

Reservoir Development

PathFinder, a Schlumberger Company
9200 West Reno Avenue
Oklahoma City, Oklahoma 73127 USA
Phone: (405) 789-1515
Fax: (405) 789-1519



December 22, 2014

Cimarex
600 N MARIENFELD STREET SUITE 600

MIDLAND, TX 79701

Re:

Sec 35, T26S, R27E Eddy NM
N 32.00058 W 104.16499

CLIENT: Cimarex Energy Company of Co
WELL: Hornsby 35 Federal Com 3H ST01
FIELD: Wildcat
RIG: Cactus 112
COUNTY: Eddy
API NO: 30-015-42208-01
JOB NO: 14MLD0400

Enclosed, please find the original copy of the survey performed on the referenced well by PathFinder, a division of Schlumberger Technology Corporation.
Other information required by your office is as follows.

<u>Name & Title of Surveyor</u>	<u>Drainhole Number</u>	<u>Surveyed Depths</u>	<u>Dates Performed</u>	<u>Type of Survey</u>
De'Jon Douglas MWD	Hornsby 35 Federal Com 3H ST01 Side Track	9328.00 Ft to 16835.00 Ft	June 20, 2014 to August 5, 2014	SlimPulse

If any other information is required, please contact the undersigned at the above letterhead and phone number.
Sincerely,

Joseph Hogan
Field Service Manager

Reservoir Development

PathFinder, a Schlumberger Company
9200 West Reno Avenue
Oklahoma City, Oklahoma 73127 USA
Phone: (405) 789-1515
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PATHFINDER
A Schlumberger Company

Well Reference:

Sec 35, T26S, R27E Eddy NM
N 32.00058 W 104.16499

I, De'Jon Douglas certify that; I am employed by PathFinder, a division of Schlumberger Technology Corporation; that I did on the day(s) of June 20, 2014 through August 05, 2014, conduct or supervise the taking of the SlimPulse surveys from a depth of 9328.00 feet to a depth of 16835.00 feet referenced to driller's depth; that the data is true, correct, complete and within the limitations of the tool as set forth by Drilling & Measurements, a division of Schlumberger Technology Corporation; that I am authorized and qualified to make this report; that this survey was conducted at the request of Cimarex Energy Company of Co for the Hornsby 35 Federal Com 3H ST01 Well (Side Track) API No. 30-015-42208-01 and that I have reviewed this report and find that it conforms to the principals and procedures as set forth by Drilling & Measurements, a division of Schlumberger Technology Corporation.

By

De'Jon Douglas
MWD

Subscribed and Sworn to before me this 30 day of December (month) 2014 (yr)

My Commission expires:

September 13, 2017

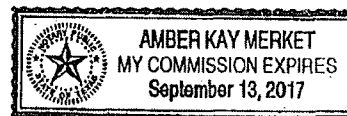
Amber Kay Merket

Notary Public

Midland County, Texas

(County State)

(signature)



SCHEUMBUCHER
Survey Report

17-Jan-2015

Client..... Cimarron Energy Company of Co
Field..... Wildcat

Well..... Hornsby 35 Federal Com 3H 5701
API number..... 30-015-42204-01
Engineer..... D. Douglas

Spud date..... 5-Jun-14
Last survey date..... 5-Aug-14
Total accepted surveys..... 111
MD of first survey..... 9178.00 ft
MD of last survey..... 16835.00 ft

County..... Eddy
State..... New Mexico
Rig..... Cactus 112

Latitude..... 32° 0' 2.009" N
Longitude..... 103° 0' 53.988" W

Survey calculation methods.....
Method for positions..... Minimum curvature
Method for OS..... Lubinski

Depth reference.....
Permanent datum..... MSL
Depth reference..... Driller's Depth
0' above permanent..... 2774.00
10' above permanent..... 4798.00
10' above permanent..... 3298.00

Vertical section origin.....
Latitude (+N/S)..... 0.00 ft
Departure (+E/W)..... 0.00 ft

Grid Coordinates.....
NAD83 Texas State Plane, Central Zone, US Feet
X..... 593519.58 ft
Y..... 361991.26 ft

