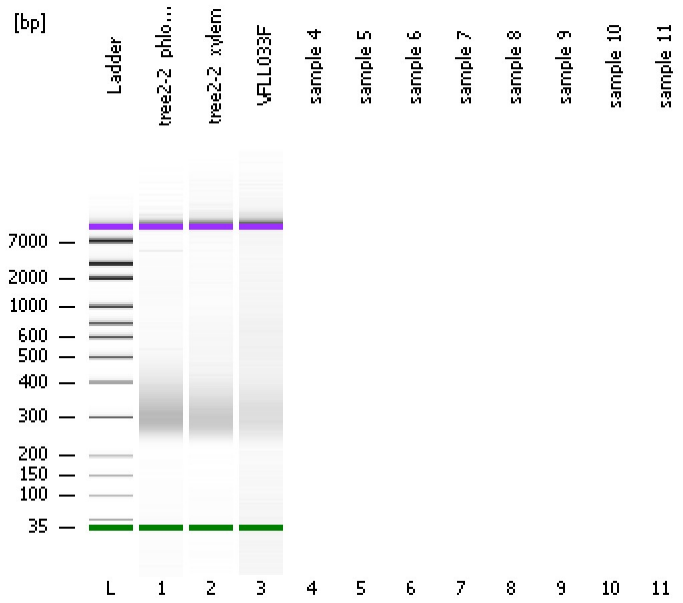
Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 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

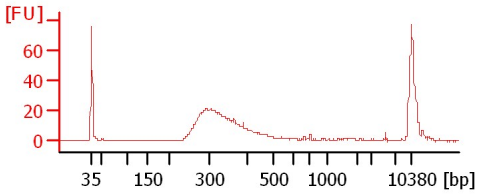
Chip Information:

Chip Lot #:

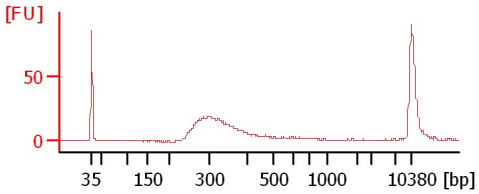
Reagent Kit Lot #:

Chip Comments:

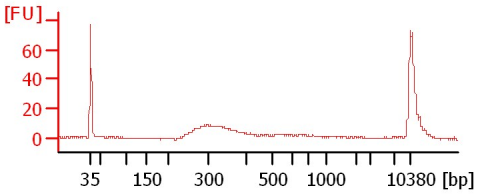
tree2-2_phloem



tree2-2_xylem



VFLL033F



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
tree2-2_phloem		☐	✓			
tree2-2_xylem		☐	✓			
VFLL033F		☐	✓			
sample 4		☐	✗			
sample 5		☐	✗			
sample 6		☐	✗			
sample 7		☐	✗			
sample 8		☐	✗			
sample 9		☐	✗			
sample 10		☐	✗			
sample 11		☐	✗			
Ladder		☐	✓			

Chip Lot # **Reagent Kit Lot #**

Chip Comments :

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 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

