

Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
Modified: 6/5/2015 1:42:45 PM

**Electrophoresis File Run Summary**

Instrument Information:

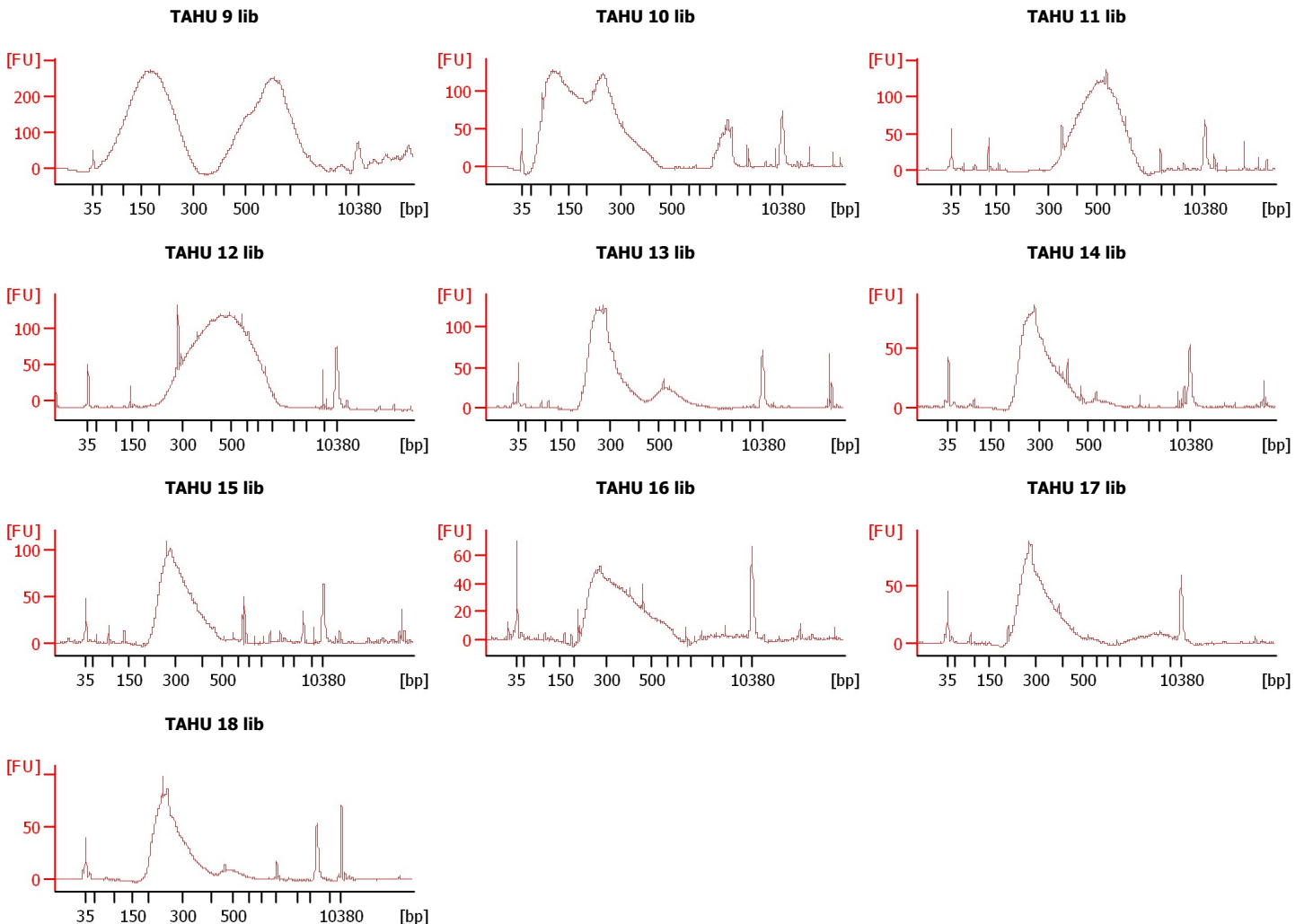
Instrument Name: DE13701086      Firmware: C.01.069  
Serial#: DE13701086      Type: G2938B

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:



Assay Class: High Sensitivity DNA Assay  
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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

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

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
TAHU 9 lib		<input type="checkbox"/>	✓			
TAHU 10 lib		<input type="checkbox"/>	✓			
TAHU 11 lib		<input type="checkbox"/>	✓			
TAHU 12 lib		<input type="checkbox"/>	✓			
TAHU 13 lib		<input type="checkbox"/>	✓			
TAHU 14 lib		<input type="checkbox"/>	✓			
TAHU 15 lib		<input type="checkbox"/>	✓			
TAHU 16 lib		<input type="checkbox"/>	✓			
TAHU 17 lib		<input type="checkbox"/>	✓			
TAHU 18 lib		<input type="checkbox"/>	✓			
Ladder		<input type="checkbox"/>	✓			

**Chip Lot #**

**Reagent Kit Lot #**

**Chip Comments :**

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 Modified: 6/5/2015 1:42:45 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] : 20  
 Area Threshold : 0.1  
 Width Threshold [s] : 0.6  
 Baseline Plateau [s] : 0.5