Azimuth from Vsect Origin to target: 355.28 degrees

-----MWI Survey Reference Criteria-----

Run1..... Calculation Date: 19-Jun-2014
Location G..... 998.6847 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run2..... Calculation Date: 20-Jun-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.91 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run3..... Calculation Date: 26-Jun-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.91 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run4..... Calculation Date: 4-Jul-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run5..... Calculation Date: 8-Jul-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run6..... Calculation Date: 10-Jul-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run7..... Calculation Date: 15-Jul-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run8..... Calculation Date: 25-Jul-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

Run9..... Calculation Date: 1-Aug-2014
Location G..... 998.6815 mgn Tolerance G..... 2.50 mgn
Location B..... 48081.93 nT Tolerance B..... 300.00 nT
Magnetic Dip: 59.79 degrees Tolerance Dip: 0.45 degrees

BSGM Model: 2014

Run1.....
Magnetic dec (+E/W)..... 7.631 degrees
Grid Conv (+E/W)..... 0.08921 degrees
Total Azim Corr (+E/W)..... 7.54179 degrees

Run2.....
Magnetic dec (+E/W)..... 7.632 degrees
Grid Conv (+E/W)..... 0.08921 degrees
Total Azim Corr (+E/W)..... 7.54179 degrees

Run3.....
Magnetic dec (+E/W)..... 7.632 degrees
Grid Conv (+E/W)..... 0.08921 degrees
Total Azim Corr (+E/W)..... 7.54179 degrees

Run4.....
Magnetic dec (+E/W)..... 7.631 degrees
Grid Conv (+E/W)..... 0.08921 degrees
Total Azim Corr (+E/W)..... 7.54179 degrees

Run5.....
Magnetic dec (+E/W)..... 7.631 degrees
Grid Conv (+E/W)..... 0.08921 degrees
Total Azim Corr (+E/W)..... 7.54179 degrees

-----Run#-----
Magnetic dec (H/W)..... 7.637 degrees
Grid Conv (H/W)..... 0.06921 degrees
Total Azim Cor (H/W)..... 7.54779 degrees

-----Run#-----
Magnetic dec (H/W)..... 7.637 degrees
Grid Conv (H/W)..... 0.06921 degrees
Total Azim Cor (H/W)..... 7.54779 degrees

-----Run#-----
Magnetic dec (H/W)..... 7.537 degrees
Grid Conv (H/W)..... 0.06921 degrees
Total Azim Cor (H/W)..... 7.54779 degrees

-----Run#-----
Magnetic dec (H/W)..... 7.637 degrees
Grid Conv (H/W)..... 0.06921 degrees
Total Azim Cor (H/W)..... 7.54779 degrees

-----Survey Connection Index Description-----
0 = Uncorrected 1 = Sag Corrected
2 = OMAG Corrected 3 = Sag + OMAG Corrected

