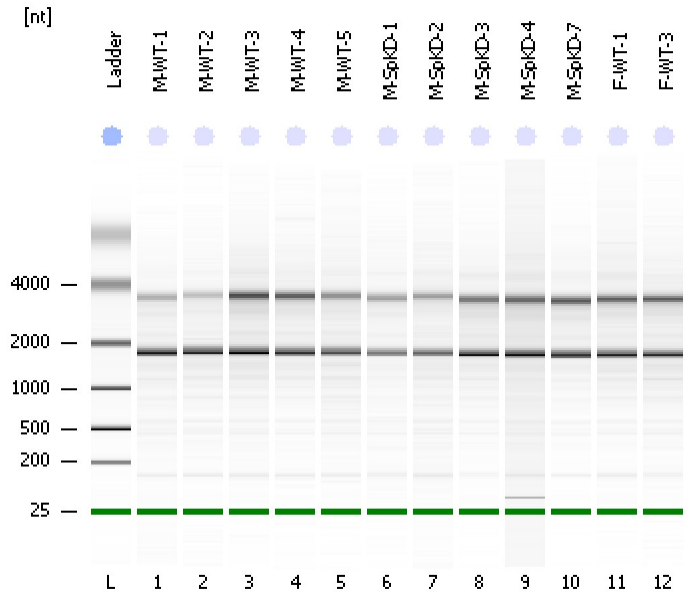


Assay Class: Eukaryote Total RNA Nano
Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
Modified: 11/12/2019 10:33:45 AM

Electrophoresis File Run Summary



Instrument Information:

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

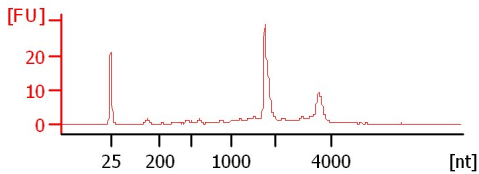
Assay Information:

Assay Origin Path: C:\Program Files\Agilent\2100 bioanalyzer\2100 expert\assays\RNA\Eukaryote Total RNA Nano Series II.xsy
Assay Class: Eukaryote Total RNA Nano
Version: 2.6
Assay Comments: Total RNA Analysis ng sensitivity (Eukaryote)
© Copyright 2003 - 2009 Agilent Technologies, Inc.

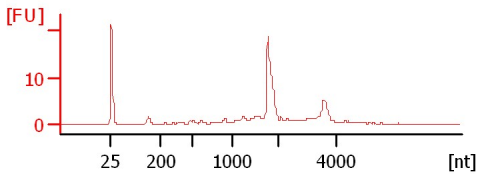
Chip Information:

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

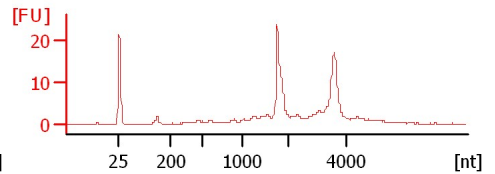
M-WT-1
HiSeq2000
RIN: 8.30



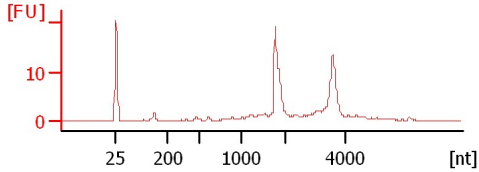
M-WT-2
HiSeq2000
RIN: 8.10



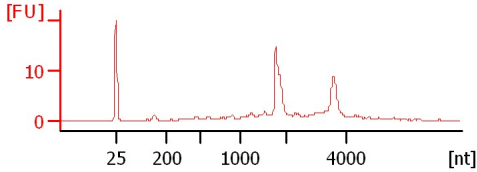
M-WT-3
HiSeq2000
RIN: 8.50



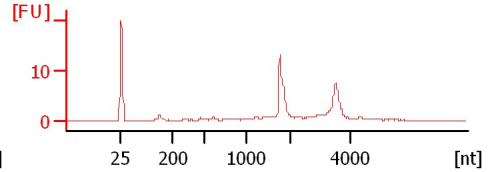
M-WT-4
HiSeq2000
RIN: 9



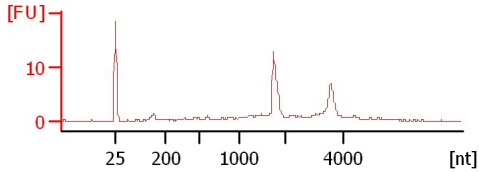
M-WT-5
HiSeq2000
RIN: 8.30



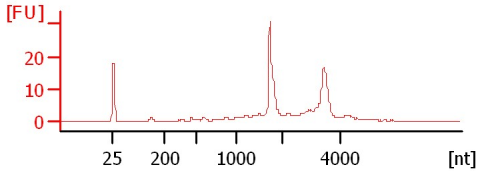
M-SpKD-1
HiSeq2000
RIN: 8.60



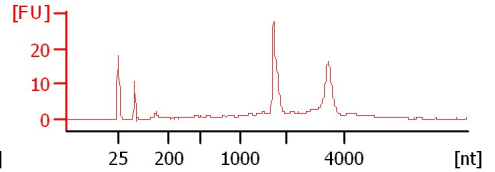
M-SpKD-2
HiSeq2000
RIN: 8



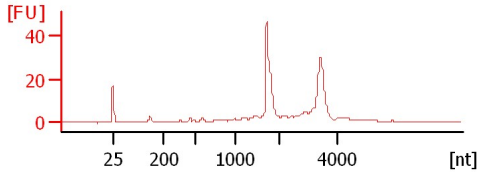
M-SpKD-3
HiSeq2000
RIN: 8.30



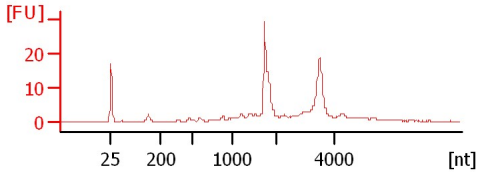
M-SpKD-4
HiSeq2000
RIN: 8.80



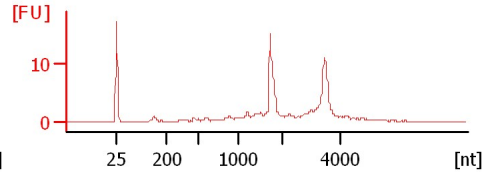
M-SpKD-7
HiSeq2000
RIN: 8.80



F-WT-1
HiSeq2000
RIN: 8.50



F-WT-3
HiSeq2000
RIN: 8.40



Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electrophoresis File Run Summary (Chip Summary)