**Filter Settings**

Filter Width [s] : 0.5  
 Polynomial Order : 4

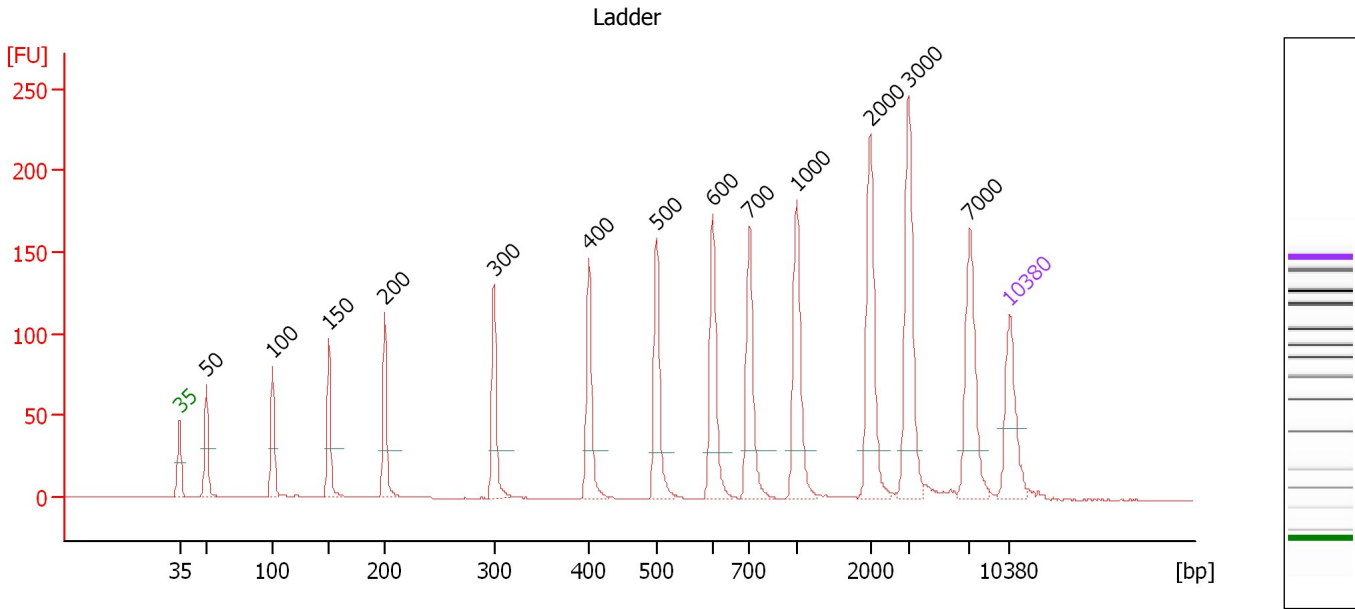
**Ladder**

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

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**Electropherogram Summary**



**Overall Results for Ladder**

Noise: 0.1

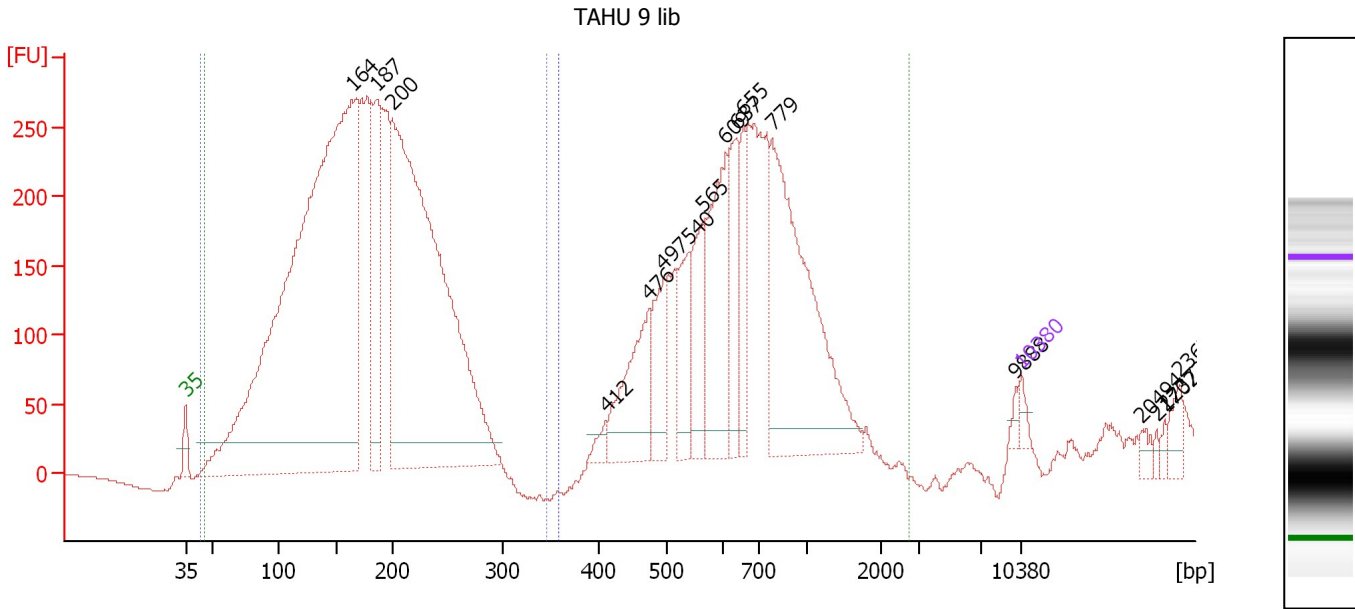
**Peak table for Ladder**

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	45.25
3	100	150.00	2,272.7	Ladder Peak	50.87
4	150	150.00	1,515.2	Ladder Peak	55.59
5	200	150.00	1,136.4	Ladder Peak	60.31
6	300	150.00	757.6	Ladder Peak	69.53
7	400	150.00	568.2	Ladder Peak	77.53
8	500	150.00	454.5	Ladder Peak	83.24
9	600	150.00	378.8	Ladder Peak	87.96
10	700	150.00	324.7	Ladder Peak	91.06
11	1,000	150.00	227.3	Ladder Peak	95.02
12	2,000	150.00	113.6	Ladder Peak	101.22
13	3,000	150.00	75.8	Ladder Peak	104.46
14	7,000	150.00	32.5	Ladder Peak	109.63
15	10,380	75.00	10.9	Upper Marker	113.00

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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 1 : TAHU 9 lib**

Number of peaks found: 17                      Corr. Area 2: 3,151.0  
 Noise: 0.3                                          Corr. Area 3: 9,651.5  
 Corr. Area 1: 6,500.5

**Peak table for sample 1 : TAHU 9 lib**

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	164	14,083.67	129,959.9		56.93
3	187	1,778.77	14,420.6		59.07
4	200	8,753.84	66,271.9		60.32
5	412	117.01	430.1		78.22
6	476	1,059.98	3,377.5		81.84
7	497	589.77	1,799.4		83.04
8	540	583.72	1,636.7		85.14
9	565	660.97	1,772.7		86.30
10	609	1,321.20	3,289.5		88.22
11	637	739.46	1,758.0		89.12
12	655	475.19	1,099.9		89.65
13	779	2,901.79	5,641.3		92.11
14	9,888	52.30	8.0		112.51
15	10,380	75.00	10.9	Upper Marker	113.00
16	20,494	0.00	0.0		123.09
17	21,702	0.00	0.0		124.29
18	22,373	0.00	0.0		124.96
19	23,626	0.00	0.0		126.21