Survey List														
Seq	MD	Incl	Azim	Course	TVL	V Sec	H/S	L/W	Closure	at Az	DLS	Tool	Correction	
	(ft)	(deg)	(deg)	(ft)	(ft)	(ft)	(ft)	(ft)	(ft)	(deg)	(deg/100ft)			
1	0.00	0.00	0.00	999.75	0.00	0.00	0.00	0.00	0	90.00	0.00	TIP	0	
2	398.01	1.58	288.54	998.00	297.95	2.17	1.71	-5.20	5.48732	288.53	0.40	Other	0	
3	491.00	0.09	6.54	93.00	490.94	2.74	2.77	-4.41	6.78508	287.11	1.68	Other	0	
4	585.00	0.22	323.47	94.00	584.98	2.97	2.44	-6.51	6.95245	290.57	0.18	Other	0	
5	682.00	0.09	102.55	97.00	681.94	3.11	2.58	-6.55	7.03434	291.47	0.30	Other	0	
6	767.00	0.00	7.50	85.00	766.94	3.09	2.56	-6.48	6.9684	291.56	0.11	Other	0	
7	861.00	0.00	118.72	94.00	860.94	3.09	2.56	-6.48	6.9684	291.56	0.00	Other	0	
8	953.00	0.62	340.95	92.00	952.94	3.57	3.03	-6.64	7.30217	294.51	0.67	Other	0	
9	1043.00	0.00	181.35	90.00	1042.93	4.04	3.49	-6.80	7.64597	297.17	0.89	Other	0	
10	1132.00	0.09	252.54	89.00	1131.93	4.02	3.47	-6.87	7.69588	298.00	0.10	Other	0	
11	1224.00	0.00	295.04	92.00	1223.93	4.01	3.45	-6.94	7.74778	296.43	0.10	Other	0	
12	1310.00	0.00	7.50	96.00	1310.93	4.01	3.45	-6.94	7.74778	296.43	0.00	Other	0	
13	1419.00	0.09	246.17	93.00	1418.91	3.48	3.42	-7.01	7.79767	295.99	0.09	Other	0	
14	1513.00	0.09	140.34	94.00	1512.91	3.90	3.33	-7.03	7.77847	295.35	0.15	Other	0	
15	1608.00	0.00	5.57	95.00	1607.93	3.91	3.35	-6.97	7.76266	295.64	0.17	Other	0	
16	1702.00	0.00	9.43	90.00	1701.93	3.99	3.42	-6.97	7.76334	296.18	0.09	Other	0	
17	1798.00	0.70	7.05	92.00	1798.03	3.99	3.42	-6.97	7.76331	296.18	0.00	Other	0	
18	1896.00	0.09	185.33	97.00	1895.91	3.91	3.35	-6.97	7.76332	295.65	0.09	Other	0	
19	1791.00	0.00	30.39	95.00	1790.93	3.84	3.27	-6.98	7.7085	295.14	0.09	Other	0	
20	2082.00	0.22	60.45	91.00	2081.93	3.91	3.36	-6.83	7.60885	296.21	0.24	Other	0	
21	2117.00	0.00	207.05	35.00	2116.93	3.94	3.39	-6.77	7.57124	296.63	0.63	Other	0	
22	2238.00	0.09	207.05	121.00	2237.93	3.86	3.31	-6.81	7.57251	295.91	0.07	Other	0	
23	2266.00	0.09	292.75	78.00	2265.91	3.85	3.30	-6.84	7.56496	295.74	0.44	Other	0	
24	2367.00	0.00	204.61	96.00	2366.93	3.82	3.26	-6.94	7.60921	295.14	0.13	Other	0	
25	2456.00	0.22	205.17	94.00	2455.93	3.60	3.03	-7.05	7.67709	293.25	0.14	Other	0	
26	2551.00	0.10	223.62	95.00	2550.93	3.22	2.62	-7.36	7.80969	289.62	0.21	Other	0	
27	2645.00	0.40	261.12	94.00	2644.93	2.87	2.73	-7.87	8.18773	285.81	0.14	Other	0	