Sample Name	Sample Comment	Status	Result Label	Result Color
M-WT-1	HiSeq2000	✓	RIN: 8.30	
M-WT-2	HiSeq2000	✓	RIN: 8.10	
M-WT-3	HiSeq2000	✓	RIN: 8.50	
M-WT-4	HiSeq2000	✓	RIN:9	
M-WT-5	HiSeq2000	✓	RIN: 8.30	
M-SpKD-1	HiSeq2000	✓	RIN: 8.60	
M-SpKD-2	HiSeq2000	✓	RIN:8	
M-SpKD-3	HiSeq2000	✓	RIN: 8.30	
M-SpKD-4	HiSeq2000	✓	RIN: 8.80	
M-SpKD-7	HiSeq2000	✓	RIN: 8.80	
F-WT-1	HiSeq2000	✓	RIN: 8.50	
F-WT-3	HiSeq2000	✓	RIN: 8.40	
Ladder		✓	All Other Samples	

Chip Lot #

Reagent Kit Lot #

Chip Comments :

Assay Class: Eukaryote Total RNA Nano
Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
Modified: 11/12/2019 10:33:45 AM

Electrophoresis Assay Details

General Analysis Settings

Number of Available Sample and Ladder Wells (Max.) : 13
Minimum Visible Range [s] : 17
Maximum Visible Range [s] : 70
Start Analysis Time Range [s] : 19
End Analysis Time Range [s] : 69
Ladder Concentration [ng/ μ l] : 150
Lower Marker Concentration [ng/ μ l] : 0
Upper Marker Concentration [ng/ μ l] : 0
Used Lower Marker for Quantitation
Standard Curve Fit is Logarithmic
Show Data Aligned to Lower Marker

Integrator Settings

Integration Start Time [s] : 19
Integration End Time [s] : 69
Slope Threshold : 0.6
Height Threshold [FU] : 0.5
Area Threshold : 0.2
Width Threshold [s] : 0.5
Baseline Plateau [s] : 6

Filter Settings

Filter Width [s] : 0.5
Polynomial Order : 4

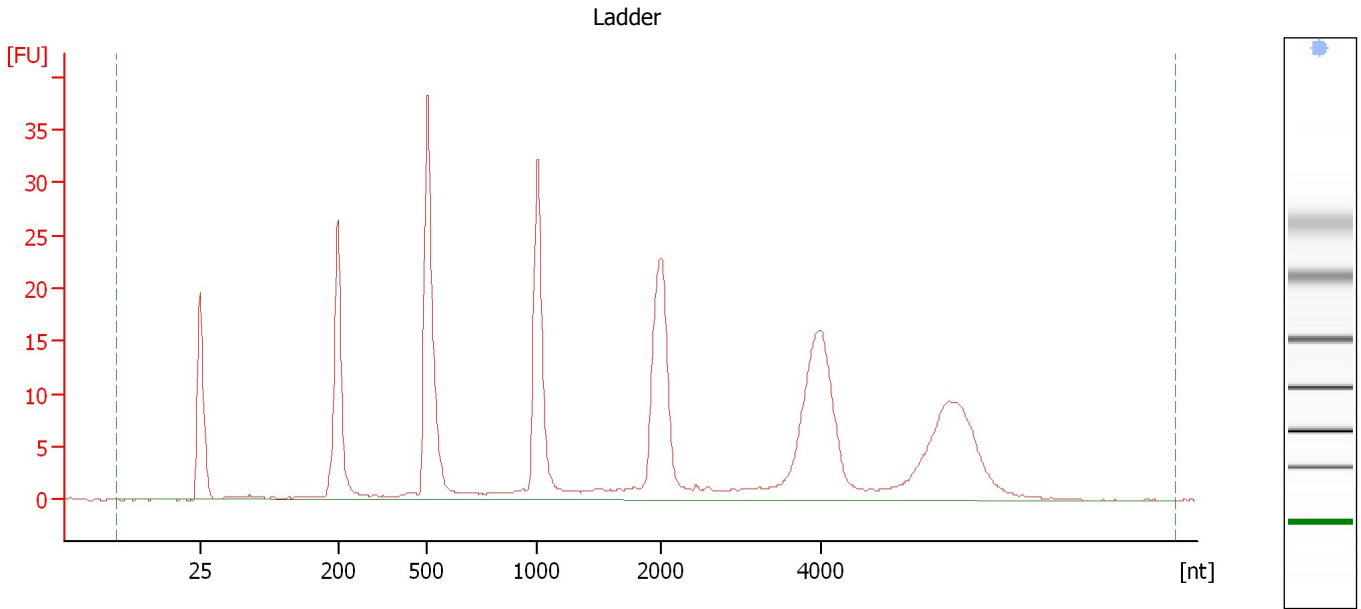
Ladder

Ladder Peak	Size
1	25
2	200
3	500
4	1000
5	2000
6	4000

Assay Class: Eukaryote Total RNA Nano
Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary



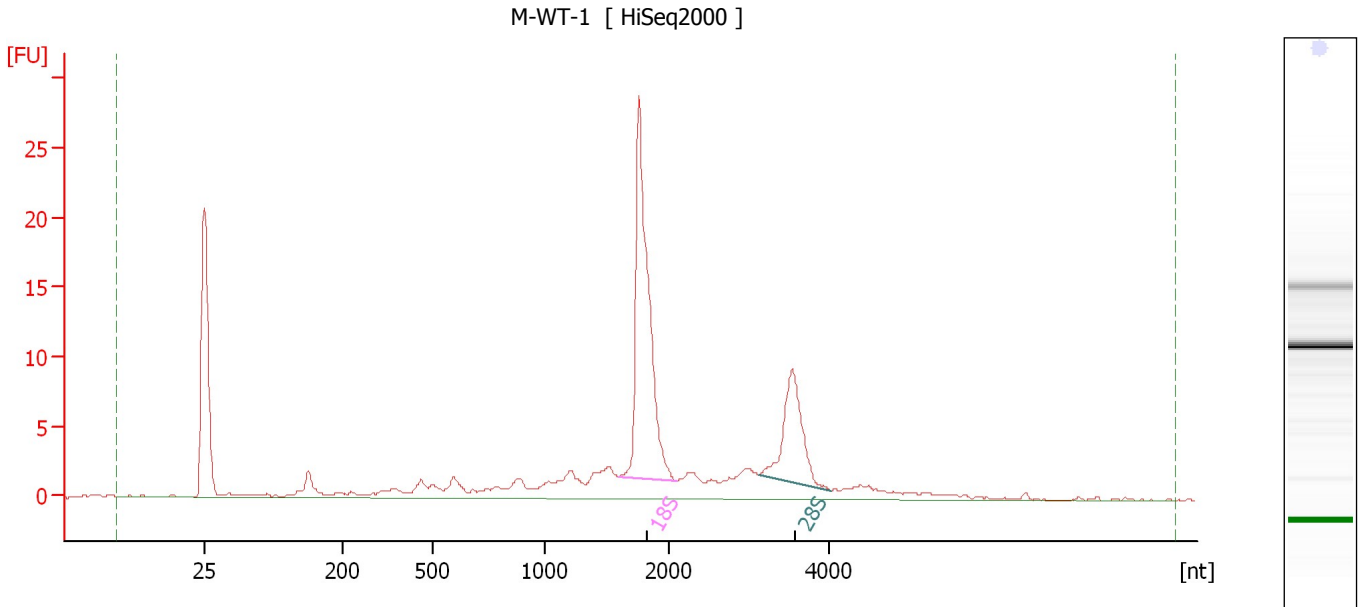
Overall Results for Ladder

RNA Area:	299.4	Result Flagging Color:	
RNA Concentration:	150 ng/μl	Result Flagging Label:	All Other Samples

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 1 : M-WT-1

RNA Area:	132.5	RNA Integrity Number (RIN):	8.3 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	66 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.4	Result Flagging Label:	RIN: 8.30

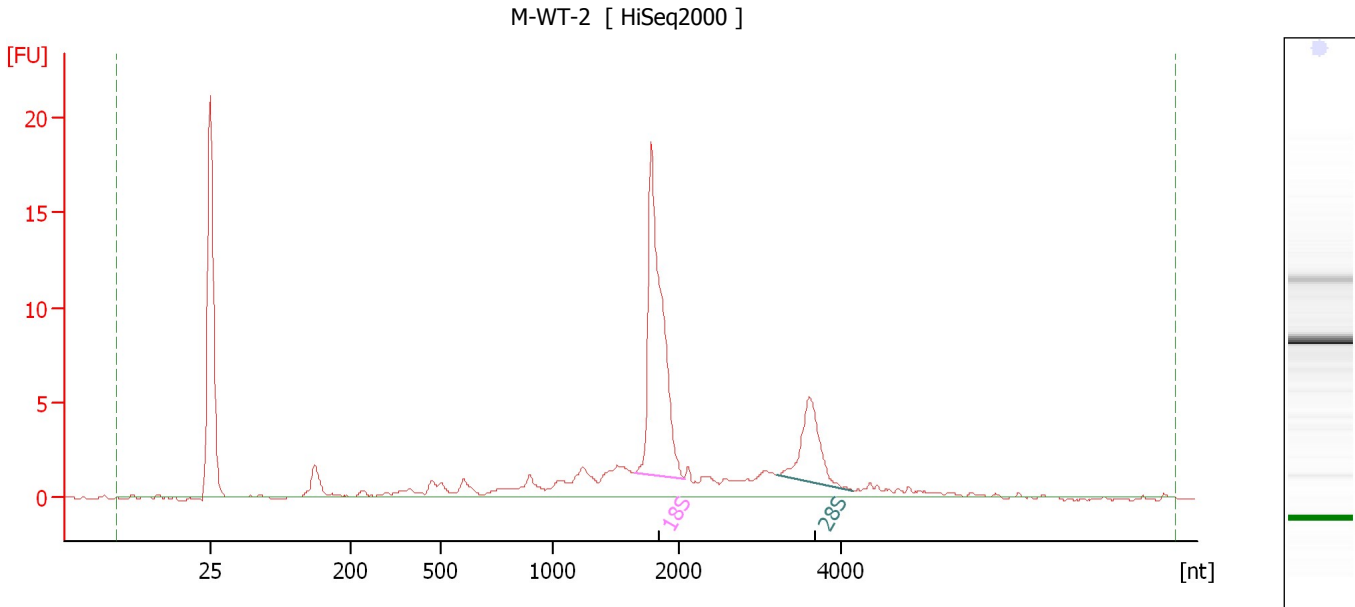
Fragment table for sample 1 : M-WT-1

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,592	2,097	42.1	31.8
28S	3,108	4,013	16.1	12.2

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 2 : M-WT-2

RNA Area:	86.1	RNA Integrity Number (RIN):	8.1 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	43 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.3	Result Flagging Label:	RIN: 8.10

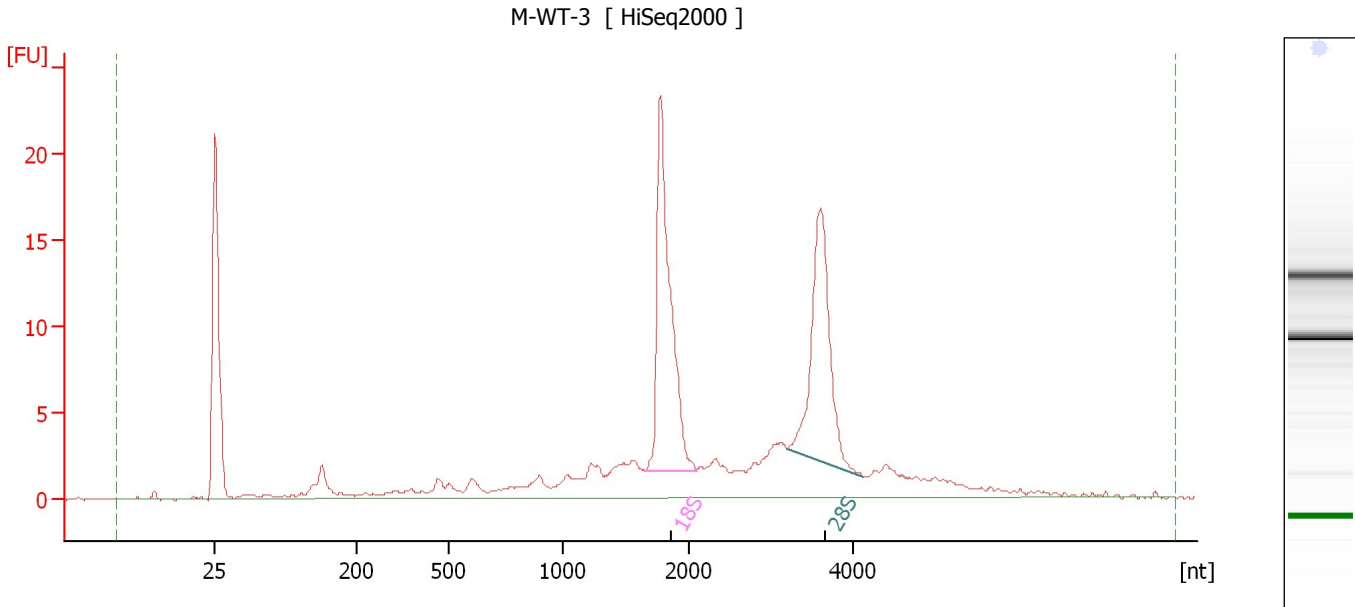
Fragment table for sample 2 : M-WT-2

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,642	2,062	28.5	33.2
28S	3,207	4,142	8.6	10.0

