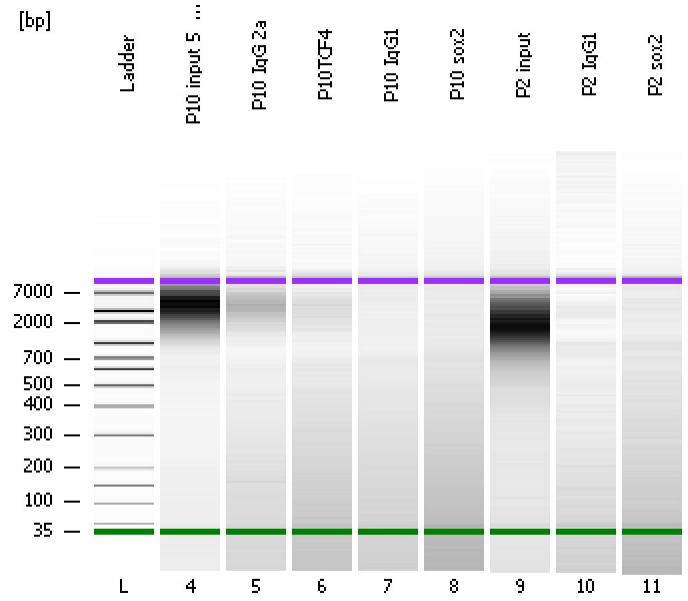
Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electrophoresis File Run Summary



Instrument Information:

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

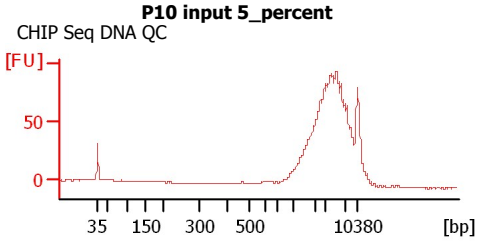
Assay Information:

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

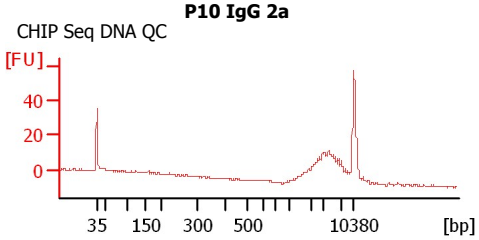
Chip Information:

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

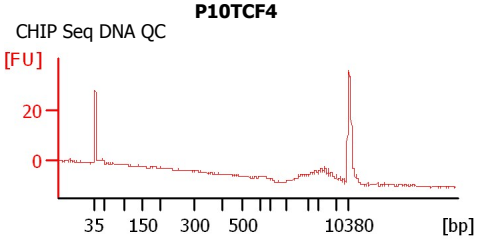
P10 input 5_percent



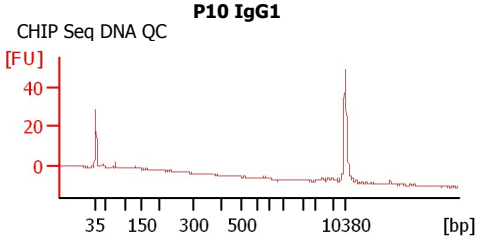
P10 IgG 2a



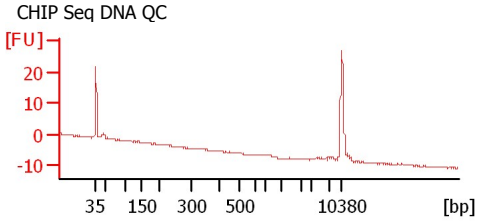
P10TCF4



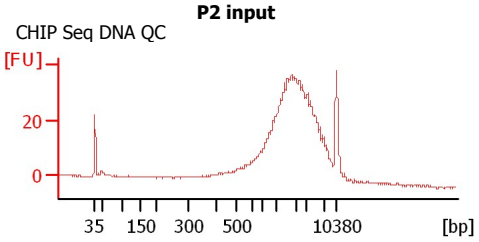
P10 IgG1



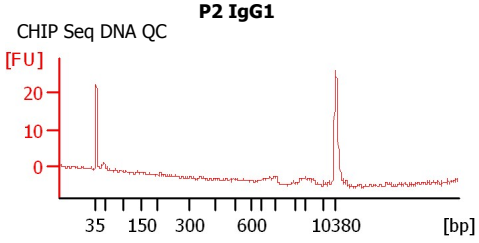
P10 sox2



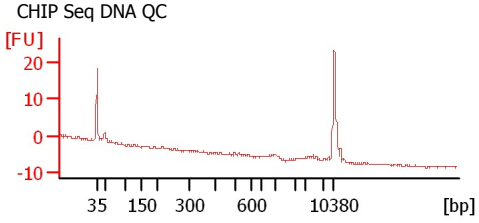
P2 input



P2 IgG1



P2 sox2



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Rest. Digest	Status	Observation	Result Label	Result Color
P10 input 5_percent	CHIP Seq DNA QC	☐	✔			
P10 IgG 2a	CHIP Seq DNA QC	☐	✔			
P10TCF4	CHIP Seq DNA QC	☐	✔			
P10 IgG1	CHIP Seq DNA QC	☐	✔			
P10 sox2	CHIP Seq DNA QC	☐	✔			
P2 input	CHIP Seq DNA QC	☐	✔			
P2 IgG1	CHIP Seq DNA QC	☐	✔			
P2 sox2	CHIP Seq DNA QC	☐	✔			
Ladder		☐	✔			