28	2740.00	1.71	279.01	95.00	2739.91	3.08	2.30	-9.57	9.838	283.52	1.49	Other	0	
29	2836.00	1.71	289.05	96.00	2835.87	4.00	2.99	-12.33	12.69167	283.63	0.31	Other	0	
30	2930.00	0.31	233.42	94.00	2929.85	4.43	3.30	-13.86	14.25089	283.38	1.66	Other	0	
31	3026.00	1.32	152.34	96.00	3025.84	3.27	2.16	-13.56	13.73951	279.07	1.16	Other	0	
32	3124.00	1.37	161.04	98.00	3123.82	1.14	0.10	-12.67	12.66886	270.44	0.20	Other	0	
33	3217.00	1.10	172.75	93.00	3216.80	-0.79	-1.80	-12.30	12.31317	261.60	0.15	Other	0	
34	3311.00	0.70	160.25	94.00	3310.79	-2.25	-3.24	-11.88	12.31896	254.77	0.47	Other	0	
35	3406.00	0.62	130.61	95.00	3405.78	-3.17	-4.12	-11.30	12.02475	249.98	0.36	Other	0	
36	3501.00	0.18	109.05	98.00	3500.77	-2.72	-4.60	-10.51	11.44484	246.38	0.15	Other	0	
37	3598.00	0.70	113.45	94.00	3597.77	-4.15	-4.95	-9.61	10.81015	242.73	0.24	Other	0	
38	3692.00	0.70	111.87	94.00	3691.76	-4.67	-5.39	-8.55	10.1088	237.75	0.02	Other	0	
39	3787.00	0.48	109.45	95.00	3786.76	-5.10	-5.74	-7.64	9.55377	233.05	0.23	Other	0	
40	3881.00	0.40	158.36	94.00	3880.76	-5.57	-6.18	-7.14	9.44452	229.14	0.40	Other	0	
41	3975.00	0.70	174.93	94.00	3974.75	-6.46	-7.06	-6.97	9.91873	224.65	0.36	Other	0	
42	4071.00	0.58	126.06	96.00	4070.75	-7.31	-7.88	-6.59	10.27758	219.93	0.55	Other	0	
43	4165.00	0.70	114.24	94.00	4164.74	-7.84	-8.34	-5.75	10.13485	214.58	0.27	Other	0	
44	4268.00	0.48	120.53	103.00	4267.74	-8.45	-8.88	-4.85	10.15662	208.63	0.26	Other	0	
45	4354.00	0.40	148.34	86.00	4353.73	-8.97	-9.37	-4.41	10.35418	206.23	0.19	Other	0	
46	4449.00	0.68	140.52	95.00	4448.71	-9.59	-9.96	-3.99	10.72426	201.82	0.11	Other	0	
47	4545.00	0.48	171.83	96.00	4544.73	-10.33	-10.67	-3.69	11.28541	199.07	0.39	Other	0	
48	4640.00	0.62	192.86	95.00	4639.72	-11.21	-11.56	-3.76	12.1584	198.01	0.24	Other	0	
49	4735.00	0.70	105.76	95.00	4734.72	-11.51	-12.22	-3.32	12.66301	195.18	0.96	Other	0	
50	4830.00	0.00	144.75	95.00	4829.72	-12.17	-12.44	-2.71	12.73193	197.30	0.67	Other	0	
51	4925.00	0.42	51.84	95.00	4924.72	-12.06	-12.30	-2.41	12.53889	191.09	0.44	Other	0	
52	5021.00	0.62	49.42	96.00	5020.71	-11.57	-11.75	-1.75	11.81995	188.48	0.23	Other	0	
53	5116.00	0.70	41.23	95.00	5115.70	-10.87	-10.98	-0.97	11.0958	185.07	0.13	Other	0	
54	5212.00	0.48	81.54	95.00	5210.70	-10.44	-10.49	-0.19	10.49291	181.06	0.48	Other	0	