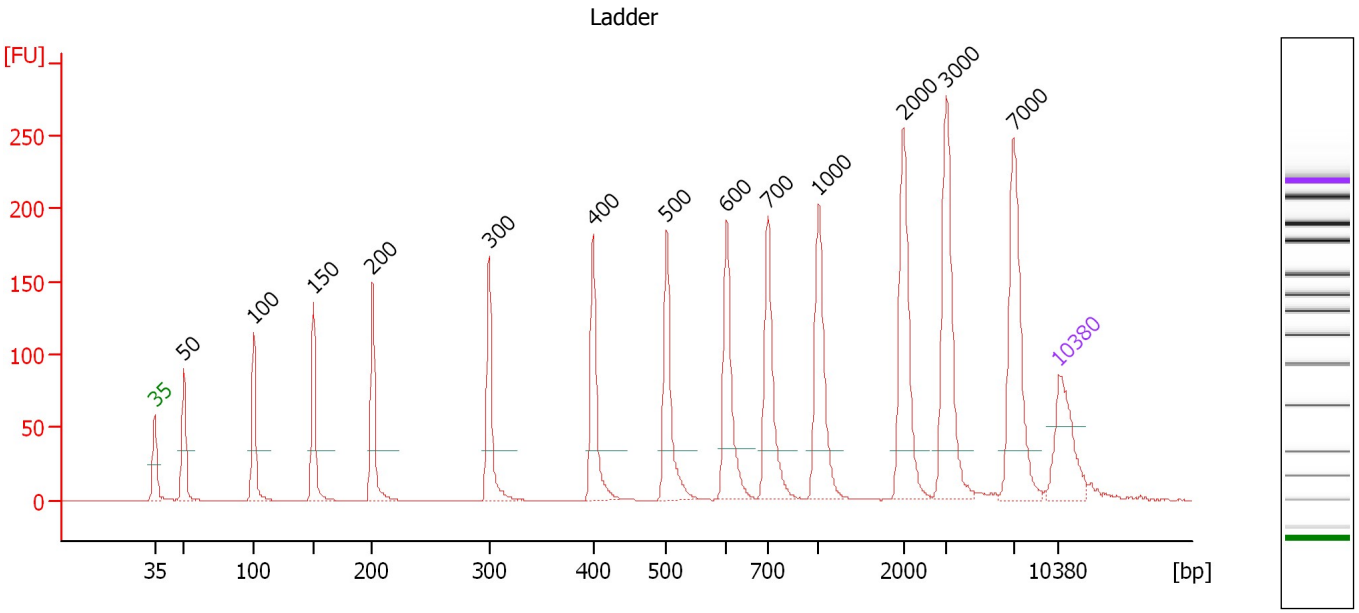
Ladder

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:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.2