Chip Lot # **Reagent Kit Lot #**

Chip Comments :

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 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

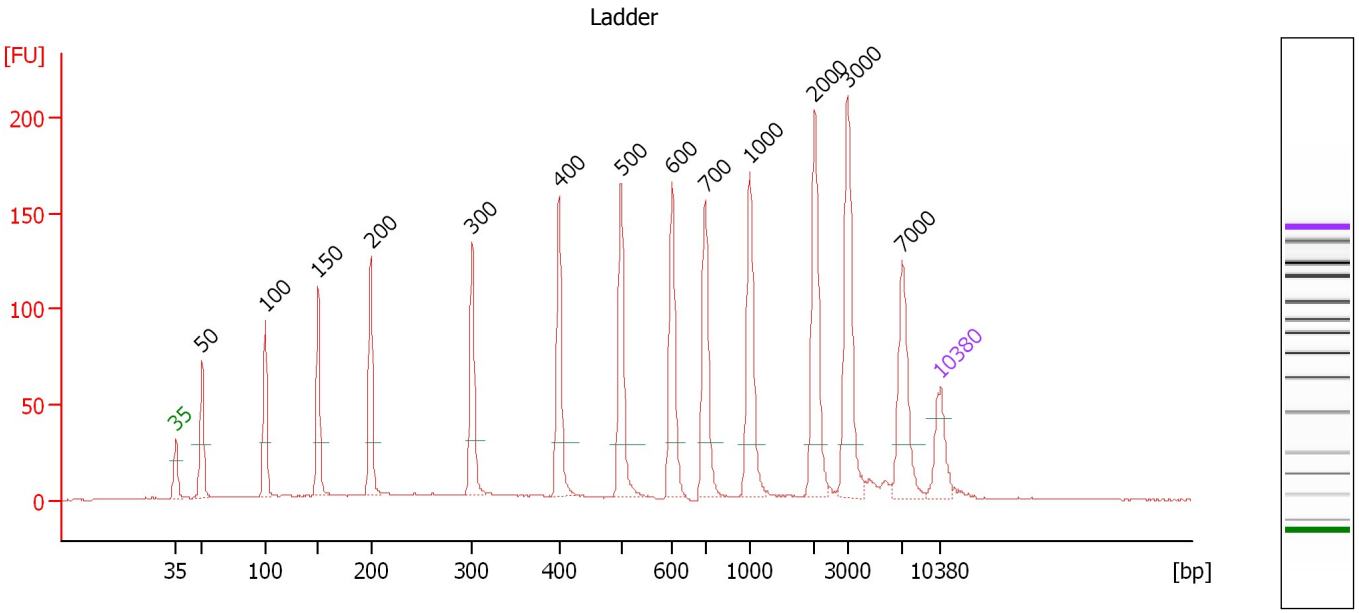
Ladder

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:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary