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 3 : M-WT-3

RNA Area:	151.5	RNA Integrity Number (RIN):	8.5 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	76 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.8	Result Flagging Label:	RIN: 8.50

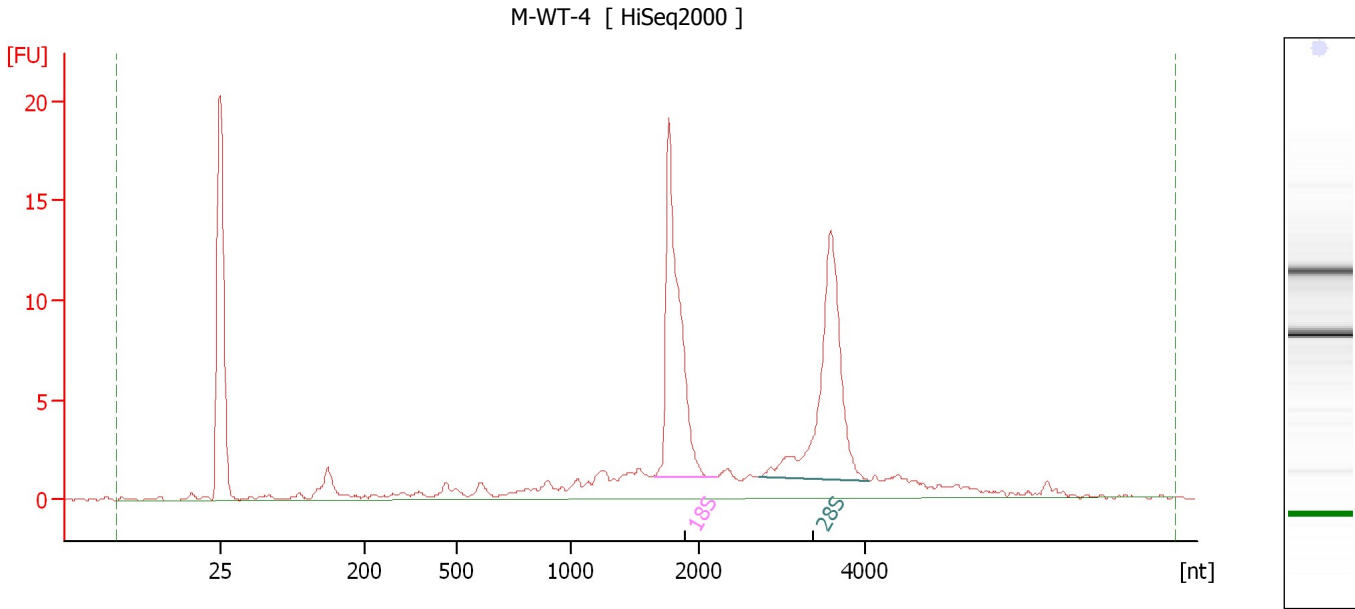
Fragment table for sample 3 : M-WT-3

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,649	2,079	33.1	21.9
28S	3,187	4,125	27.3	18.0

Assay Class: Eukaryote Total RNA Nano
Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 4 : M-WT-4

RNA Area:	111.1	RNA Integrity Number (RIN):	9 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	56 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	1.0	Result Flagging Label:	RIN:9

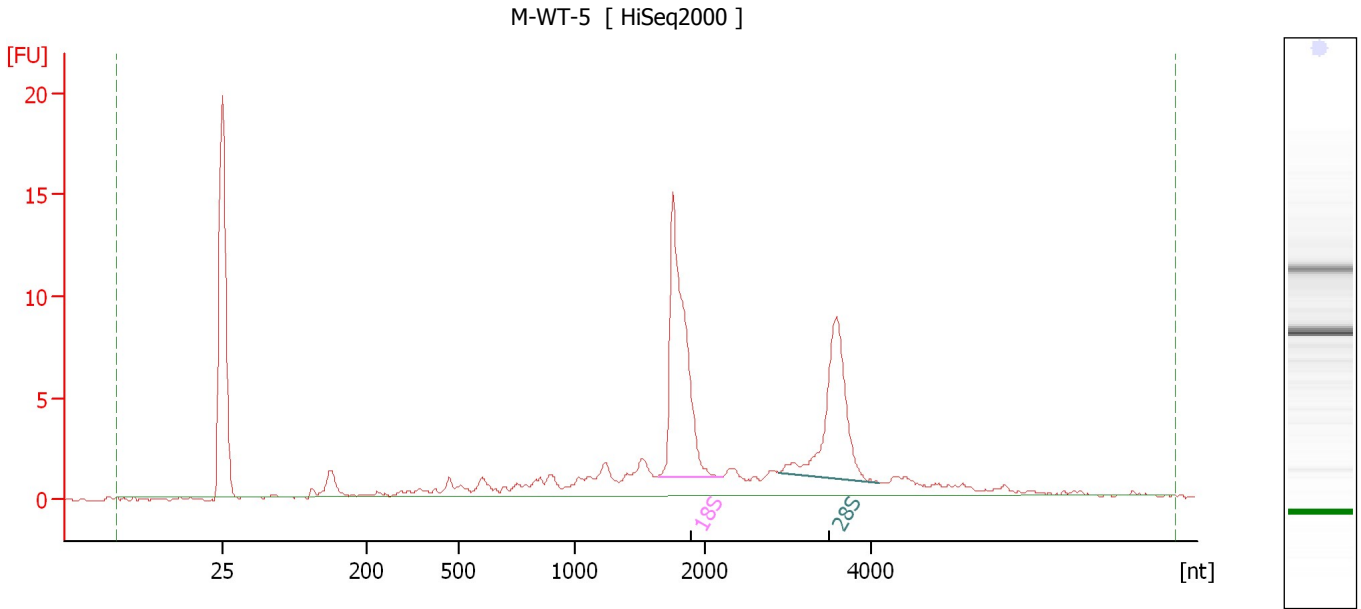
Fragment table for sample 4 : M-WT-4

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,656	2,199	27.7	24.9
28S	2,715	4,044	26.6	23.9

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 5 : M-WT-5

RNA Area:	91.7	RNA Integrity Number (RIN):	8.3 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	46 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.7	Result Flagging Label:	RIN: 8.30