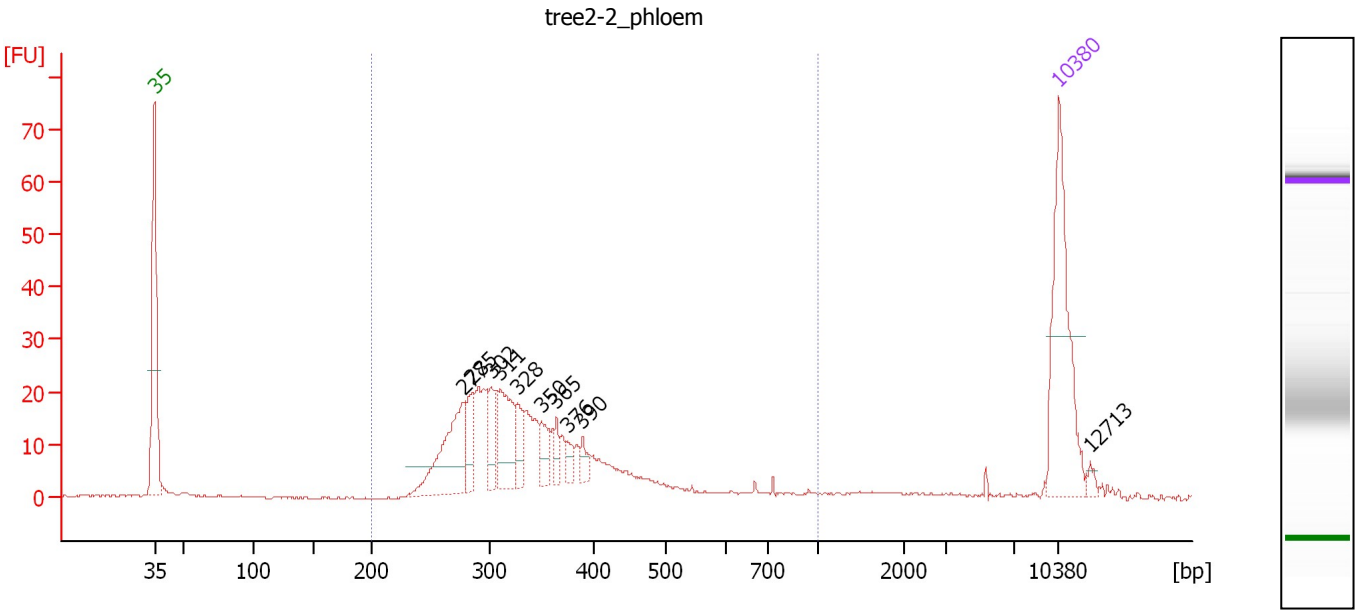
Peak table for Ladder

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	45.26
3		100	150.00	2,272.7	Ladder Peak	50.65
4		150	150.00	1,515.2	Ladder Peak	55.30
5		200	150.00	1,136.4	Ladder Peak	59.86
6		300	150.00	757.6	Ladder Peak	68.88
7		400	150.00	568.2	Ladder Peak	76.94
8		500	150.00	454.5	Ladder Peak	82.65
9		600	150.00	378.8	Ladder Peak	87.29
10		700	150.00	324.7	Ladder Peak	90.48
11		1,000	150.00	227.3	Ladder Peak	94.42
12		2,000	150.00	113.6	Ladder Peak	100.96
13		3,000	150.00	75.8	Ladder Peak	104.28
14		7,000	150.00	32.5	Ladder Peak	109.46
15		10,380	75.00	10.9	Upper Marker	113.00

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Electropherogram Summary Continued ...



Overall Results for sample 1 : tree2-2_phloem

Number of peaks found:	10	Corr. Area 1:	340.4
Noise:	0.2		

Peak table for sample 1 : tree2-2_phloem

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	277	71.12	388.3		66.85
3	285	21.60	114.9		67.52
4	302	23.52	117.9		69.07
5	311	46.74	227.6		69.78
6	328	16.49	76.2		71.12
7	350	16.17	70.0		72.94
8	365	10.48	43.5		74.09
9	376	7.21	29.1		74.98
10	390	8.68	33.7		76.13
11	10,380	75.00	10.9	Upper Marker	113.00
12	12,713	0.00	0.0		115.44

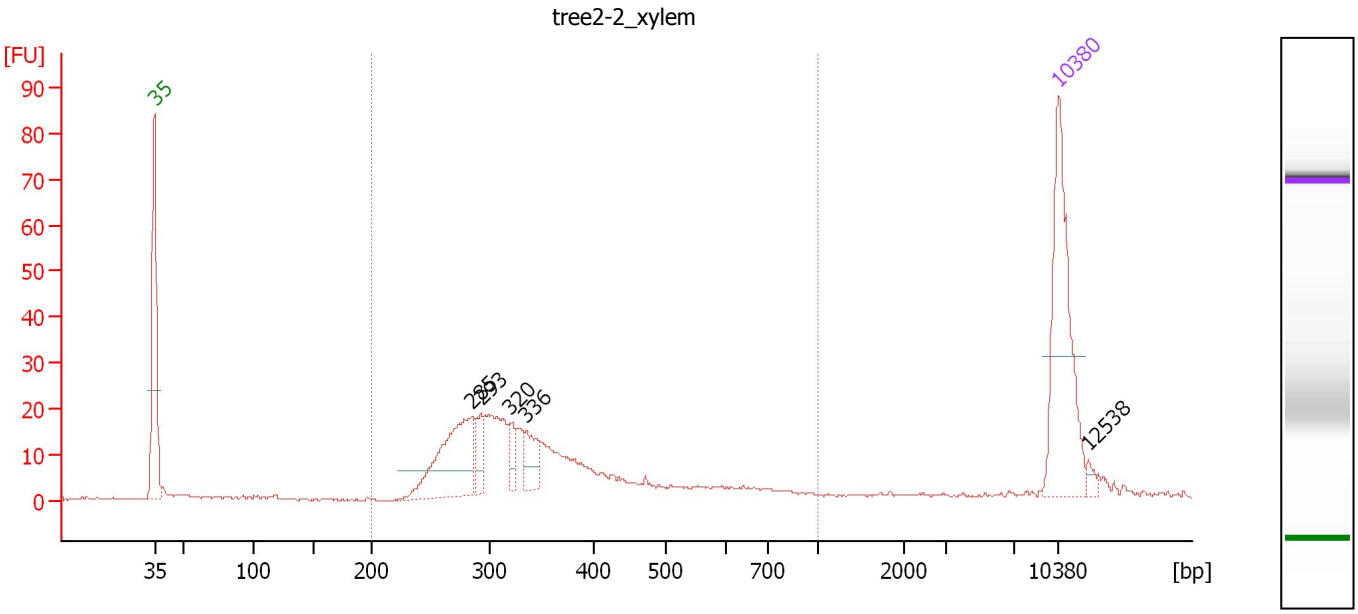
Region table for sample 1 : tree2-2_phloem

From [bp]	Average Size [bp]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Conc. [pg/µl]	Molarity [pmol/l]	Color
200	352	1,000	340.4	91	28.4	421.78	1,949.6	

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Electropherogram Summary Continued ...