**Region table for sample 1 : TAHU 9 lib**


From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
44	173	347	6,500.5	279,000.9	67	29.3	27,659.44
46	403	2,743	9,651.5	301,269.5	100	74.6	36,996.65

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Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**

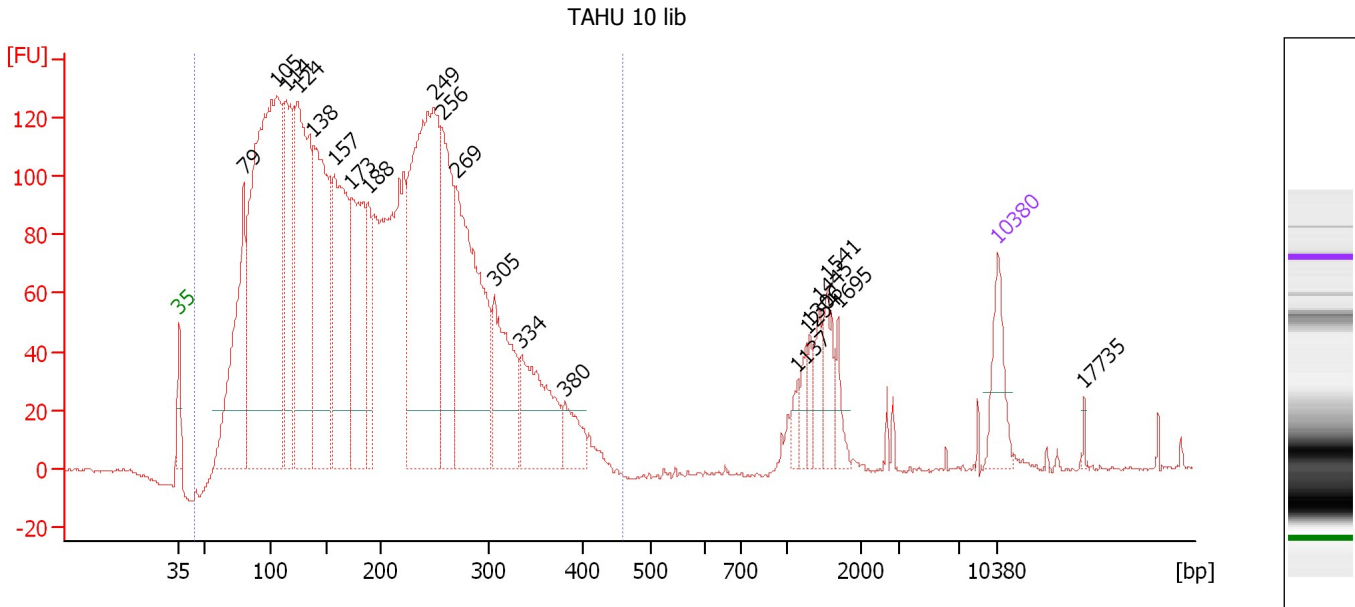
... Region table for sample 1 : TAHU 9 lib

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]	Conc. [pg/μl]
359	700	2,743	3,151.0	22,273.4	 33	31.1	9,337.35

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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 2 : TAHU 10 lib**

Number of peaks found: 21                      Corr. Area 1: 4,553.9  
 Noise: 0.6

**Peak table for sample 2 : TAHU 10 lib**


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	79	527.96	10,118.0		48.51
3	105	1,543.74	22,276.0		51.34
4	114	428.42	5,709.6		52.16
5	124	783.31	9,547.4		53.16
6	138	648.44	7,103.6		54.48
7	157	528.13	5,092.5		56.26
8	173	417.28	3,663.5		57.72
9	188	172.92	1,397.1		59.13
10	249	893.77	5,448.3		64.78
11	256	361.04	2,137.1		65.47
12	269	612.67	3,453.1		66.65
13	305	256.20	1,272.3		69.93
14	334	243.07	1,102.2		72.26
15	380	73.95	295.1		75.90
16	1,137	23.55	31.4		95.86
17	1,254	26.25	31.7		96.59
18	1,306	30.42	35.3		96.91
19	1,445	46.99	49.3		97.78
20	1,541	59.99	59.0		98.37
21	1,695	33.30	29.8		99.33
22	10,380	75.00	10.9	Upper Marker	113.00
23	17,735	0.00	0.0		120.34

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Created: 6/5/2015 1:01:44 PM  
Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**

... Region table for sample 2 : TAHU 10 lib

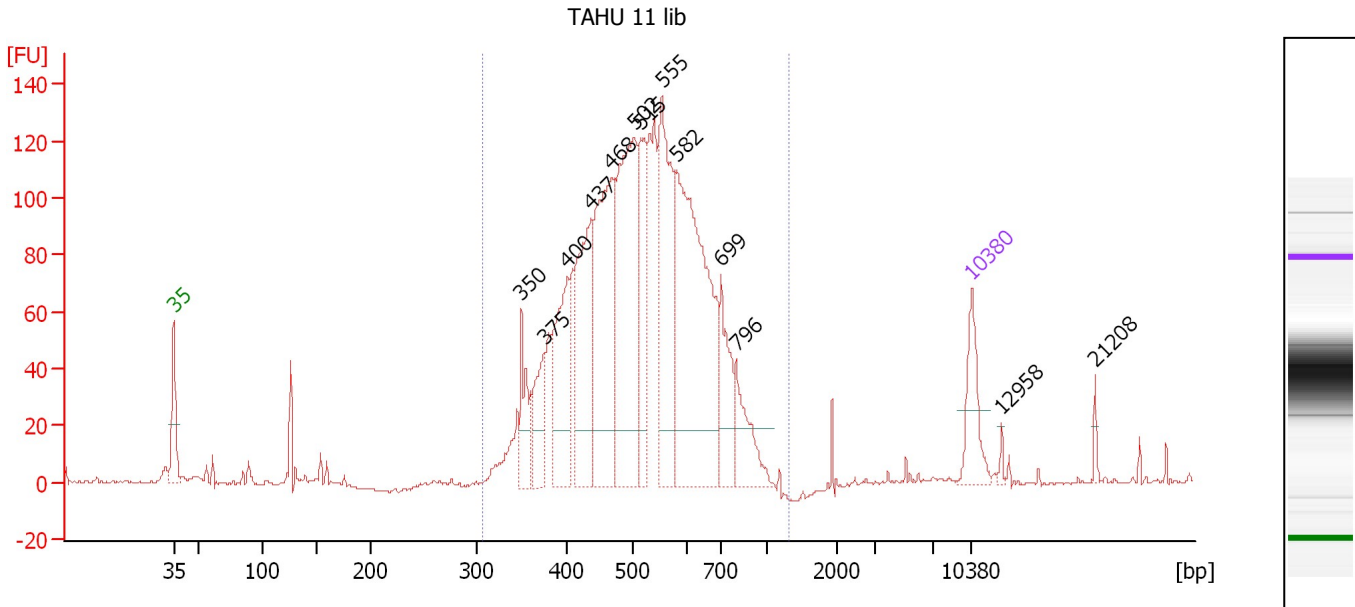
From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]	Conc. [pg/ $\mu$ l]
44	195	461	4,553.9	85,915.6	 95	42.0	8,362.68



