

DATA REPORT
Hydrographic Characteristics of
Clayoquot Sound, British Columbia, Canada
June 2008
R/V Clifford A Barnes Cruise #918

By

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Abstract

This cruise report contains a day-by-day sampling log and water column CTD data collected in Clayoquot Sound, British Columbia, Canada. Data was collected from June 18-28, 2008 aboard the R/V Clifford A. Barnes. The objectives of the cruise were to explore the factors that control organic matter remineralization in the water and preservation in the sediment, collect sediment and settling particles for organic analyses back in the lab at the School of Oceanography, University of Washington, Seattle, and to relate water column properties (e.g. oxygen content, temperature) and remotely derived information (satellite and aerial data) to carbon cycling in the fjords. Student researchers collected sediment, particulate and water samples within all the major inlets of Clayoquot Sound.

Introduction

The scientific objectives of the June 2008 cruise to Clayoquot Sound, Vancouver Island included various efforts related to organic carbon cycling in the inlets. Evaluations were made of water column conditions (temperature, density, oxygen content, chlorophyll fluorescence, etc.) within the inlets and sampling near surface light conditions for comparison with satellite/aerial data. To accomplish these goals, several types of measurements were made; CTD casts, multicore sediment grabs, water samples and incubations, plankton samples, sediment trap deployments, and near surface light characteristics. CTD measurements were made at more than forty stations throughout Clayoquot Sound (Figure 1). Water samples were collected at many stations and bacterial growth rates measured using ^3H -thymidine. At two stations, numbered 47 and 48, we deployed the sediment multicorer several times in order to collect sediment for evaluation of stable isotopic compositions of dissolved inorganic carbon. We also deployed a net trap to collect sinking particles at a variety of stations throughout the Sound.

All inquiries for data should be addressed to Dr. Keil. Cruise participants and their affiliations are listed in Table 1. The cruise event log is presented as Table 2.

The June cruise was divided into two legs:

- Leg 1: June 16 - 25, 2008: Water column survey of all of Clayoquot Sound with addition of sediment trap sampling in each inlet. Cheryl Greengrove and Rick Keil took the lead. Measurements included water temperature, salinity, density, particle load, oxygen content, nutrients, phytoplankton abundance and identification, bacterial growth rates and water/atmospheric optical conditions. Our purpose was to identify key features that control the abundance of microscopic organisms in the Sound, and identify key physical features of the local ocean that determine water renewal and mixing in the Sound.
- Leg 2: June 25 - July 1, 2008: Focused effort in Tofino Inlet to evaluate sediment and water characteristics, and to evaluate coupling between the water and the watershed. Miles Logsdon and Rick Keil took the lead. We deployed sediment traps in Tofino Inlet near Rankin Rocks and in Tranquill Inlet. Sediment was collected using the multicorer at stations 47 and 48 in Tofino Inlet. We also deployed the weather station and drifting optical turtles to record local water and weather conditions and upper water light field data.

The ship departed the University of Washington on the morning of June 16, but was struck with a fuel line leak and the cruise was delayed one day. We re-departed the following morning after the ship was fixed. This marks the second cruise of the last three that was affected by ship failure.

Methods

CTD casts were made with a SEABIRD 911plus equipped with an oxygen sensor, fluorometer, transmissometer and PAR sensor and lowered at a rate of 20 m/min. Oxygen samples were collected and run on board using the Winkler titration method (Carpenter 1965). Nutrient samples were collected on 50 ml sample bottles and frozen for analysis by the UW Marine Chemistry Laboratory upon return. Bacterial growth was measured using the thymidine approach of Chin-Leo and Kirchman (1988). Light measurements were made with a light meter attached to the CTD rosette and surface water characteristics determined by taking surface samples, filtering and storing for future analysis.

The settling trap is described in Peterson et al., 2005. Table 3 presents the CTD data. All times in Table 2 and 3 are local.