Overall Results for sample 2 : tree2-2_xylem

Number of peaks found:	5	Corr. Area 1:	328.0
Noise:	0.2		

Peak table for sample 2 : tree2-2_xylem

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	285	82.09	436.3		67.54
3	293	17.99	93.0		68.26
4	320	12.57	59.5		70.52
5	336	20.67	93.2		71.79
6	10,380	75.00	10.9	Upper Marker	113.00
7	12,538	0.00	0.0		115.26

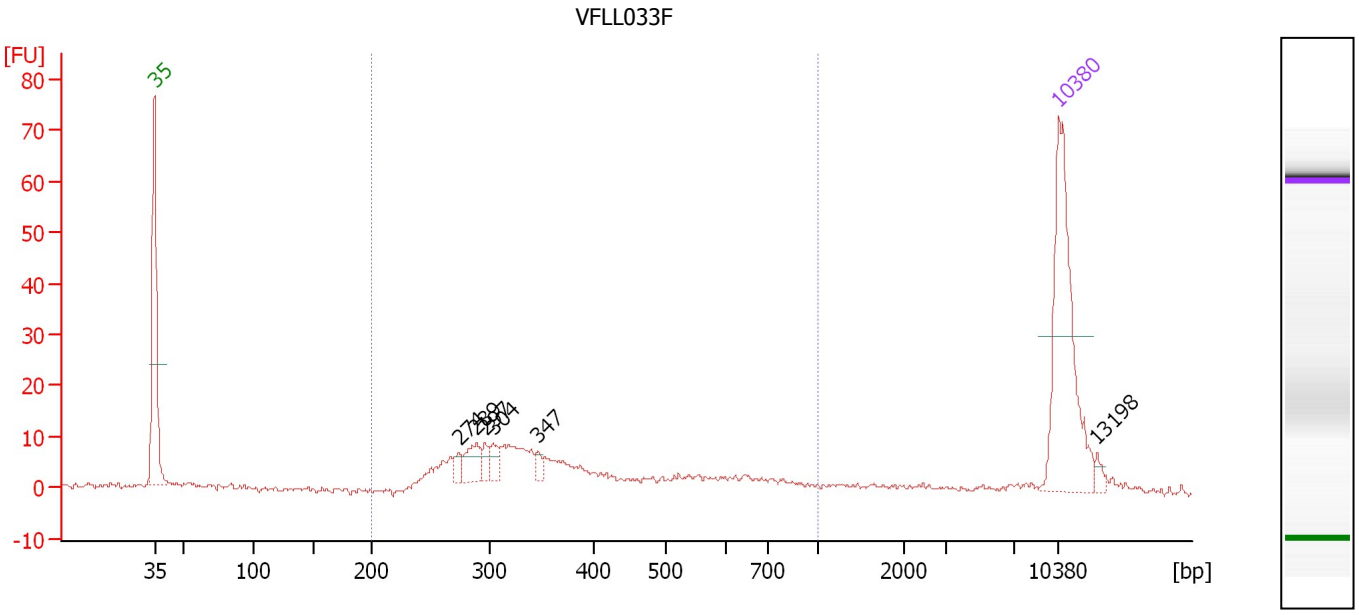
Region table for sample 2 : tree2-2_xylem

From [bp]	Average Size [bp]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Conc. [pg/µl]	Molarity [pmol/l]	Color
200	367	1,000	328.0	85	34.0	319.14	1,464.9	

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Electropherogram Summary Continued ...



Overall Results for sample 3 : VFLL033F

Number of peaks found:	6	Corr. Area 1:	182.4
Noise:	0.5		

Peak table for sample 3 : VFLL033F

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	274	5.67	31.3		66.56
3	289	16.08	84.3		67.90
4	297	7.02	35.9		68.59
5	304	9.65	48.1		69.19
6	347	4.69	20.4		72.70
7	10,380	75.00	10.9	Upper Marker	113.00
8	13,198	0.00	0.0		115.95