Overall Results for Ladder

Noise: 0.3

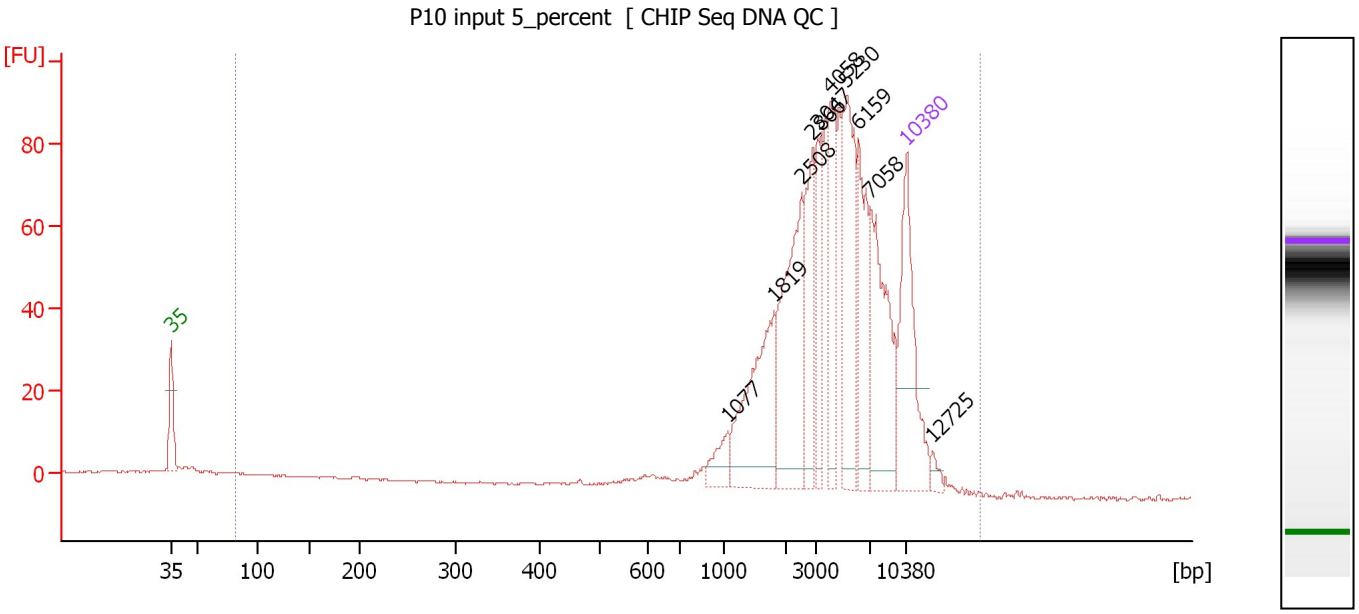
Peak table for Ladder

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	45.44
3		100	150.00	2,272.7	Ladder Peak	51.20
4		150	150.00	1,515.2	Ladder Peak	56.07
5		200	150.00	1,136.4	Ladder Peak	60.85
6		300	150.00	757.6	Ladder Peak	70.17
7		400	150.00	568.2	Ladder Peak	78.07
8		500	150.00	454.5	Ladder Peak	83.78
9		600	150.00	378.8	Ladder Peak	88.41
10		700	150.00	324.7	Ladder Peak	91.44
11		1,000	150.00	227.3	Ladder Peak	95.54
12		2,000	150.00	113.6	Ladder Peak	101.49
13		3,000	150.00	75.8	Ladder Peak	104.46
14		7,000	150.00	32.5	Ladder Peak	109.49
15		10,380	75.00	10.9	Upper Marker	113.00

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 4 : P10 input 5_percent

Number of peaks found:	10	Corr. Area 1:	947.9
Noise:	0.3		

Peak table for sample 4 : P10 input 5_percent

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	1,077	16.65	23.4		95.99
3	1,819	88.22	73.5		100.41
4	2,508	104.67	63.2		103.00
5	2,866	51.00	27.0		104.07
6	3,047	38.01	18.9		104.52
7	4,058	53.85	20.1		105.79
8	5,230	80.52	23.3		107.26
9	6,159	55.57	13.7		108.43
10	7,058	91.40	19.6		109.55
11	10,380	75.00	10.9	Upper Marker	113.00
12	12,725	0.00	0.0		115.44

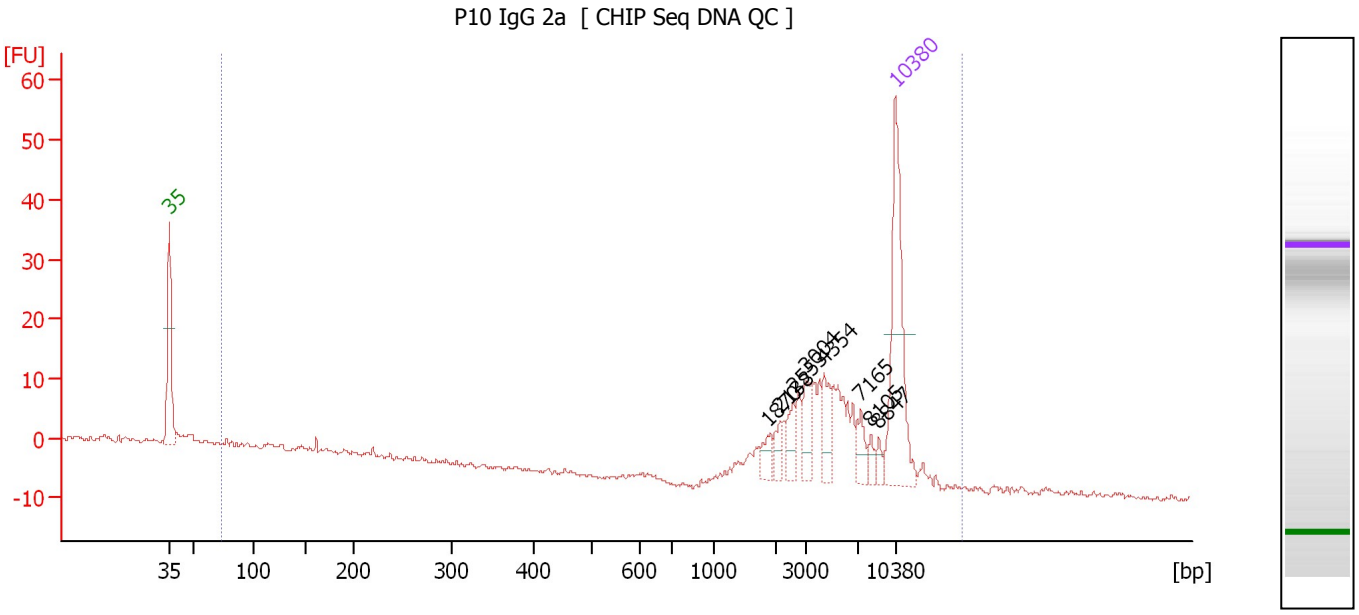
Region table for sample 4 : P10 input 5_percent

