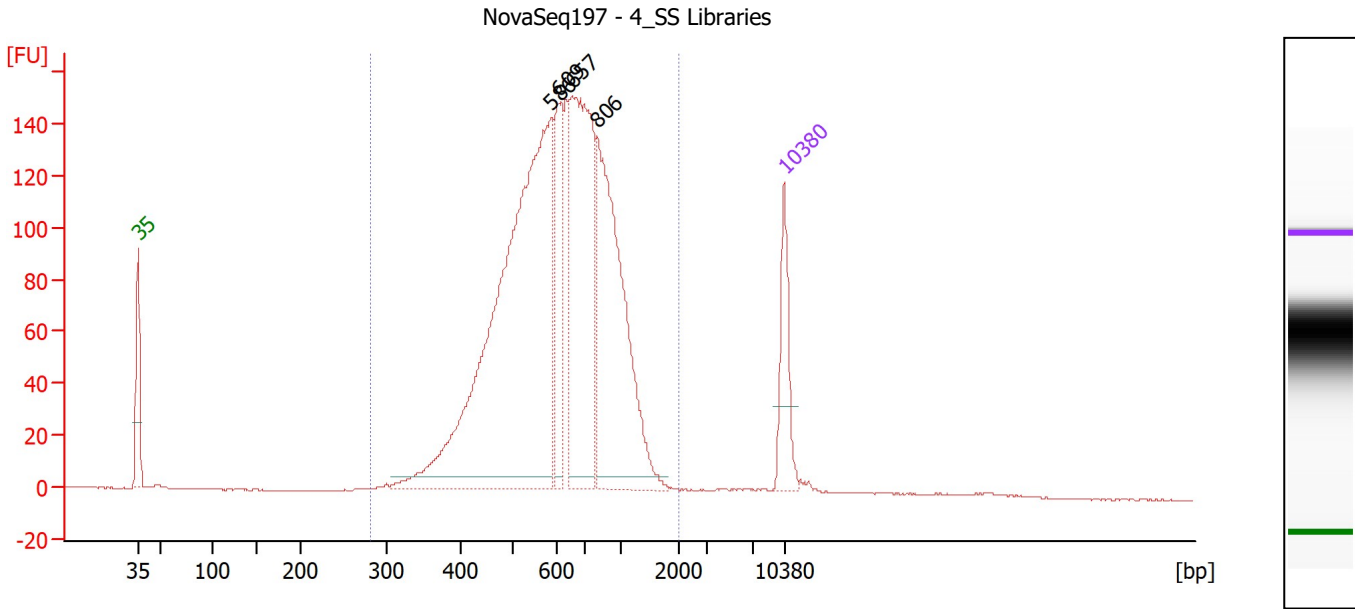
Region table for sample 9 : NovaSeq197 - 3 SS Libraries

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
260	1,430	1,102.0	99	548	22.6	1,147.48	3,391.1	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 10 : NovaSeq197 - 4 SS Libraries

Number of peaks found: 4 Corr. Area 1: 2,380.2
 Noise: 0.2

Peak table for sample 10 : NovaSeq197 - 4 SS Libraries

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	586	984.15	2,544.4	
3	609	153.60	382.1	
4	657	420.42	969.3	
5	806	435.95	819.2	
6	10,380	75.00	10.9	Upper Marker