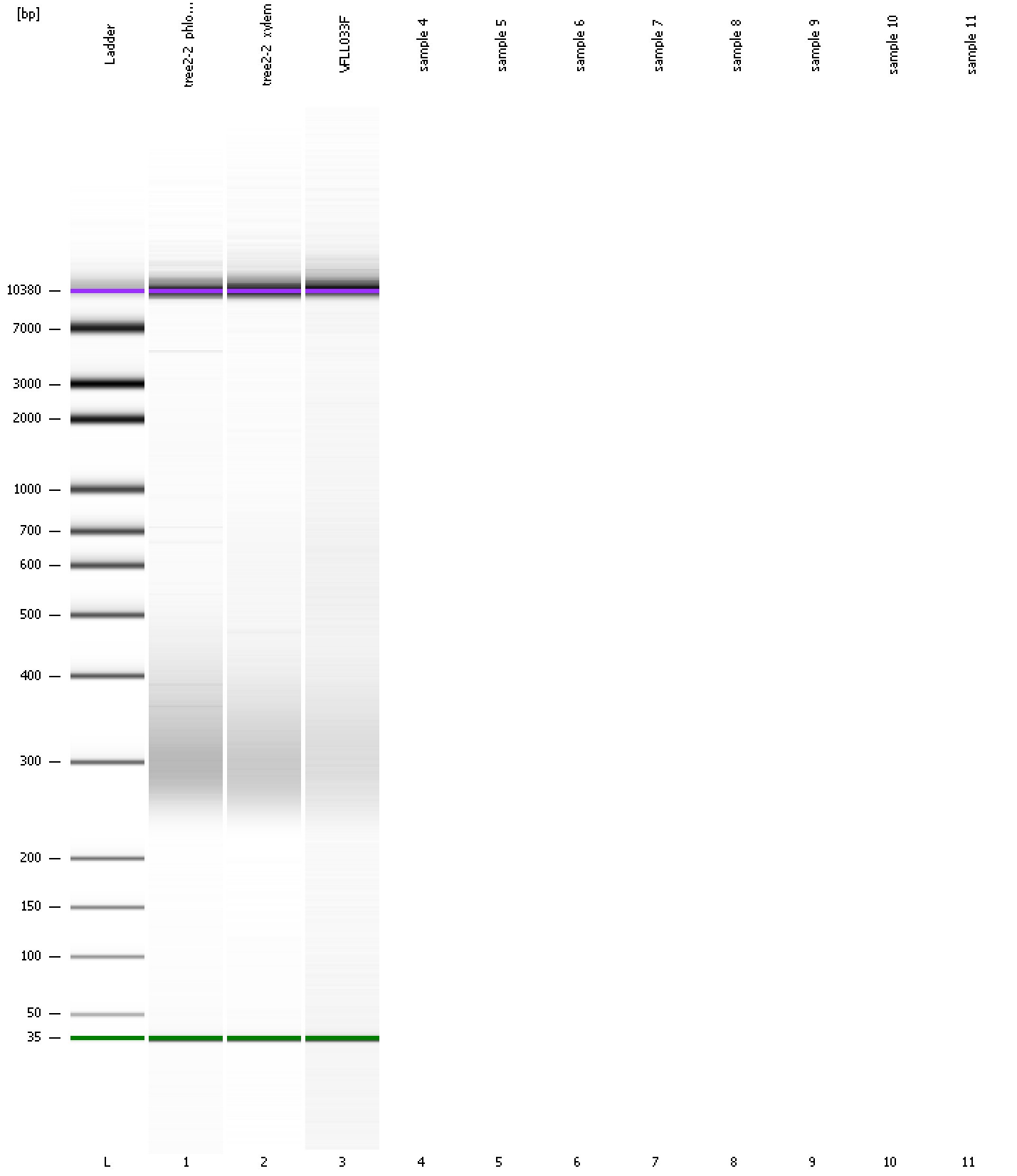
Region table for sample 3 : VFLL033F

From [bp]	Average Size [bp]	To [bp]	Corr. Area	% of Total	Size distribution in CV [%]	Conc. [pg/µl]	Molarity [pmol/l]	Color
200	402	1,000	182.4	79	37.8	189.86	827.8	

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Gel Image



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...ents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad

Created: 12/18/2014 3:46:30 PM
Modified: 12/18/2014 4:06:57 PM

Run Logbook

Description	Number	Source	Category	Sub Category	Time	Time Zone	User	Host
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Run started on port 1 (File: C:\Documents and Settings\Bioanalyzer\2014-12-18\2014-12-18_004.xad)		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		12/18/2014 3:46:36 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1