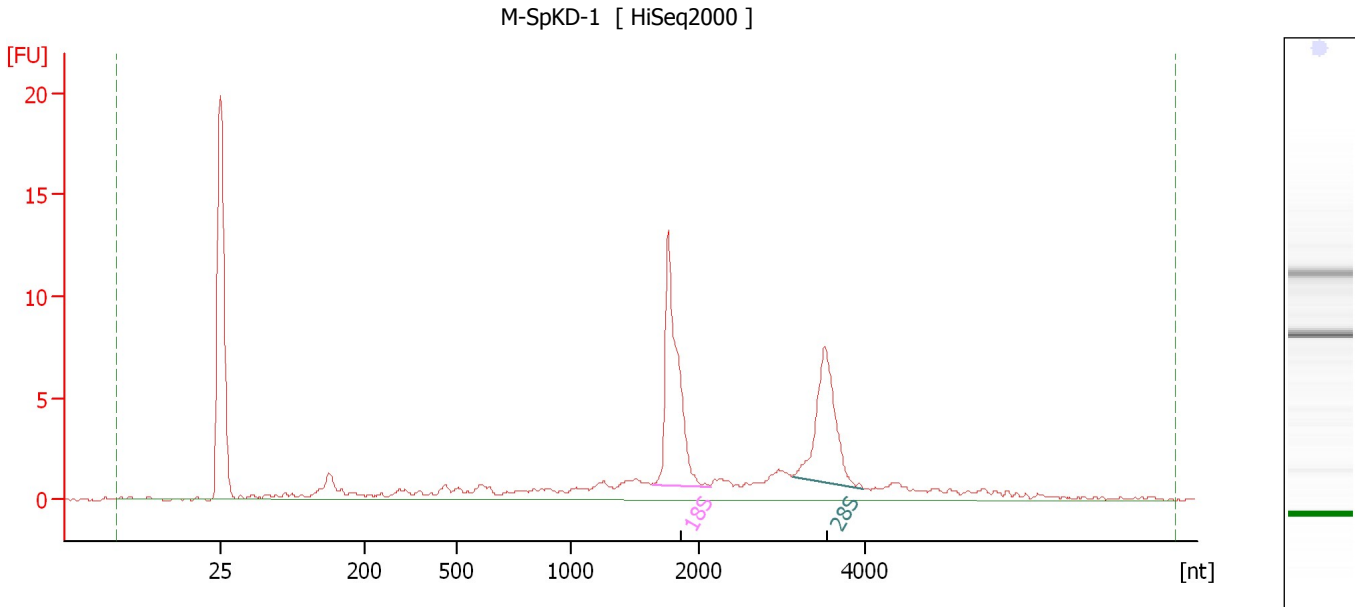
Fragment table for sample 5 : M-WT-5

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,650	2,226	24.0	26.1
28S	2,894	4,115	16.4	17.9

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 6 : M-SpKD-1

RNA Area:	80.5	RNA Integrity Number (RIN):	8.6 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	40 ng/μl		
rRNA Ratio [28s / 18s]:	0.7	Result Flagging Color:	
		Result Flagging Label:	RIN: 8.60

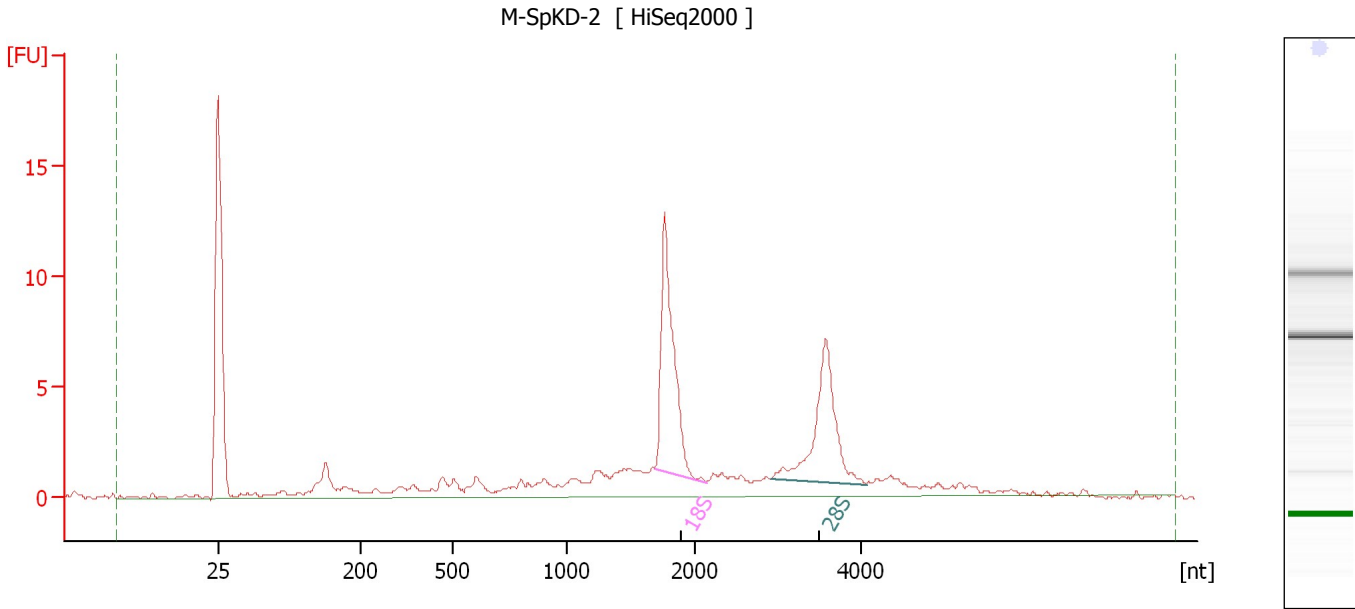
Fragment table for sample 6 : M-SpKD-1

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,639	2,122	17.9	22.3
28S	3,115	3,980	12.9	16.0

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 7 : M-SpKD-2

RNA Area:	78.5	RNA Integrity Number (RIN):	8 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	39 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.8	Result Flagging Label:	RIN:8