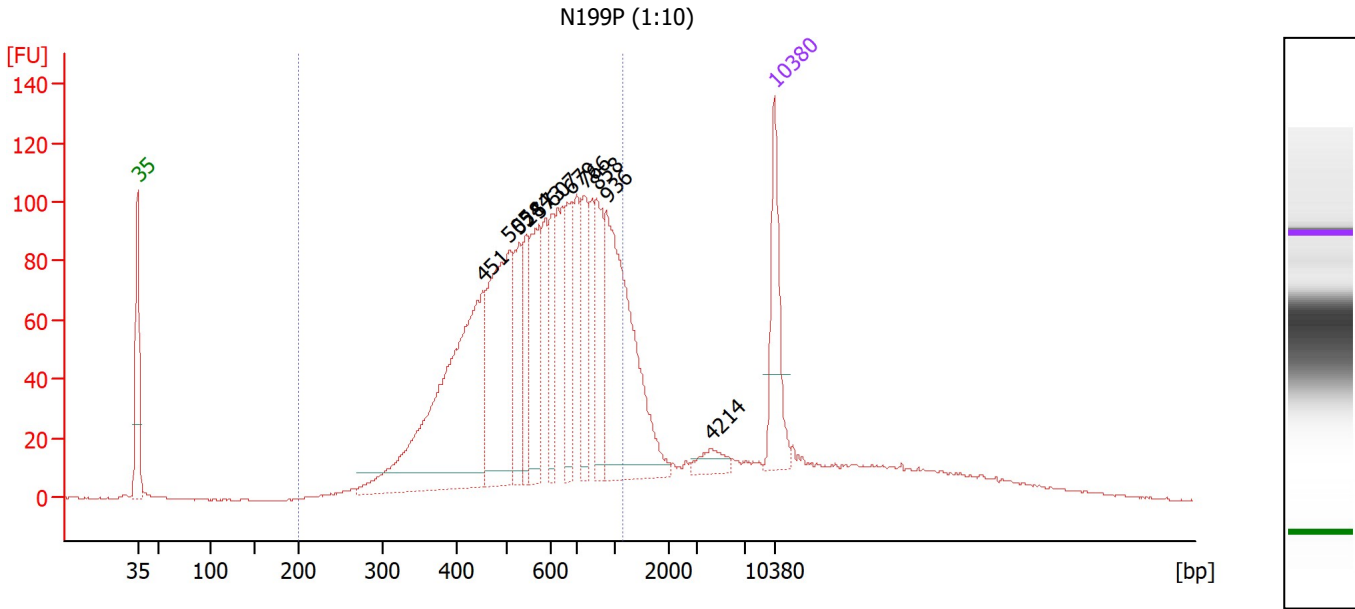
Region table for sample 10 : NovaSeq197 - 4 SS Libraries

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
281	2,027	2,380.2	98	665	33.2	2,228.04	5,693.8	Blue

Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 AM

Electropherogram Summary Continued ...



Overall Results for sample 11 : N199P (1:10)

Number of peaks found: 11 Corr. Area 1: 2,042.0
 Noise: 0.2

Peak table for sample 11 : N199P (1:10)

Peak	Size [bp]	Conc. [pg/μl]	Molarity [pmol/l]	Observations
1	35	125.00	5,411.3	Lower Marker
2	451	406.19	1,363.4	
3	505	220.95	662.7	
4	528	78.73	226.0	
5	544	60.97	169.8	
6	573	106.56	281.8	
7	607	61.16	152.8	
8	679	79.26	176.9	
9	766	77.51	153.3	
10	858	80.39	142.0	
11	936	250.87	406.0	
12	4,214	17.13	6.2	
13	10,380	75.00	10.9	Upper Marker