References

- Carpenter, J.H. 1965. The Chesapeake Bay Institute technique for the Winkler dissolved oxygen method. *Limnol. Oceanogr.* 10:141-143.
- Chin-Leo G. and Kitchman D.L. (1988) Estimating bacterial production in marine waters from the simultaneous incorporation of thymidine and leucine. *Applied and Environmental Microbiology* **54**(8), 1934-1939.
- Nuwer, J.M. and Keil, R.G., 2005. Sedimentary organic matter geochemistry of Clayoquot Sound, Vancouver Island, British Columbia. *Limnology and Oceanography*, 50(4): 1119-1128.
- Parsons, T.R., Miata, Y., and Lalli, C.M. (1984) A manual of chemical and biological methods for seawater analysis. Pergamon Press, Oxford. 173 p.
- Peterson, M.L., Wakeham, S.G., Lee, C., Askea, M.A. and Miquel, J.C., 2005. Novel techniques for collection of sinking particles in the ocean and determining their settling rates. *Limnology and Oceanography-Methods*, 3: 520-532.

Figure 1. Approximate locations of sampling stations in June 2008. Pipestem Inlet (Barkley Sound, stations 20-25) was not sampled.

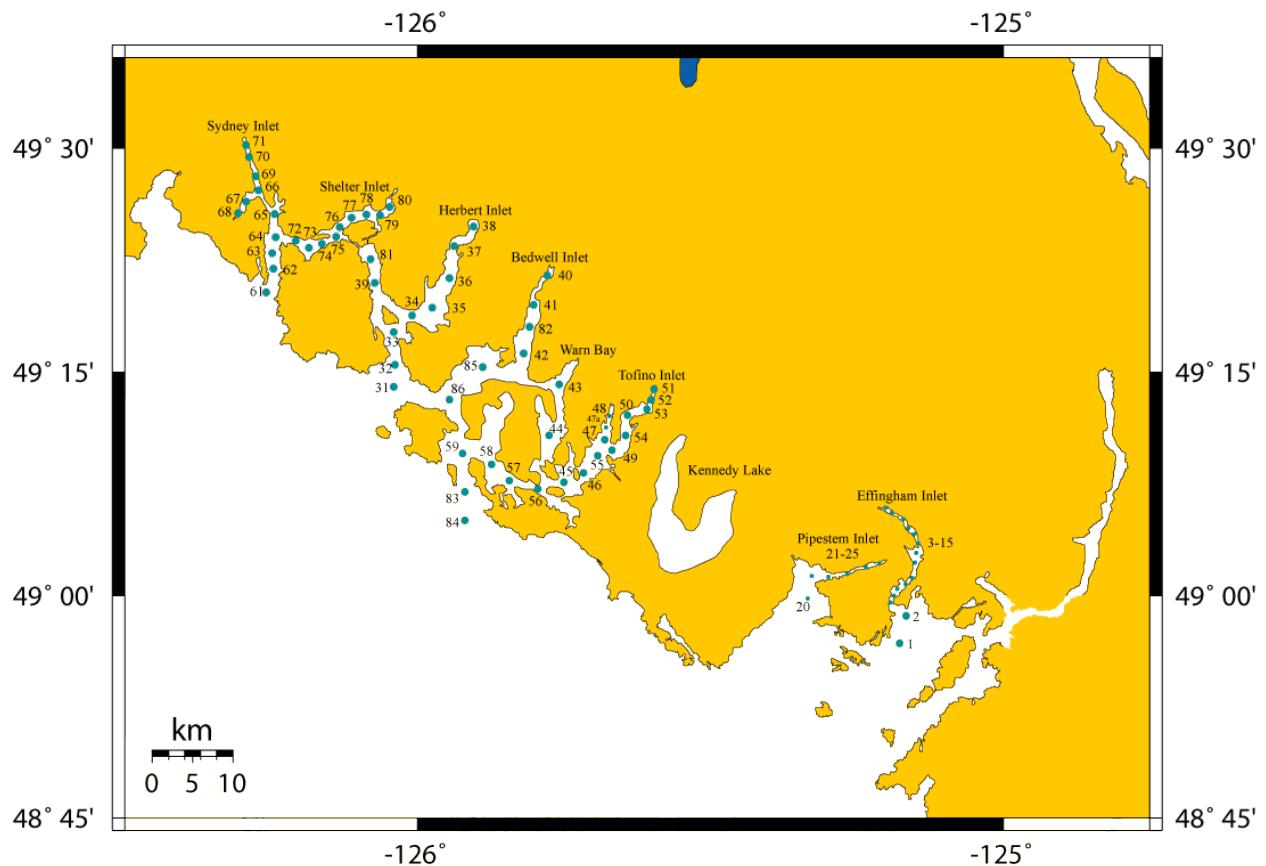


Table 1. Cruise participants and affiliations.

Last Name	First Name	Position	Date Joined	Place Joined	Date Departed	Place Departed
McQuin	Raymond	Captain	6/16/2008	Seattle	7/1/2008	Seattle
Smith	Shayma	First Mate	6/16/2008	Seattle	7/1/2008	Seattle
Keil	Richard	Chief Scientist	6/16/2008	Seattle	7/1/2008	Seattle
Logsdon	Miles	Co-Chief Scientist	6/16/2008	Seattle	7/1/2008	Seattle
Greengrove	Cheryl	Co-Chief Scientist	6/16/2008	Seattle	6/25/2008	Tofino BC
Powers	Kelsey	undergraduate	6/16/2008	Seattle	6/25/2008	Tofino BC
Sislak	Christine	undergraduate	6/16/2008	Seattle	6/25/2008	Tofino BC
Masura	Julie	Scientist	6/16/2008	Seattle	6/22/2008	Tofino BC
Schatz	Mitchell	undergraduate	6/22/2008	Tofino BC	6/25/2008	Tofino BC