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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 3 : TAHU 11 lib**

Number of peaks found: 13                      Corr. Area 1: 2,090.1  
 Noise: 0.5

**Peak table for sample 3 : TAHU 11 lib**

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	350	93.67	406.0		73.49
3	375	101.15	409.1		75.50
4	400	219.57	830.7		77.56
5	437	301.85	1,047.7		79.61
6	468	402.14	1,302.9		81.39
7	502	453.96	1,368.9		83.35
8	515	187.26	550.6		83.96
9	555	319.25	871.6		85.83
10	582	607.45	1,582.2		87.09
11	699	125.33	271.7		91.02
12	796	100.88	191.9		92.33
13	10,380	75.00	10.9	Upper Marker	113.00
14	12,958	0.00	0.0		115.57
15	21,208	0.00	0.0		123.80

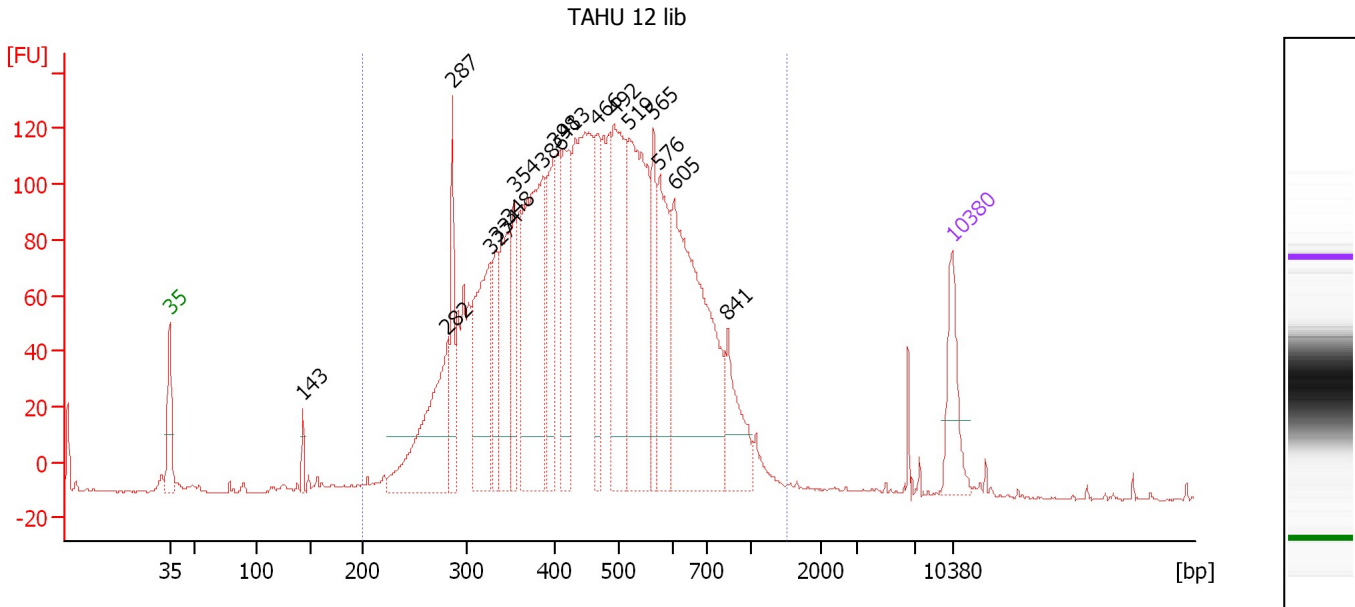
**Region table for sample 3 : TAHU 11 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
308	525	1,322	2,090.1	9,889.1	96	21.7	3,226.64

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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 4 : TAHU 12 lib**

Number of peaks found: 17      Corr. Area 1: 3,510.1  
 Noise: 0.3

**Peak table for sample 4 : TAHU 12 lib**

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	143	24.61	260.9		54.92
3	282	293.47	1,578.2		67.84
4	287	125.22	661.2		68.32
5	327	268.58	1,245.8		71.66
6	334	105.54	479.1		72.23
7	348	183.44	798.4		73.37
8	354	116.99	500.6		73.85
9	386	414.62	1,626.5		76.43
10	398	172.17	655.2		77.38
11	413	177.97	652.5		78.29
12	466	128.71	418.6		81.29
13	492	283.80	874.4		82.77
14	519	381.58	1,113.2		84.15
15	565	105.27	282.4		86.30
16	576	178.15	468.7		86.82
17	605	500.72	1,254.3		88.11
18	841	107.60	193.8		92.93
19	10,380	75.00	10.9	Upper Marker	113.00