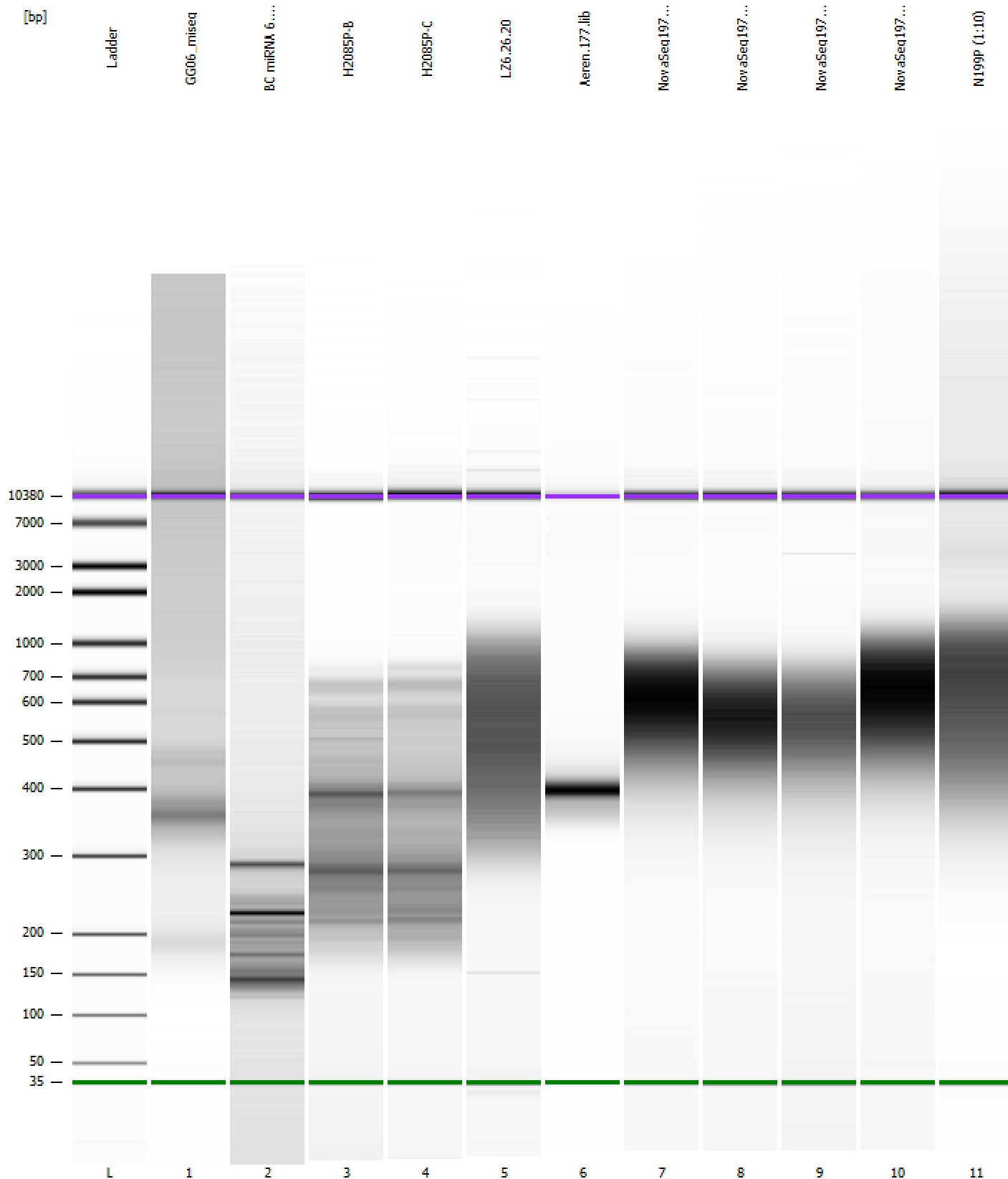
Region table for sample 11 : N199P (1:10)

From [bp]	To [bp]	Corr. Area	% of Total	Average Size [bp]	Size distribution in CV [%]	Conc. [pg/μl]	Molarity [pmol/l]	Color
200	1,168	2,042.0	79	611	32.5	1,742.61	4,978.5	Blue

Assay Class: High Sensitivity DNA Assay
Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
Modified: 6/30/2020 10:12:03 AM

Gel Image



Assay Class: High Sensitivity DNA Assay
 Data Path: Z:\...\Bioanalyzer1_High Sensitivity DNA Assay_2020-06-29_001.xad

Created: 6/29/2020 3:04:03 PM
 Modified: 6/30/2020 10:12:03 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		6/29/2020 3:45:23 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Run started on port 1 (File: Z:\XADs\2020-06-29\Bioanalyze r1_High Sensitivity DNA Assay_2020-06-29_001.xad)		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Product Number : G2938C		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Name :		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Vendor : Agilent Technologies		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Serial# : DE34903152		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Firmware : C.01.069		Instrument	Run		6/29/2020 3:04:10 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB
Cartridge : Electrode		Instrument	Run		6/29/2020 3:04:09 PM	(GMT --07:00) Pacific Standard Time	sbsuser	DESKTOP-4UNV VOB