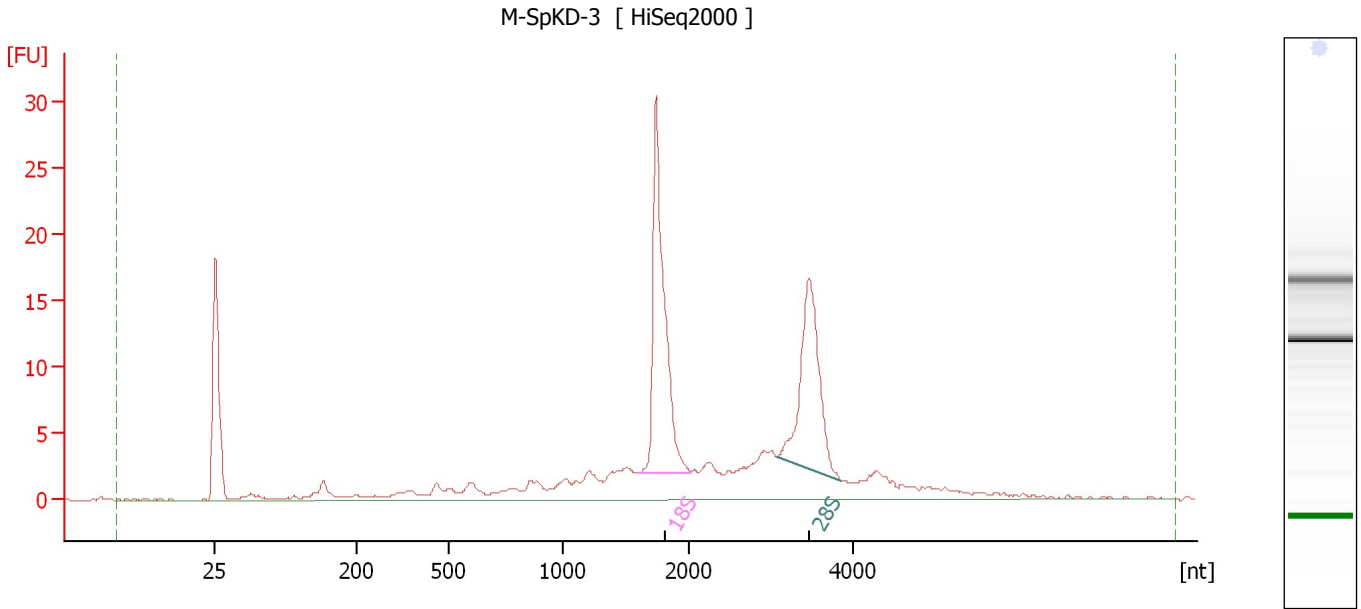
Fragment table for sample 7 : M-SpKD-2

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,678	2,133	16.6	21.1
28S	2,911	4,063	13.2	16.8

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 8 : M-SpKD-3

RNA Area:	165.4	RNA Integrity Number (RIN):	8.3 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	83 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.8	Result Flagging Label:	RIN: 8.30

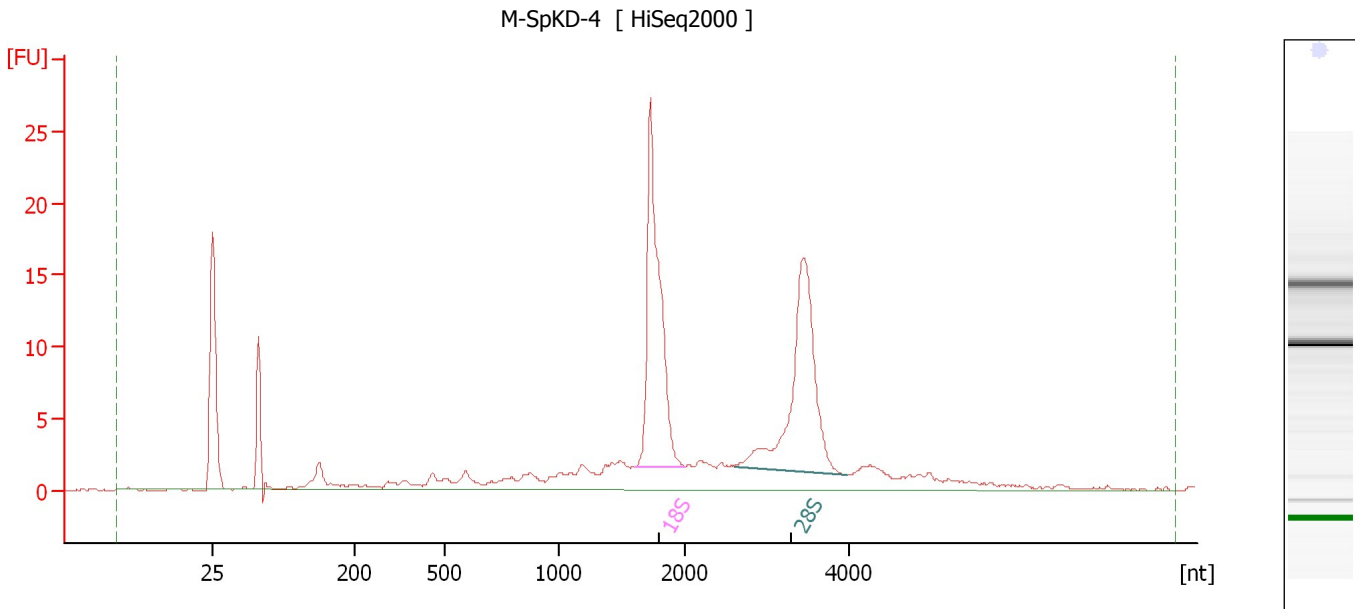
Fragment table for sample 8 : M-SpKD-3

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,599	2,014	37.3	22.6
28S	3,070	3,852	28.1	17.0

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 9 : M-SpKD-4

RNA Area:	162.3	RNA Integrity Number (RIN):	8.8 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	81 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.9	Result Flagging Label:	RIN: 8.80