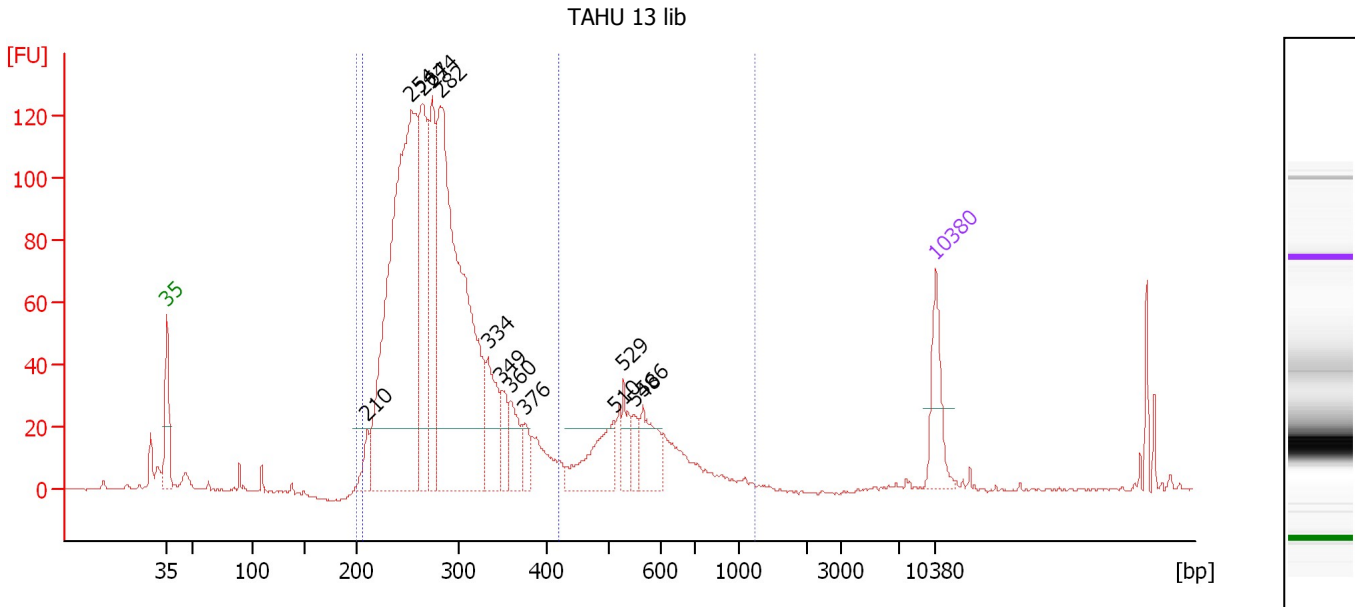
**Region table for sample 4 : TAHU 12 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
200	477	1,519	3,510.1	16,427.7	99	32.7	4,528.60

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 5 : TAHU 13 lib**

Number of peaks found: 13      Corr. Area 1: 1,876.2  
 Noise: 0.3      Corr. Area 2: 1,612.4

**Peak table for sample 5 : TAHU 13 lib**

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	210	48.43	349.1		61.25
3	254	1,125.63	6,715.8		65.28
4	264	347.80	1,992.4		66.25
5	274	249.64	1,378.0		67.17
6	282	1,027.33	5,522.3		67.85
7	334	127.09	577.0		72.22
8	349	60.42	261.9		73.49
9	360	71.63	301.7		74.31
10	376	39.41	158.7		75.62
11	510	127.39	378.2		83.73
12	529	49.22	141.0		84.60
13	548	37.71	104.2		85.52
14	566	82.25	220.2		86.35
15	10,380	75.00	10.9	Upper Marker	113.00

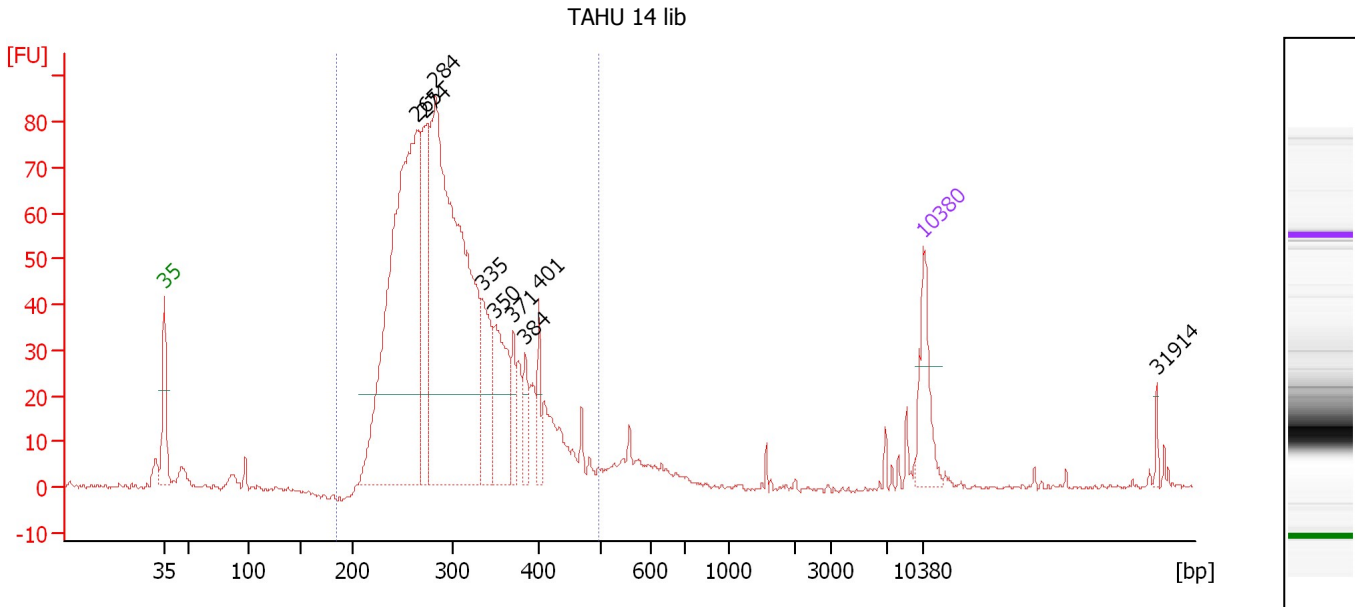
**Region table for sample 5 : TAHU 13 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
200	333	1,240	1,876.2	18,353.0	96	38.4	3,550.83
205	282	420	1,612.4	17,166.0	82	15.0	3,126.47