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color [pg/µl]	% of Total	Size distribution in CV [%]
82	17,136	4,944	947.9	495.2	693.08	97	62.3

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 5 : P10 IgG 2a

Number of peaks found:	8	Corr. Area 1:	144.4
Noise:	0.4		

Peak table for sample 5 : P10 IgG 2a

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	1,870	9.73	7.9		100.72
3	2,138	9.44	6.7		101.90
4	2,553	13.02	7.7		103.13
5	3,004	16.57	8.4		104.47
6	4,354	17.34	6.0		106.16
7	7,165	10.54	2.2		109.66
8	8,105	5.60	1.0		110.64
9	8,847	4.59	0.8		111.41
10	10,380	75.00	10.9	Upper Marker	113.00

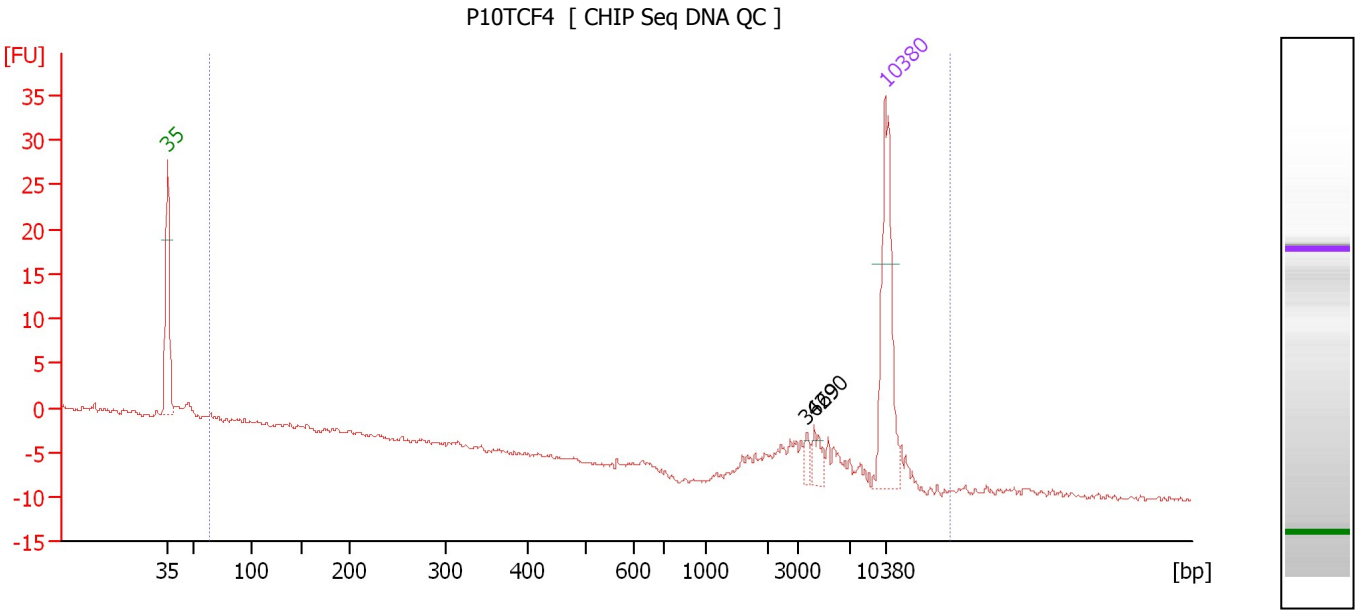
Region table for sample 5 : P10 IgG 2a

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color [pg/µl]	% of Total	Size distribution in CV [%]
72	16,497	6,420	144.4	336.6	181.64	91	55.9

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 6 : P10TCF4

Number of peaks found:	2	Corr. Area 1:	25.9
Noise:	0.3		

Peak table for sample 6 : P10TCF4

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	3,669	5.77	2.4		105.30
3	4,290	11.02	3.9		106.08
4	10,380	75.00	10.9	Upper Marker	113.00