55	5306.00	0.31	87.52	95.00	5305.70	-10.42	-10.47	0.46	10.43143	177.50	0.18	Other	0	
56	5403.00	0.48	111.56	97.00	5402.70	-10.61	-10.56	1.10	10.61613	174.08	0.24	Other	0	
57	5497.00	0.70	101.81	94.00	5496.69	-10.37	-10.21	1.76	10.36099	170.24	0.83	Other	0	
58	5592.00	0.79	11.63	95.00	5591.64	-9.37	-9.16	2.40	9.46567	165.31	0.10	Other	0	
59	5689.00	0.18	344.34	97.00	5688.68	-8.38	-8.19	6.64	8.62055	162.16	0.60	Other	0	
60	5782.00	0.48	295.73	93.00	5781.68	-7.80	-7.65	2.18	7.95525	164.08	0.47	Other	0	
61	5879.00	0.79	285.05	97.00	5878.67	-7.37	-7.30	1.17	7.39333	170.89	0.34	Other	0	
62	5969.00	0.81	327.86	90.00	5968.64	-5.69	-5.74	0.31	5.74463	183.10	1.80	Other	0	
63	6063.00	2.29	311.74	94.00	6062.57	-7.33	-2.49	-1.82	3.08181	216.19	0.60	Other	0	
64	6159.00	2.50	327.55	96.00	6158.49	1.46	1.16	-3.58	2.76878	288.00	0.70	Other	0	
65	6255.00	1.89	338.26	96.00	6254.41	4.89	4.47	-5.33	4.95553	300.95	0.85	Other	0	
66	6350.00	1.83	346.36	95.00	6349.36	7.86	7.37	-6.76	9.63773	319.66	0.79	Other	0	
67	6443.00	1.49	23.62	93.00	6442.31	10.37	9.90	-6.12	11.6396	328.27	1.17	Other	0	
68	6539.00	1.71	2.42	96.00	6538.29	12.89	12.47	-5.56	13.63788	335.97	0.65	Other	0	
69	6634.00	1.58	27.54	95.00	6633.25	15.40	15.05	-4.90	15.82811	341.98	0.76	Other	0	
70	6729.00	1.58	94.42	95.00	6728.22	16.30	16.11	-7.98	16.38643	349.51	1.83	Other	0	
71	6824.00	1.71	70.95	95.00	6823.19	16.45	16.47	-0.34	16.47762	358.82	0.77	Other	0	
72	6918.00	1.10	72.36	94.00	6917.16	17.00	17.21	1.85	17.34371	6.13	0.65	Other	0	
73	7012.00	1.19	76.05	94.00	7011.14	12.25	12.51	3.65	16.08708	21.66	0.12	Other	0	
74	7109.00	0.88	91.15	97.00	7108.12	17.41	17.92	5.38	18.70506	16.70	0.45	Other	0	
75	7203.00	0.67	115.03	95.00	7202.11	17.06	17.66	6.57	18.84095	20.41	0.40	Other	0	
76	7300.00	0.40	109.05	96.00	7299.11	16.67	17.33	7.35	18.87615	23.00	0.24	Other	0	
77	7395.00	0.72	123.64	95.00	7394.11	16.47	17.17	7.82	18.87746	24.56	0.21	Other	0	
78	7489.00	0.79	108.75	94.00	7488.11	16.05	16.81	8.59	18.87747	27.05	0.62	Other	0	
79	7583.00	1.01	142.54	94.00	7582.09	15.09	15.95	9.70	18.86636	31.32	0.69	Other	0	
80	7678.00	1.10	176.33	95.00	7677.08	13.48	14.37	10.27	17.64445	35.55	0.65	Other	0	
81	7774.00	1.01	185.33	96.00	7773.06	11.73	12.61	10.77	16.79118	39.16	0.18	Other	0	
82	7870.00	1.49	184.95	96.00	7869.04	9.65	10.52	10.09	14.580620					