Knox	Brandon	undergraduate	6/16/2008	Tofino BC	7/1/2008	Seattle
McDuffee	Kelsey	graduate student	6/25/2008	Tofino BC	7/1/2008	Seattle
Kimball	Brittany	undergraduate	6/25/2008	Tofino BC	7/1/2008	Seattle
Magasis	Esther	High School student	6/25/2008	Tofino BC	7/1/2008	Seattle

Table 2. Generalized cruise event log, chronological order.

Date	Day	Agenda
6/16/2008	Monday	Depart Seattle fuel line rupture, dock in Ballard
6/17/2008	Tuesday	Depart Seattle again test CTD in Piget Sound overnight in Victoria BC
6/18/2008	Wednesday	run to Effingham Inlet arrive 16:00 CTD at station 2 (mouth Effingham) van veen grab at head of Effingham overnight at head of Effingham
6/19/2008	Thursday	CTD survey of Effingham, stations 15-1 (head to mouth) depart for Tofino 15:15, arrive Tofino 20:00
6/20/2008	Friday	Depart Weigh West marina 08:15 CTD Herbert Inlet (stations 31-38) Sediment trap at head of Herbert Multicore at head of Herbert
6/21/2008	Saturday	recover sediment trap CTD stations 86, 85, 42, 82, 41, 40 Bedwell Sediment trap head of Bedwell Multicore at head of Bedwell transit to Tofino
6/22/2008	Sunday	09:00 depart Tofino headed to Browning Passage CTD sta 44,43 pick up sediment trap head to overnight at Hot Springs Cove
6/23/2008	Monday	CTD Sydney Inlet Stations 60-64, 9090-91,65-71 sediment trap in Sydney Inlet near Sta 69 overnight in Young Bay
6/24/2008	Tuesday	recover sediment trap (net did not trip closed) Multicore sample at Sta 69 CTD Shelter Inlet (sta 72-80) Sediment trap in Shelter Inlet (sta 79) overnight anchored at head of Shelter Inlet
6/25/2008	Wednesday	recover trap Multicore sample at Sta 69 CTD 81 and 39, head into Tofino to swap science crew
6/26/2008	Thursday	Sediment traps out at Stations 47, 48 CTD at sta 48 deploy spider, soil sampling expedition
6/27/2008	Friday	CTDs at sta 47 & 48 recover and reset traps