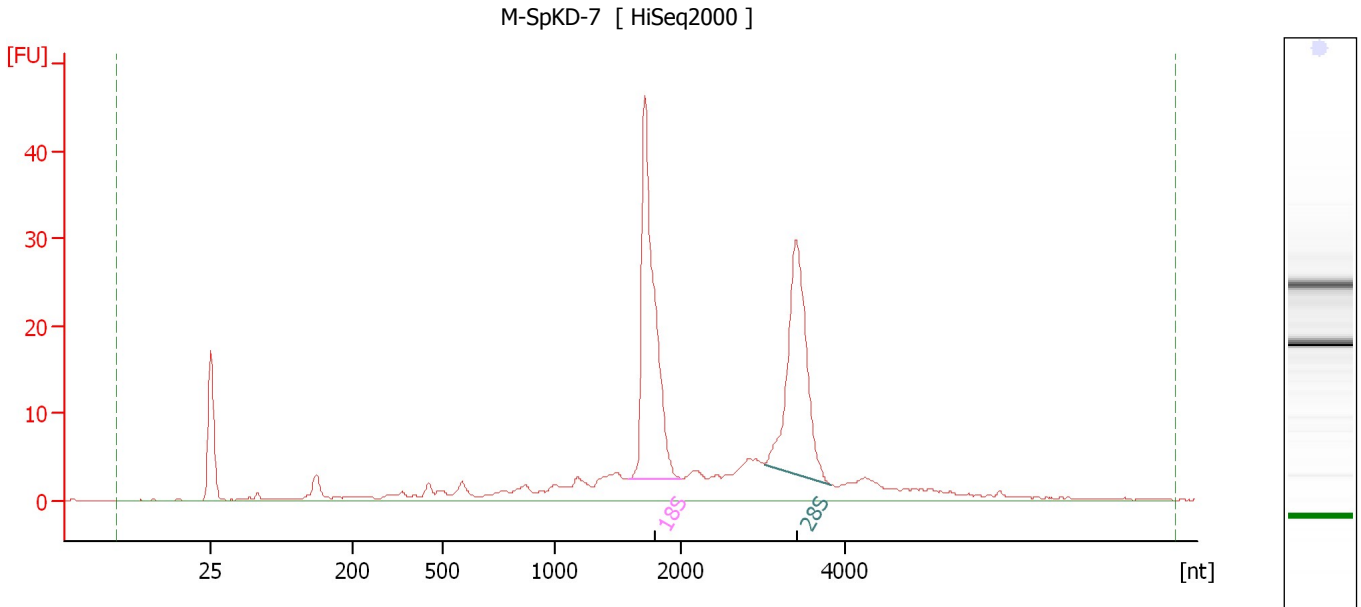
Fragment table for sample 9 : M-SpKD-4

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,604	1,991	37.9	23.3
28S	2,601	3,988	35.8	22.1

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 10 : M-SpKD-7

RNA Area:	250.0	RNA Integrity Number (RIN):	8.8 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	125 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.8	Result Flagging Label:	RIN: 8.80

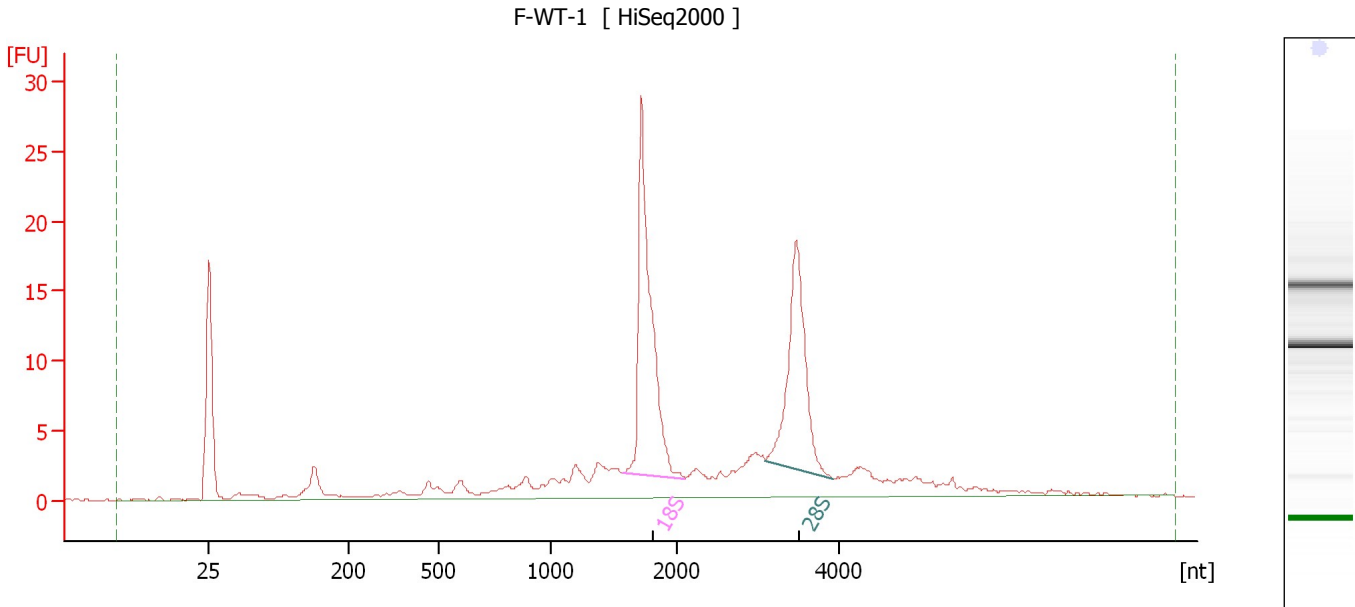
Fragment table for sample 10 : M-SpKD-7

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,593	1,998	64.4	25.8
28S	3,022	3,837	53.4	21.4

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 11 : F-WT-1

RNA Area:	164.5	RNA Integrity Number (RIN):	8.5 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	82 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	0.7	Result Flagging Label:	RIN: 8.50