90	8629.00	1.32	308.13	96.00	7677.87	11.08	11.64	6.37	13.24874	26.51	0.21	Other	0
91	8722.00	1.19	257.25	93.00	8720.79	12.33	12.75	4.61	13.66007	19.94	0.28	Other	0
92	8817.00	1.01	279.34	95.00	8815.78	13.06	13.35	2.93	13.65527	12.37	0.41	Other	0
93	8913.00	1.19	270.34	96.00	8911.76	13.86	13.49	1.09	13.53579	4.64	0.26	Other	0
94	9008.00	1.01	271.23	93.00	9006.74	13.26	13.25	-0.85	13.75302	357.18	0.42	Other	0
95	9103.00	1.10	248.14	95.00	9099.71	17.80	12.65	-1.30	13.85842	359.72	0.14	Other	0
96	9158.00	0.88	235.44	97.00	9156.71	12.20	11.93	-1.80	12.51746	342.32	0.77	Other	0
97	9260.00	1.10	210.34	82.00	9278.70	11.47	11.10	-4.55	12.15687	335.98	0.33	Other	0
98	9378.00	1.36	212.86	48.00	9326.69	10.76	10.33	-5.61	11.75538	331.49	0.94	Other	0
99	9460.00	1.61	205.65	12.00	9358.68	10.07	9.61	-6.01	11.34493	327.97	0.99	Other	0
100	9592.00	1.90	223.86	37.00	9390.66	9.33	8.87	-6.57	11.00161	421.31	1.95	Other	0
101	9628.00	4.37	278.54	32.00	9472.61	8.61	7.99	-8.08	11.35313	314.70	8.64	Other	0
102	9655.00	8.45	260.25	37.00	9454.41	8.07	7.15	-11.53	11.56705	301.80	13.11	Other	0
103	9687.00	12.43	260.06	31.00	9481.89	7.57	6.19	-17.06	10.11952	289.93	12.81	Other	0
104	9510.00	15.62	259.36	22.00	9515.91	6.81	4.80	-24.69	25.19001	280.99	9.99	Other	0
105	9550.00	18.91	262.10	31.00	9545.51	6.10	3.34	-33.77	33.97957	275.64	10.94	Other	0
106	9582.00	22.70	265.55	32.00	9575.49	5.95	2.26	-44.94	44.99528	272.88	11.39	Other	0
107	9614.00	25.78	271.43	32.00	9604.71	5.83	2.07	-57.34	57.57164	272.04	12.78	Other	0
108	9645.00	30.00	275.97	31.00	9647.17	8.99	3.01	-72.39	72.45614	272.41	15.24	Other	0
109	9677.00	34.14	280.13	32.00	9659.24	17.78	5.46	-81.70	89.36517	278.50	16.66	Other	0
110	9709.00	37.66	282.27	32.00	9695.15	17.64	9.17	-107.80	107.98307	278.84	11.68	Other	0
111	9741.00	41.94	287.25	32.00	9709.74	24.80	14.37	-127.58	128.18456	276.44	16.66	Other	0
112	9772.00	44.69	290.91	31.00	9732.30	33.40	21.31	-147.46	148.59437	278.23	12.02	Other	0
113	9803.00	46.81	295.44	37.00	9751.63	44.13	30.36	-168.51	171.22676	280.21	12.10	Other	0
114	9845.00	48.85	301.02	31.00	9775.45	50.63	41.24	-188.73	191.18483	282.33	14.88	Other	0
115	9867.00	51.85	305.50	32.00	9795.87	71.80	54.76	-209.31	216.35524	284.66	14.27	Other	0
116	9899.00	54.65	309.05	37.00	9815.07	88.96	70.10	-229.69	240.21078	287.02	12.47	Other	0
117	9930.00	58.33	310.99	31.00	9832.14	107.16	86.97	-249.48	264.18499	289.21	12.97	Other	0
118	9962.00	60.79	311.00	32.00	9848.35	126.91	105.03	-270.29	289.97835	291.23	7.70	Other	13
119	10004.00	67.58	316.48	106.00	9900.84	194.76	157.54	-317.90	317.15117	296.17	2.95	Other	0
120	10046.00	69.99	321.82	18.00	9909.98	206.35	178.23	-349.12	391.98441	297.04	9.01	Other	0
121	10116.00	58.98	321.75	30.00	9925.42	225.32	195.70	-368.00	416.80234	298.00	0.42	Other	0
122	10164.00	58.62	313.07	48.00	9950.29	255.65	221.65	-398.07	456.60054	299.33	0.95	Other	1
123	10196.00	59.88	314.76	32.00	9966.65	276.21	242.64	-417.57	481.29144	303.14	5.07	Other	1
124	10277.00	62.96	317.99	31.00	9981.48	297.31	261.27	-436.87	509.50291	300.92	14.50	Other	1
125	10359.00	64.19	320.56	32.00	9995.77	320.50	283.08	-455.61	536.78173	301.94	8.15	Other	1
126	10391.00	65.57	321.49	37.00	10009.31	344.45	306.51	-473.73	564.74177	302.90	5.04	Other	1
127	10423.00	67.58	324.07	37.00	10022.03	369.21	329.89	-491.49	593.53188	303.87	9.73	Other	1
128	10454.00	69.99	326.21	11.00	10031.25	394.20	352.60	-508.00	618.94761	304.84	10.09	Other	1
129	10486.00	71.71	328.58	32.00	10043.75	420.92	379.06	-524.28	646.96392	305.87	8.82	Other	1
130	10517.00	73.25	332.84	31.00	10052.95	447.83	404.88	-538.76	673.53061	306.92	14.68	Other	1
131	10549.00	75.16	336.89	32.00	10061.48	476.74	432.79	-551.85	701.31925	308.11	13.20	Other	1
132	10581.00	75.94	340.21	32.00	10069.41	506.47	461.64	-563.18	728.21091	309.34	10.21	Other	1