		start incubation in 'Ward bags'
		First turtle deployments
6/28/2008	Saturday	CTDs at Sta 59,89 CTD run through all of Tofino Inlet (sta 58-56,45,46,55,49,54,50,53,52,51) depart Tofino with new crew, deploy sed traps and spider at usual stations drifters, begin bag experiments, reset traps CTD and core work for Tofino Inlet
6/29/2008	Sunday	flight over fjord to deliver Turtle parts and return to ship recover traps, re-deploy turtles, finish scientific work
6/30/2008	Monday	Transit Tofino - Victoria
7/1/2008	Tuesday	Transit Victoria - Seattle

Table 3. CTD data from June 2008.

	Latitude [deg]	Longitude [deg]	Depth [salt water, m]	Temp deg C	Salinity [PSU]	Density [Kg/m^3]	%Trans [%]	Oxygen [mg/l]	Oxygen [% sat]	Oxygen [umol/Kg]	PAR	Fluoresce nce [mg/m^3]
91800101	48.94	-125.18	5	9.46	31.87	1024.62	80.37	10.57	113.06	322.24	54.27	3.98
91800101	48.94	-125.18	6	9.32	31.92	1024.68	86.58	9.43	100.61	287.53	37.82	1.99
91800101	48.94	-125.18	8	9.02	32.00	1024.80	88.56	7.69	81.65	234.58	18.48	1.37
91800101	48.94	-125.18	10	8.87	32.08	1024.89	90.44	7.02	74.42	214.18	11.49	1.04
91800101	48.94	-125.18	12	8.80	32.12	1024.95	93.57	6.78	71.70	206.74	7.45	0.36
91800101	48.94	-125.18	14	8.66	32.18	1025.03	96.42	6.42	67.71	195.68	5.23	-0.13
91800101	48.94	-125.18	16	8.59	32.24	1025.09	96.80	6.19	65.16	188.59	3.88	-0.22
91800101	48.94	-125.18	18	8.48	32.28	1025.15	97.24	5.94	62.43	181.12	2.96	-0.26
91800101	48.94	-125.18	20	8.34	32.31	1025.20	97.60	5.66	59.35	172.61	2.29	-0.30
91800101	48.94	-125.18	22	8.30	32.34	1025.24	97.77	5.52	57.87	168.27	1.83	-0.32
91800101	48.94	-125.18	24	8.32	32.38	1025.28	97.92	5.57	58.48	169.83	1.47	-0.32
91800101	48.94	-125.18	26	8.35	32.42	1025.32	97.68	5.71	59.91	174.02	1.20	-0.31
91800101	48.94	-125.18	28	8.20	32.47	1025.38	97.79	5.44	56.76	165.72	0.99	-0.31
91800101	48.94	-125.18	30	8.05	32.50	1025.44	97.96	4.94	51.50	150.50	0.81	-0.33
91800101	48.94	-125.18	32	8.00	32.53	1025.48	98.02	4.76	49.60	145.14	0.67	-0.33
91800101	48.94	-125.18	34	7.93	32.57	1025.53	98.06	4.49	46.74	136.90	0.56	-0.33
91800101	48.94	-125.18	36	7.93	32.61	1025.57	97.66	4.40	45.86	134.12	0.47	-0.33
91800101	48.94	-125.18	38	7.97	32.65	1025.61	97.55	4.58	47.69	139.44	0.39	-0.32
91800101	48.94	-125.18	40	7.96	32.67	1025.63	97.22	4.58	47.71	139.51	0.33	-0.32
91800101	48.94	-125.18	42	7.91	32.70	1025.67	96.84	4.51	46.87	137.35	0.27	-0.32
91800101	48.94	-125.18	44	7.76	32.73	1025.73	97.14	4.06	42.14	123.85	0.23	-0.33
91800101	48.94	-125.18	46	7.67	32.80	1025.80	97.24	3.75	38.81	114.14	0.19	-0.33
91800101	48.94	-125.18	48	7.65	32.82	1025.83	97.01	3.66	37.89	111.47	0.15	-0.34
91800101	48.94	-125.18	50	7.63	32.84	1025.86	96.88	3.59	37.19	109.42	0.13	-0.35
91800101	48.94	-125.18	52	7.62	32.85	1025.88	96.72	3.54	36.68	107.93	0.11	-0.35
91800101	48.94	-125.18	54	7.62	32.86	1025.90	96.62	3.54	36.67	107.90	0.09	-0.35