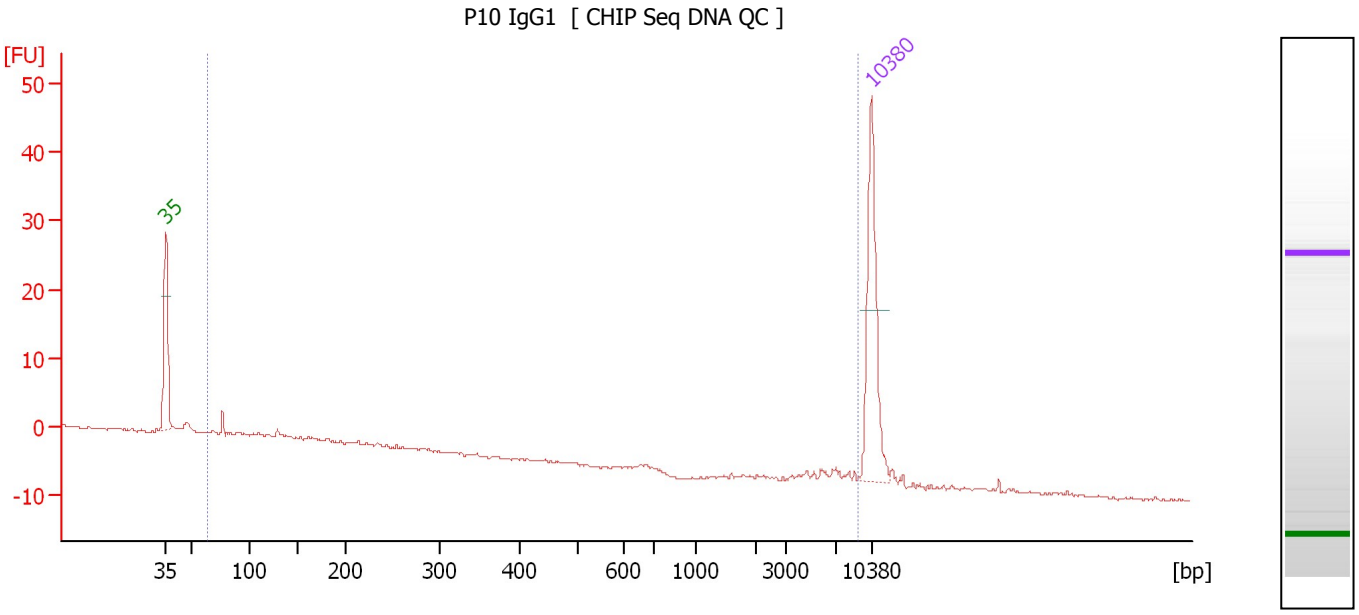
Region table for sample 6 : P10TCF4

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color Conc. [pg/µl]	% of Total	Size distribution in CV [%]
65	16,531	8,334	25.9	223.3	52.51	71	41.8

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 7 : P10 IgG1

Number of peaks found:	0	Corr. Area 1:	19.5
Noise:	0.2		

Peak table for sample 7 : P10 IgG1

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	10,380	75.00	10.9	Upper Marker	113.00

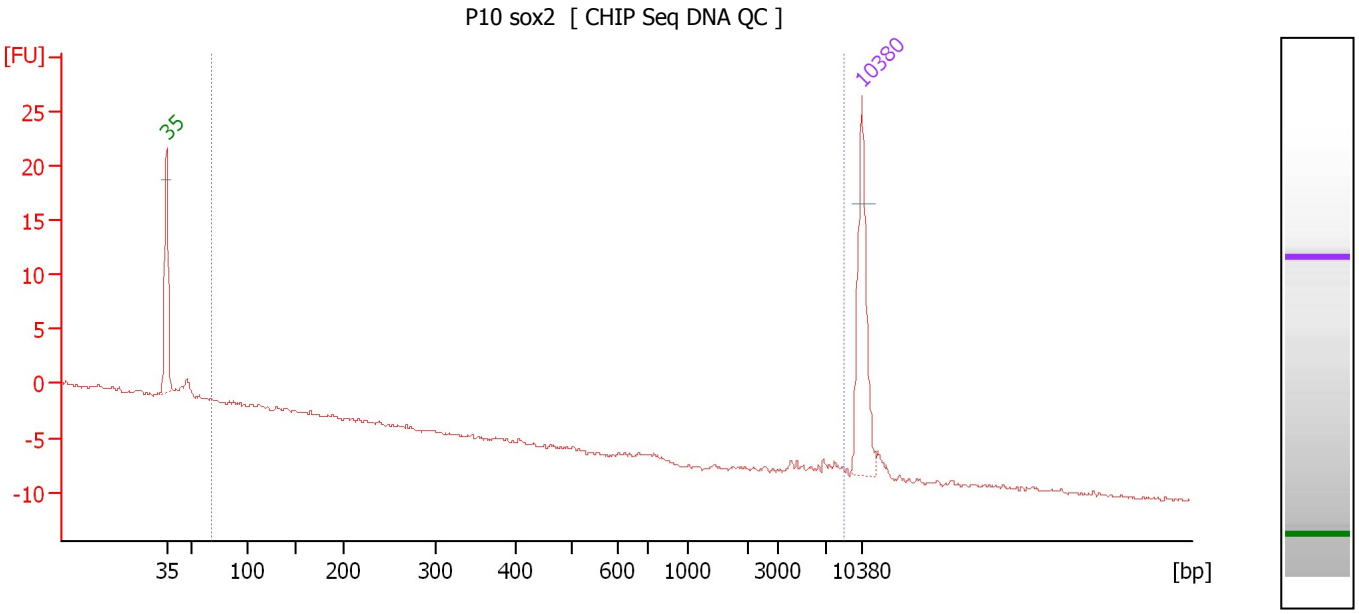
Region table for sample 7 : P10 IgG1

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Co Conc. lor [pg/µl]	% of Total	Size distribution in CV [%]
65	9,046	1,649	19.5	632.4	53.05	71	100.0