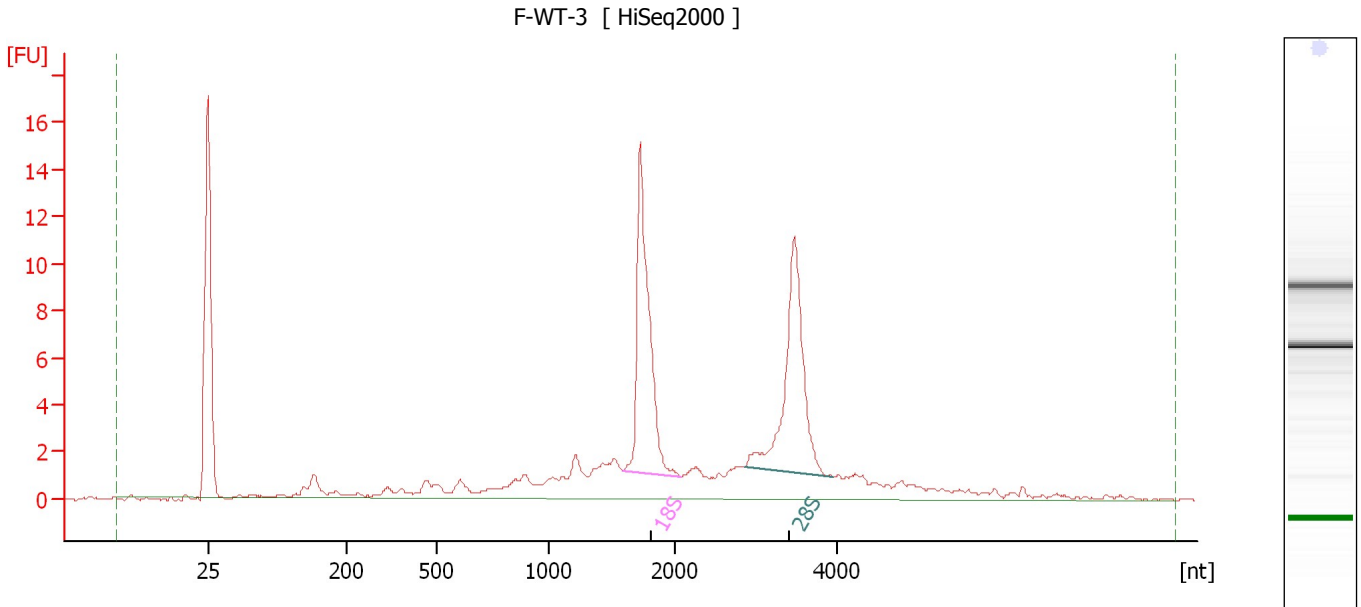
Fragment table for sample 11 : F-WT-1

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,564	2,100	39.2	23.8
28S	3,090	3,935	29.0	17.6

Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Electropherogram Summary Continued ...



Overall Results for sample 12 : F-WT-3

RNA Area:	94.1	RNA Integrity Number (RIN):	8.4 (B.02.08, Anomaly Threshold(s) manually adapted)
RNA Concentration:	47 ng/μl	Result Flagging Color:	
rRNA Ratio [28s / 18s]:	1.0	Result Flagging Label:	RIN: 8.40

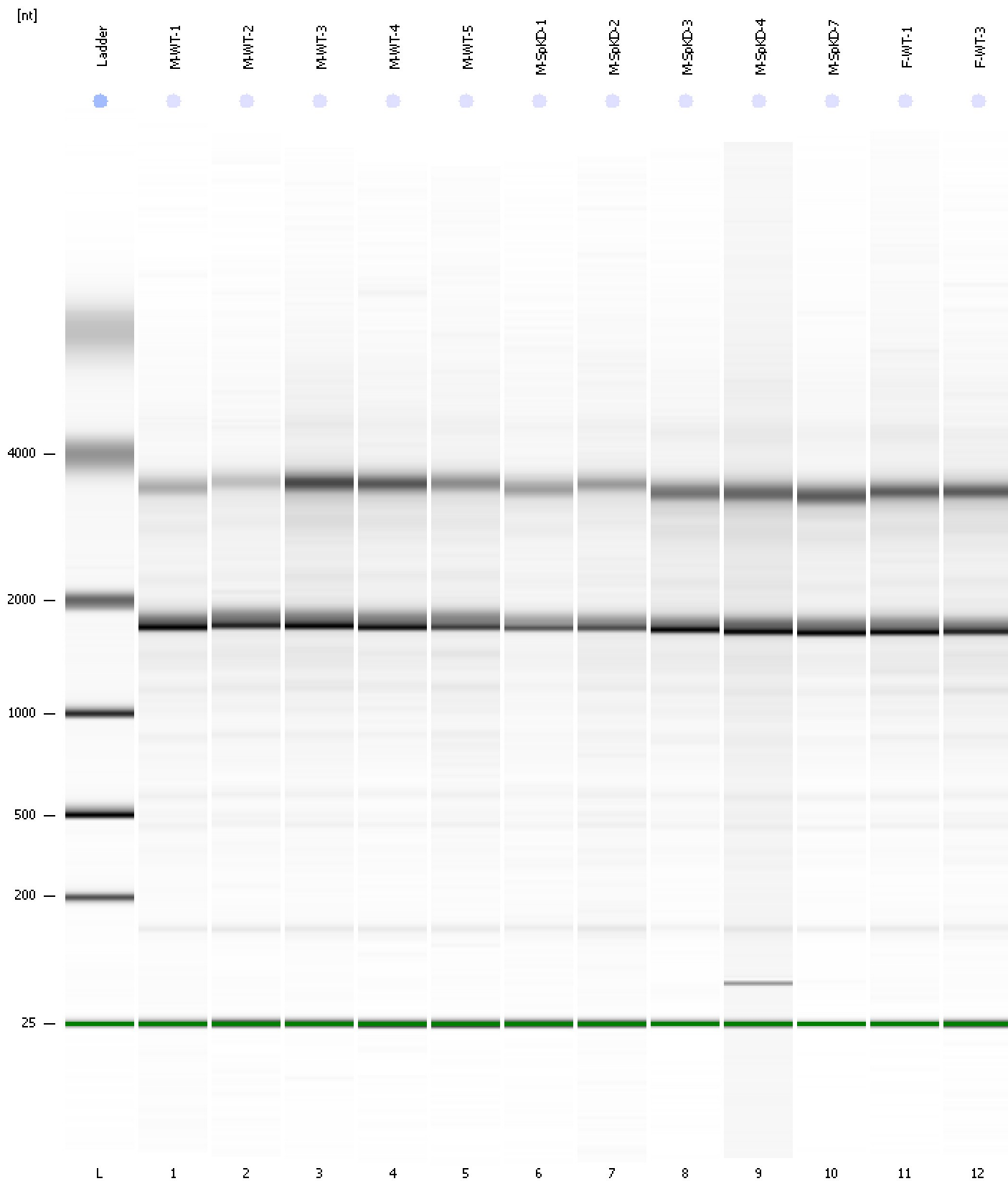
Fragment table for sample 12 : F-WT-3

Name	Start Size [nt]	End Size [nt]	Area	% of total Area
18S	1,580	2,073	20.0	21.3
28S	2,853	3,964	19.2	20.5

Assay Class: Eukaryote Total RNA Nano
Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
Modified: 11/12/2019 10:33:45 AM

Gel Image



Assay Class: Eukaryote Total RNA Nano
 Data Path: C:\... bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad

Created: 11/8/2019 1:10:42 PM
 Modified: 11/12/2019 10:33:45 AM

Run Logbook

Description	Number	Source	Category	Sub Category	Time	Time Zone	User	Host
Run ended on port 1 (Number of wells acquired: 13)		Instrument	Run		11/8/2019 1:34:28 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Run started on port 1 (File: C:\Program Files\Agilent\2100 bioanalyzer\2100 expert\data\2019-11-08\2019-11-08_002.xad)		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Product Number : G2938C		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Name :		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Vendor : Agilent Technologies		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Serial# : DE34903152		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Firmware : C.01.069		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1
Cartridge : Electrode		Instrument	Run		11/8/2019 1:10:47 PM	(GMT --08:00) Pacific Standard Time	UC Davis	D8XSMGH1