91800101	48.94	-125.18	56	7.62	32.88	1025.92	96.46	3.58	37.06	109.05	0.07	-0.35
91800101	48.94	-125.18	57	7.61	32.91	1025.95	95.96	3.58	37.03	108.95	0.06	-0.35
91800101	48.94	-125.18	59	7.62	32.94	1025.98	95.58	3.62	37.55	110.38	0.05	-0.34
91800101	48.94	-125.18	61	7.64	32.95	1026.00	94.77	3.70	38.38	112.82	0.04	-0.34
91800101	48.94	-125.18	63	7.63	32.96	1026.02	94.10	3.73	38.65	113.60	0.04	-0.33
91800101	48.94	-125.18	65	7.63	32.97	1026.03	93.69	3.71	38.39	112.90	0.03	-0.33
91800101	48.94	-125.18	67	7.59	32.97	1026.05	93.93	3.59	37.16	109.34	0.03	-0.34
91800101	48.94	-125.18	69	7.60	32.98	1026.07	94.25	3.60	37.33	109.77	0.02	-0.33
91800101	48.94	-125.18	71	7.61	33.00	1026.09	93.94	3.69	38.24	112.45	0.02	-0.32
91800101	48.94	-125.18	73	7.61	33.01	1026.11	93.33	3.70	38.31	112.59	0.02	-0.32
91800101	48.94	-125.18	75	7.63	33.03	1026.13	92.83	3.81	39.55	116.22	0.01	-0.32
91800101	48.94	-125.18	77	7.63	33.03	1026.14	92.72	3.87	40.14	117.93	0.01	-0.32
91800101	48.94	-125.18	79	7.62	33.04	1026.15	92.67	3.86	40.02	117.66	0.01	-0.32
91800101	48.94	-125.18	81	7.60	33.05	1026.18	91.31	3.75	38.86	114.22	0.01	-0.31
91800101	48.94	-125.18	83	7.60	33.08	1026.21	91.23	3.82	39.59	116.36	0.01	-0.31
91800101	48.94	-125.18	85	7.58	33.11	1026.25	89.12	3.72	38.50	113.20	0.01	-0.31
91800101	48.94	-125.18	87	7.57	33.13	1026.27	83.23	3.63	37.66	110.73	0.01	-0.30
91800101	48.94	-125.18	89	7.58	33.13	1026.28	76.75	3.66	37.95	111.58	0.01	-0.28
91800101	48.94	-125.18	91	7.58	33.13	1026.29	74.24	3.63	37.66	110.72	0.01	-0.27
91800101	48.94	-125.18	93	7.58	33.13	1026.30	70.75	3.62	37.49	110.21	0.01	-0.25
91800101	48.94	-125.18	95	7.58	33.13	1026.31	70.24	3.60	37.35	109.80	0.01	-0.27
91800201	48.979	-125.16	12	8.57	32.07	1024.94	87.41	6.51	68.46	198.59	22.01	1.75
91800201	48.979	-125.16	14	8.41	32.14	1025.04	93.69	5.83	61.16	177.75	13.13	0.34
91800201	48.979	-125.16	16	8.38	32.16	1025.06	94.93	5.63	59.04	171.65	9.20	0.12
91800201	48.979	-125.16	18	8.33	32.18	1025.09	95.09	5.55	58.12	169.19	6.76	0.15
91800201	48.979	-125.16	20	8.26	32.22	1025.14	96.13	5.36	56.08	163.48	5.08	-0.10
91800201	48.979	-125.16	22	8.19	32.27	1025.20	97.11	5.18	54.05	157.77	3.91	-0.25
91800201	48.979	-125.16	24	8.13	32.32	1025.26	97.43	5.00	52.14	152.29	3.09	-0.29
91800201	48.979	-125.16	26	8.11	32.33	1025.28	97.56	4.91	51.22	149.62	2.49	-0.30
91800201	48.979	-125.16	28	8.07	32.38	1025.33	97.64	4.82	50.28	147.00	2.01	-0.32
91800201	48.979	-125.16	30	8.03	32.42	1025.38	97.67	4.67	48.62	142.23	1.63	-0.32