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 8 : P10 sox2

Number of peaks found:	0	Corr. Area 1:	0.1
Noise:	0.2		

Peak table for sample 8 : P10 sox2

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	10,380	75.00	10.9	Upper Marker	113.00

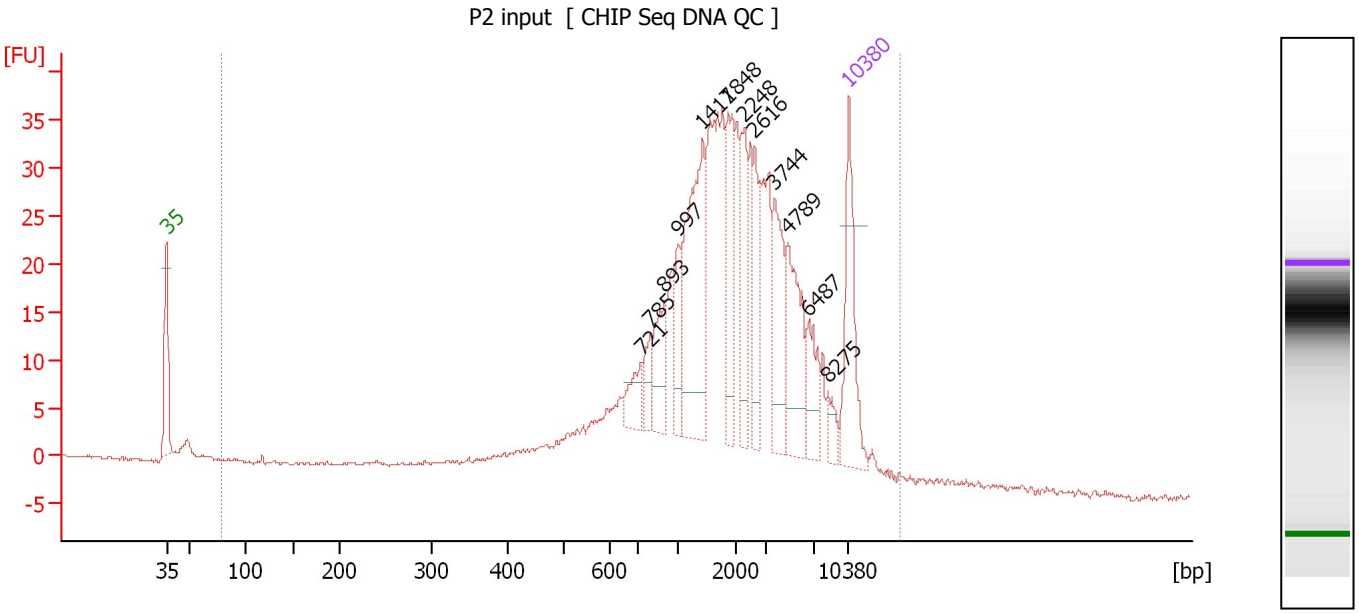
Region table for sample 8 : P10 sox2

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color [pg/µl]	% of Total	Size distribution in CV [%]
69	8,576	7,089	0.1	0.0	0.18	1	10.6

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 9 : P2 input

Number of peaks found:	12	Corr. Area 1:	594.1
Noise:	0.2		

Peak table for sample 9 : P2 input

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	721	29.57	62.1		91.73
3	785	23.09	44.6		92.60
4	893	48.01	81.4		94.08
5	997	34.16	51.9		95.50
6	1,417	148.32	158.6		98.02
7	1,848	72.03	59.0		100.59
8	2,248	55.48	37.4		102.23
9	2,616	50.14	29.0		103.32
10	3,744	64.55	26.1		105.40
11	4,789	78.43	24.8		106.71
12	6,487	35.95	8.4		108.84
13	8,275	13.75	2.5		110.81
14	10,380	75.00	10.9	Upper Marker	113.00