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 Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 6 : TAHU 14 lib**

Number of peaks found: 9                      Corr. Area 1: 1,226.7  
 Noise: 0.6

**Peak table for sample 6 : TAHU 14 lib**

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	265	989.65	5,658.1		66.30
3	274	210.04	1,163.4		67.09
4	284	1,108.46	5,920.4		68.02
5	335	131.19	592.9		72.35
6	350	157.19	680.5		73.53
7	371	57.48	234.8		75.20
8	384	47.19	186.0		76.28
9	401	46.97	177.7		77.56
10	10,380	75.00	10.9	Upper Marker	113.00
11	31,914	0.00	0.0		134.48

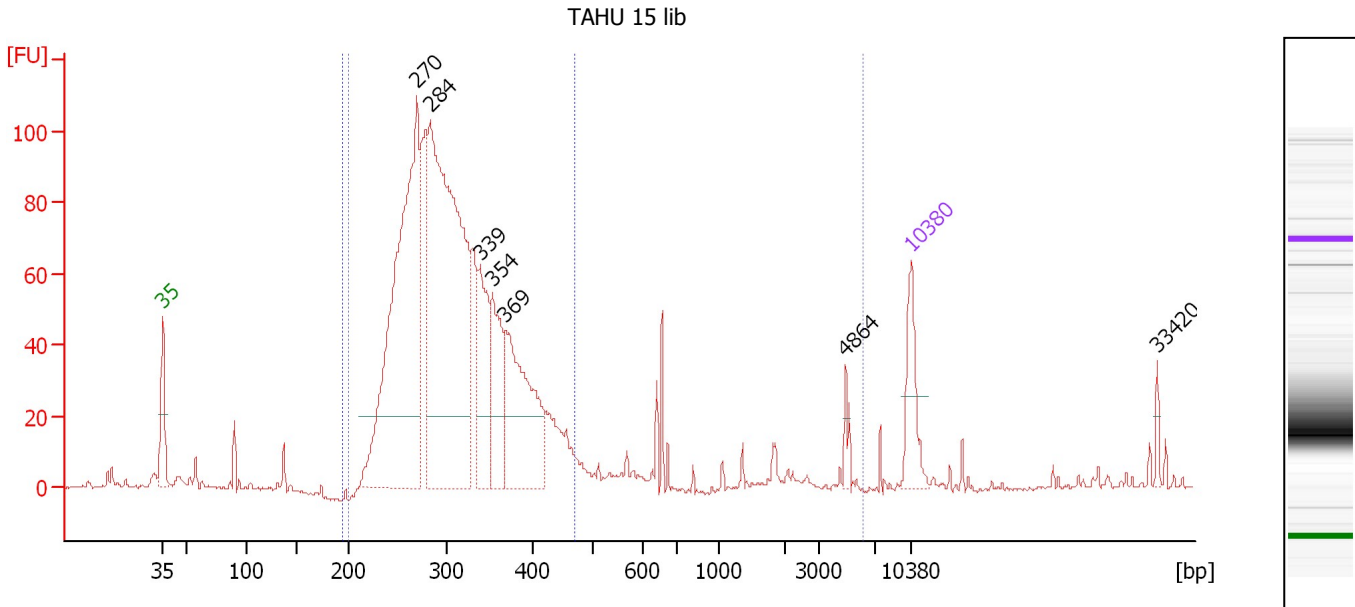
**Region table for sample 6 : TAHU 14 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
186	305	496	1,226.7	15,554.7	92	18.5	3,003.51

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 Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 7 : TAHU 15 lib**

Number of peaks found: 7                      Corr. Area 1: 1,590.3  
 Noise: 0.6                                      Corr. Area 2: 1,496.8

**Peak table for sample 7 : TAHU 15 lib**

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	270	944.08	5,293.2		66.78
3	284	1,107.35	5,912.8		68.03
4	339	191.90	857.1		72.67
5	354	171.92	735.5		73.86
6	369	324.89	1,333.5		75.06
7	4,864	18.57	5.8		106.87
8	10,380	75.00	10.9	Upper Marker	113.00
9	33,420	0.00	0.0		135.98

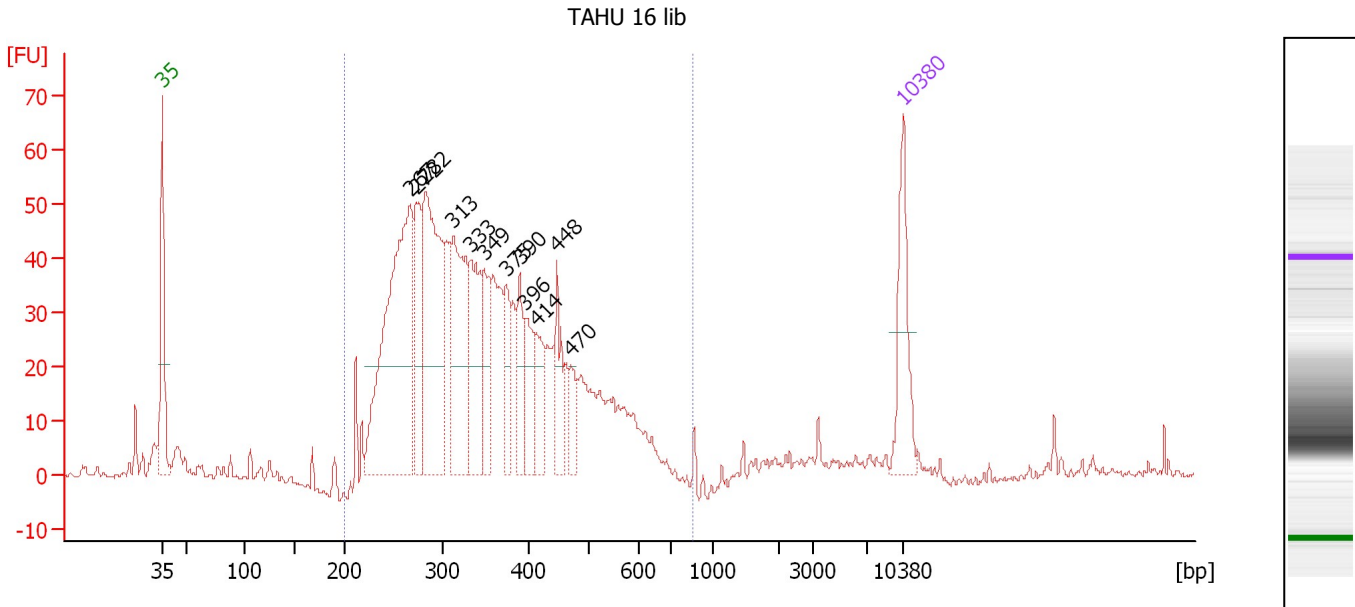
**Region table for sample 7 : TAHU 15 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
196	312	471	1,496.8	15,656.2	90	17.1	3,107.17
200	416	6,174	1,590.3	15,958.9	95	100.0	3,259.60