133	10613.00	77.18	343.00	32.00	10076.80	536.67	491.19	-573.01	754.18134	310.60	9.60	Other	1
134	10644.00	78.17	345.83	31.00	10083.10	566.48	520.42	-581.16	780.11365	311.84	10.64	Other	1
135	10676.00	80.97	348.71	32.00	10088.63	597.68	551.16	-588.10	806.00011	313.14	10.47	Other	1
136	10708.00	83.73	351.13	32.00	10092.90	629.29	581.46	-593.10	831.24242	314.48	16.26	Other	1
137	10738.00	83.73	354.90	30.00	10096.18	659.10	612.12	-596.71	854.49235	315.75	5.85	Other	0
138	10770.00	84.01	355.49	32.00	10099.59	690.92	643.83	-598.88	879.28812	317.07	2.08	Other	0
139	10802.00	83.49	356.72	32.00	10103.07	722.73	675.56	-601.04	904.23028	318.34	4.18	Other	0
140	10833.00	82.53	358.77	31.00	10106.82	753.47	706.31	-602.25	928.21264	319.55	7.17	Other	0
141	10865.00	81.80	361.41	32.00	10111.15	785.08	738.01	-602.36	952.6234	320.78	6.78	Other	0
142	10897.00	81.17	363.55	32.00	10115.87	816.53	769.65	-601.43	976.7644	321.99	5.81	Other	0
143	10928.00	81.24	366.00	31.00	10120.63	846.90	800.25	-599.58	1000.1834	323.14	1.06	Other	0
144	10960.00	82.09	368.71	32.00	10125.77	878.28	831.87	-598.47	1024.7184	324.27	2.69	Other	0
145	10992.00	83.14	371.28	32.00	10129.38	909.73	861.56	-596.72	1049.6725	325.36	3.28	Other	0
146	11024.00	83.70	373.52	95.00	10133.96	1003.49	958.08	-591.35	1125.8814	326.32	4.83	Other	0
147	11056.00	84.77	375.76	95.00	10140.64	1097.59	1052.89	-586.67	1205.3041	327.67	1.47	Other	0
148	11088.00	84.73	377.99	95.00	10143.46	1191.95	1147.80	-581.82	1287.7476	328.04	1.25	Other	0
149	11120.00	85.56	380.22	95.00	10145.71	1286.47	1242.76	-581.91	1372.2472	328.41	0.48	Other	0
150	11152.00	86.04	382.45	96.00	10147.73	1381.90	1338.71	-580.00	1456.5593	328.58	0.59	Other	0
151	11184.00	86.59	384.68	95.00	10149.87	1476.34	1403.68	-577.55	1545.6918	328.86	0.70	Other	0
152	11216.00	86.45	386.91	95.00	10151.64	1570.77	1518.64	-575.05	1633.2455	329.18	0.36	Other	0
153	11248.00	86.31	389.14	95.00	10153.69	1665.24	1623.61	-572.86	1721.2081	329.57	0.16	Other	0
154	11280.00	86.59	391.37	95.00	10155.60	1759.73	1718.58	-570.87	1810.9172	329.62	0.34	Other	0
155	11312.00	86.55	393.60	95.00	10157.37	1854.23	1813.54	-568.93	1900.707	329.58	0.11	Other	0
156	11344.00	86.66	395.83	95.00	10159.07	1948.70	1908.53	-566.80	1990.9222	329.46	0.18	Other	0
157	11376.00	86.55	398.06	95.00	10160.63	2044.18	2004.51	-564.70	2082.5314	329.27	0.22	Other	0
158	11408.00	86.49	399.29	93.00	10162.25	2139.67	2099.49	-562.68	2171.6488	329.08	0.71	Other	0
159	11440.00	86.16	401.52	95.00	10163.82	2235.70	2194.47	-561.05	2263.1158	328.65	0.76	Other	0
160	11472.00	86.66	403.75	95.00	10165.64	2331.77	2289.45	-559.56	2354.5087	328.24	0.76	Other	0
161	11504.00	86.11	405.98	94.00	10167.49	2427.27	2384.41	-558.24	2446.9199	327.81	0.92	Other	0
162	11536.00	86.35	408.21	95.00	10169.29	2523.71	2479.37	-555.84	2539.0364	327.36	0.25	Other	0
163	11568.00	86.93	410.44	95.00	10171.04	2620.19	2574.34	-553.81	2632.2679	326.85	0.67	Other	0
164	11600.00	87.90	412.67	94.00	10172.99	2716.35	2669.37	-551.64	2723.5848	326.29	0.52	Other	0
165	11632.00	88.28	414.90	92.00	10174.85	2812.51	2764.38	-549.59	2813.8747	325.70	0.77	Other	0
166	11664.00	88.78	417.13	91.00	10176.70	2908.67	2859.53	-547.50	2904.6056	325.10	0.19	Other	0
167	11696.00	89.28	419.36	95.00	10178.56	2994.77	2954.77	-545.44	3000.6435	324.48	0.18	Other	0
168	11728.00	89.78	421.59	95.00	10180.41	3080.87	3049.87	-543.38	3096.7129	323.84	1.33	Other	0
169	11760.00	90.34	423.82	94.00	10182.26	3166.96	3144.71	-541.32	3192.8482	323.17	0.74	Other	0
170	11792.00	90.84	426.05	93.00	10184.11	3253.05	3230.80	-539.26	3288.9835	322.49	1.66	Other	0
171	11824.00	91.34	428.28	92.00	10185.96	3339.14	3316.89	-537.20	3385.1188	321.81	0.37	Other	0
172	11856.00	91.84	430.51	95.00	10187.81	3425.23	3403.64	-535.14	3481.2541	321.13	0.77	Other	0
173	11888.00	92.34	432.74	94.00	10189.66	3511.32	3490.73	-533.08	3577.3894	320.45	5.20</		