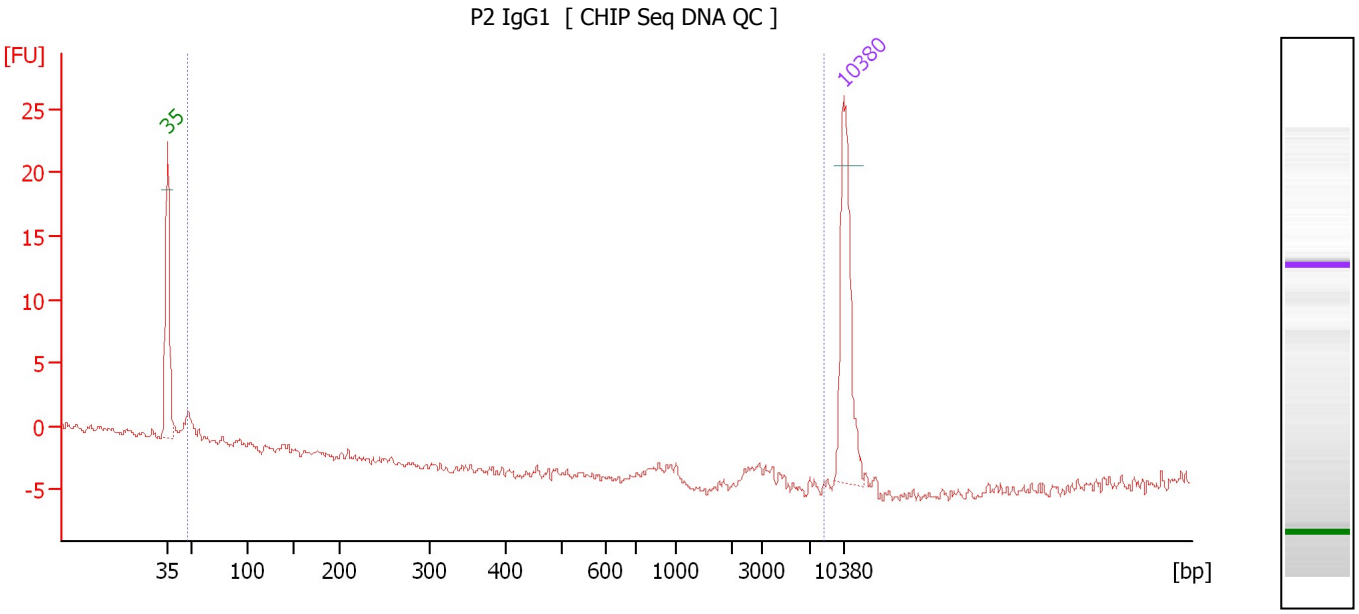
Region table for sample 9 : P2 input

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color [pg/µl]	% of Total	Size distribution in CV [%]
77	15,428	3,079	594.1	2,042.4	1,438.61	97	97.3

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 10 : P2 IgG1

Number of peaks found:	0	Corr. Area 1:	2.4
Noise:	0.3		

Peak table for sample 10 : P2 IgG1

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	▶	10,380	75.00	10.9	Upper Marker	113.00

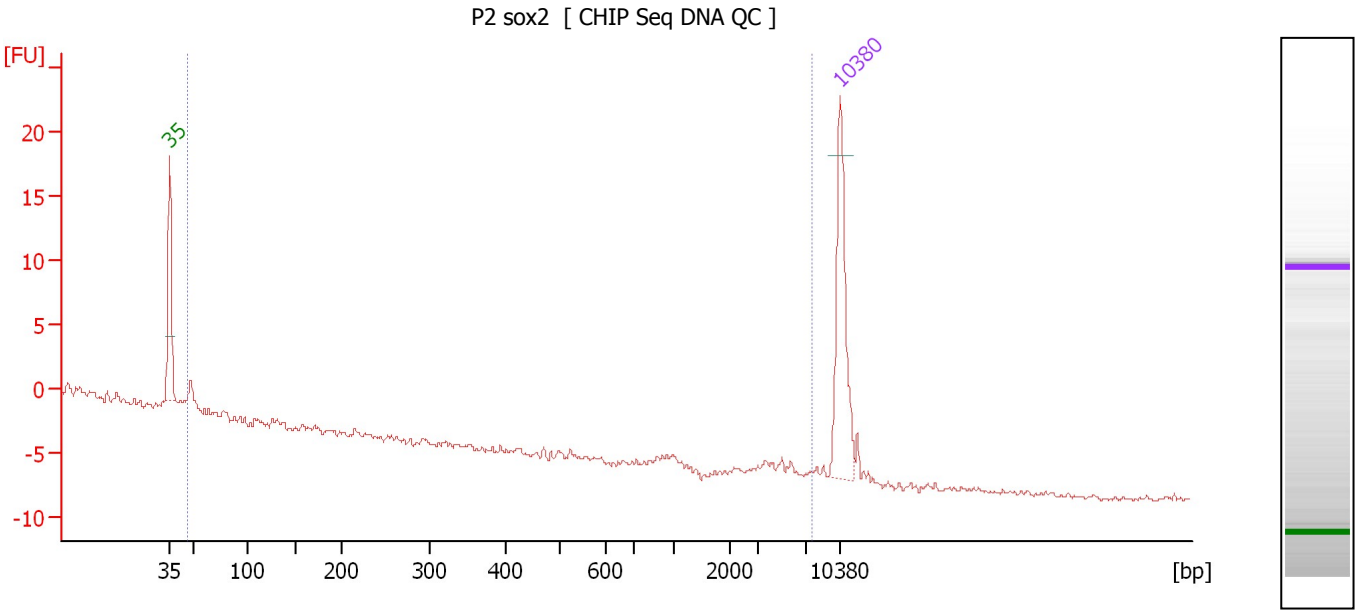
Region table for sample 10 : P2 IgG1

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Co Conc. lor [pg/µl]	% of Total	Size distribution in CV [%]
47	8,439	50	2.4	354.9	11.62	48	5.2

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Electropherogram Summary Continued ...