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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 8 : TAHU 16 lib**

Number of peaks found: 12      Corr. Area 1: 1,118.4  
 Noise: 0.8

**Peak table for sample 8 : TAHU 16 lib**

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	451.89	2,567.8		66.45
3	272	118.58	660.3		66.95
4	282	299.83	1,611.4		67.86
5	313	195.20	946.4		70.53
6	333	126.52	576.3		72.14
7	349	73.45	318.9		73.45
8	375	54.83	221.7		75.51
9	390	54.66	212.1		76.77
10	396	62.99	240.9		77.22
11	414	50.05	183.2		78.33
12	448	56.79	191.9		80.29
13	470	34.26	110.3		81.55
14	10,380	75.00	10.9	Upper Marker	113.00

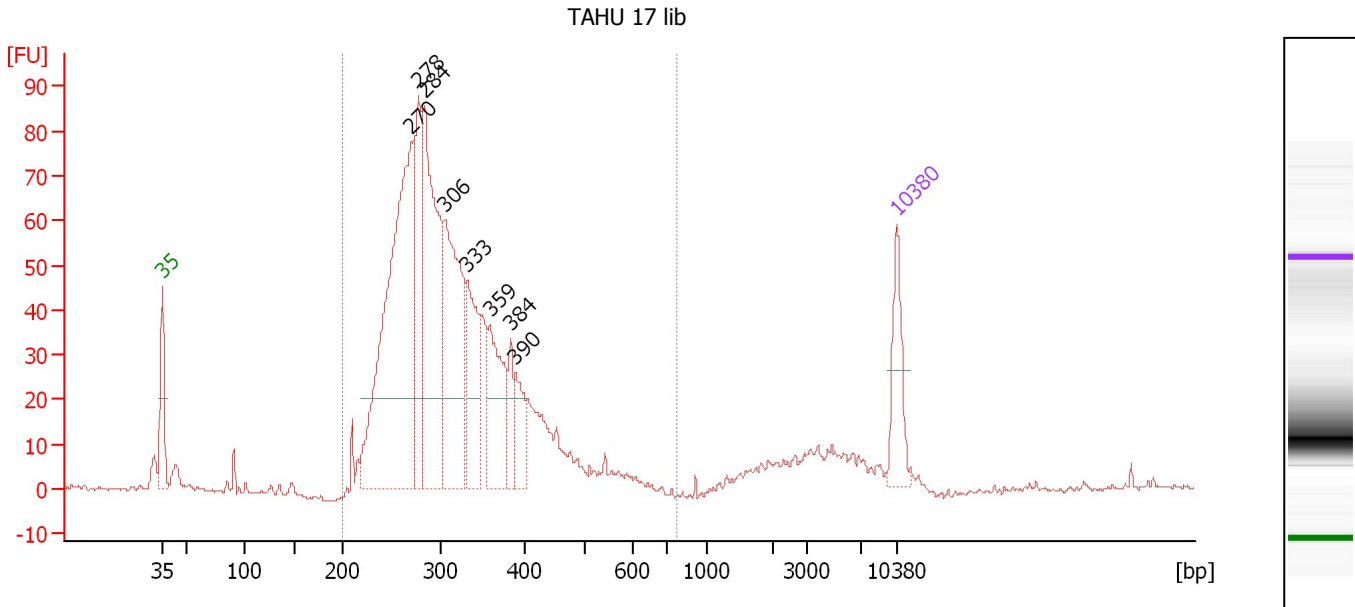
**Region table for sample 8 : TAHU 16 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
200	356	848	1,118.4	10,132.8	90	27.4	2,165.46

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Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 9 : TAHU 17 lib**

Number of peaks found: 8      Corr. Area 1: 1,168.1  
 Noise: 0.4

**Peak table for sample 9 : TAHU 17 lib**

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	270	793.54	4,456.8		66.74
3	278	219.65	1,196.9		67.50
4	284	468.94	2,505.6		68.01
5	306	357.69	1,772.0		69.99
6	333	169.60	772.8		72.13
7	359	170.05	717.3		74.26
8	384	50.68	200.0		76.25
9	390	70.76	275.1		76.70
10	10,380	75.00	10.9	Upper Marker	113.00