Overall Results for sample 11 : P2 sox2

Number of peaks found:	0	Corr. Area 1:	1.2
Noise:	0.2		

Peak table for sample 11 : P2 sox2

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	10,380	75.00	10.9	Upper Marker	113.00

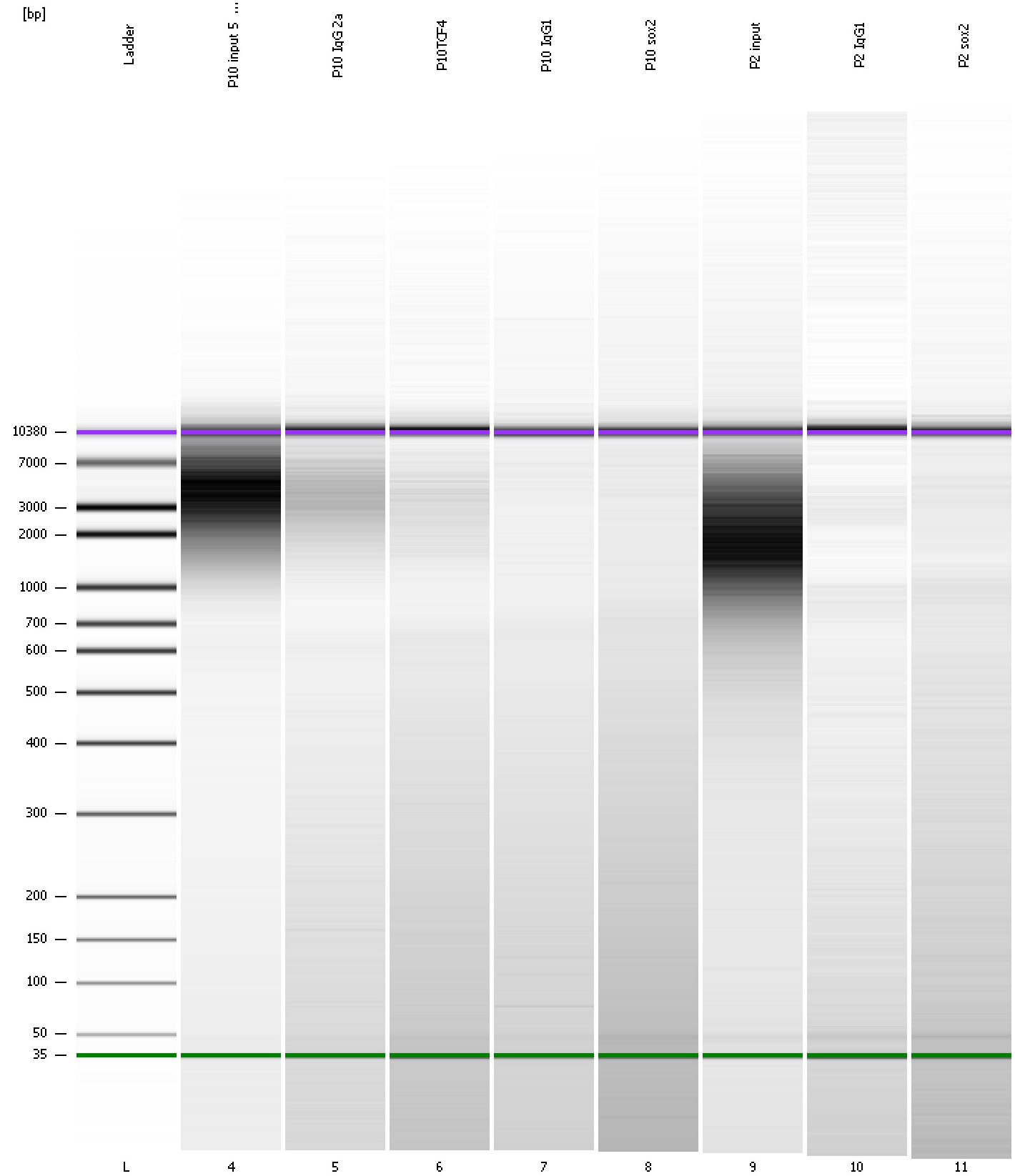
Region table for sample 11 : P2 sox2

From [bp]	To [bp]	Average Size [bp]	Corr. Area	Molarity [pmol/l]	Color [pg/µl]	% of Total	Size distribution in CV [%]
47	7,614	245	1.2	199.7	6.45	58	100.0

Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 PM

Gel Image



Assay Class: High Sensitivity DNA Assay
Data Path: C:\...0 expert\data\2016-08-05\2016-08-05_003_CHIP_Seq_DNA_QC.xad

Created: 8/5/2016 3:51:48 PM
Modified: 8/5/2016 4:35:30 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		8/5/2016 4:33:05 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Program Files\Agilent\2100 bioanalyzer\2100 expert\data\2016-08-05\2016-08-05_003.xad)		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938B		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE13701086		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		8/5/2016 3:51:53 PM	(GMT --07:00) Pacific Standard Time	UC Davis	D8XSMGH1