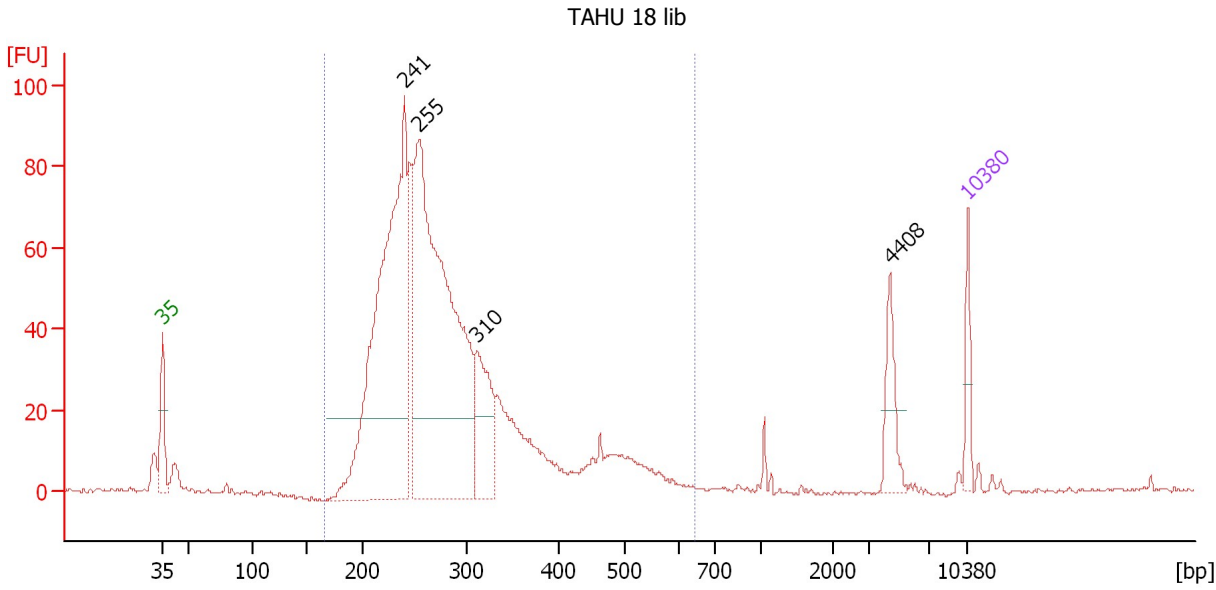
**Region table for sample 9 : TAHU 17 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of Ior Total	Size distribution in CV [%]	Conc. [pg/μl]
200	315	776	1,168.1	13,074.3	92	20.9	2,590.45

Assay Class: High Sensitivity DNA Assay  
 Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
 Modified: 6/5/2015 1:42:45 PM

**Electropherogram Summary Continued ...**



**Overall Results for sample 10 : TAHU 18 lib**

Number of peaks found: 4                      Corr. Area 1: 1,226.6  
 Noise: 0.5

**Peak table for sample 10 : TAHU 18 lib**

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	241	1,976.84	12,451.4		64.05
3	255	2,293.69	13,648.1		65.34
4	310	366.06	1,787.3		70.35
5	4,408	133.52	45.9		106.28
6	10,380	75.00	10.9	Upper Marker	113.00

**Region table for sample 10 : TAHU 18 lib**

From [bp]	Average Size [bp]	To [bp]	Corr. Area	Molarity [pmol/l]	Co % of lor Total	Size distribution in CV [%]	Conc. [pg/μl]
166	286	642	1,226.6	30,488.9	92	26.6	5,381.51



Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
Modified: 6/5/2015 1:42:45 PM

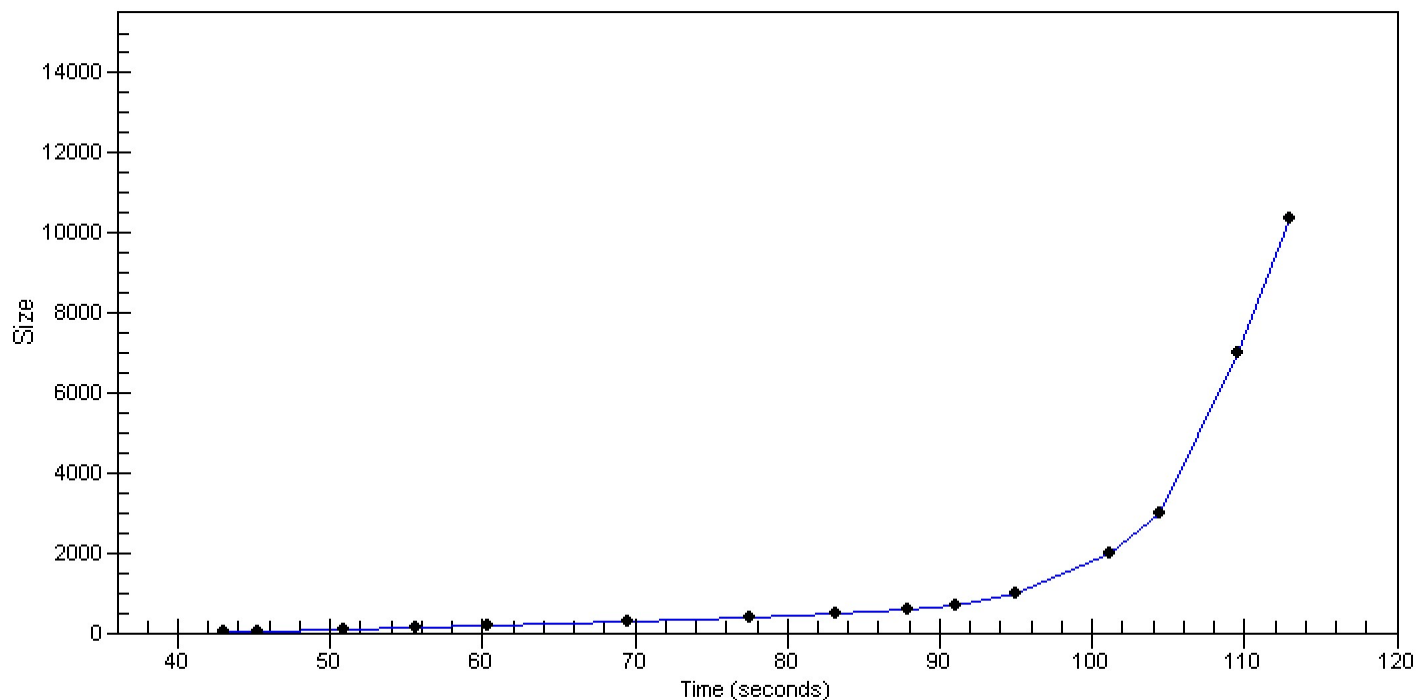
**Gel Image**

Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
Modified: 6/5/2015 1:42:45 PM

**Curves**

**Standard Curve**



Assay Class: High Sensitivity DNA Assay  
Data Path: C:\...ents and Settings\Bioanalyzer\2015-06-05\2015-06-05\_003.xad

Created: 6/5/2015 1:01:44 PM  
Modified: 6/5/2015 1:42:45 PM

**Invalid Samples**

Sample 11 has not been run, no results available.