91800201	48.979	-125.16	32	8.01	32.45	1025.42	97.71	4.60	47.97	140.33	1.34	-0.32
91800201	48.979	-125.16	34	8.01	32.50	1025.46	97.85	4.66	48.58	142.03	1.10	-0.34
91800201	48.979	-125.16	36	8.00	32.52	1025.49	97.91	4.70	48.92	143.12	0.91	-0.34
91800201	48.979	-125.16	38	7.95	32.55	1025.53	97.78	4.52	47.10	137.90	0.75	-0.34
91800201	48.979	-125.16	40	7.93	32.58	1025.56	97.67	4.45	46.29	135.54	0.63	-0.34
91800201	48.979	-125.16	42	7.90	32.60	1025.60	97.58	4.37	45.43	133.12	0.52	-0.34
91800201	48.979	-125.16	44	7.86	32.63	1025.64	97.57	4.24	44.12	129.37	0.44	-0.35
91800201	48.979	-125.16	46	7.83	32.65	1025.66	97.51	4.12	42.78	125.54	0.37	-0.35
91800201	48.979	-125.16	48	7.78	32.69	1025.71	97.30	3.95	41.04	120.51	0.31	-0.35
91800201	48.979	-125.16	50	7.75	32.71	1025.74	97.12	3.86	40.07	117.71	0.26	-0.35
91800201	48.979	-125.16	52	7.72	32.74	1025.78	96.89	3.78	39.15	115.07	0.22	-0.35
91800201	48.979	-125.16	54	7.68	32.78	1025.82	96.71	3.70	38.30	112.63	0.18	-0.35
91800201	48.979	-125.16	56	7.64	32.82	1025.87	96.09	3.57	36.93	108.67	0.15	-0.36
91800201	48.979	-125.16	57	7.61	32.86	1025.92	95.59	3.47	35.91	105.70	0.12	-0.36
91800201	48.979	-125.16	59	7.60	32.88	1025.94	95.17	3.39	35.12	103.38	0.10	-0.36
91800201	48.979	-125.16	61	7.59	32.89	1025.96	94.60	3.35	34.69	102.14	0.09	-0.36
91800201	48.979	-125.16	63	7.57	32.92	1025.99	93.67	3.31	34.30	101.00	0.07	-0.36
91800201	48.979	-125.16	65	7.57	32.92	1026.00	93.50	3.31	34.20	100.72	0.06	-0.36
91800201	48.979	-125.16	67	7.57	32.92	1026.01	93.57	3.32	34.33	101.08	0.05	-0.36
91800201	48.979	-125.16	69	7.57	32.93	1026.03	93.54	3.32	34.34	101.14	0.04	-0.36
91800201	48.979	-125.16	71	7.56	32.95	1026.05	92.70	3.31	34.20	100.70	0.03	-0.36
91800201	48.979	-125.16	73	7.56	32.96	1026.07	92.16	3.31	34.21	100.74	0.03	-0.36
91800201	48.979	-125.16	75	7.55	32.97	1026.09	91.45	3.29	34.08	100.36	0.02	-0.35
91800201	48.979	-125.16	77	7.55	32.99	1026.12	90.40	3.31	34.22	100.76	0.02	-0.35
	48.979	-125.16	79	7.54	33.02	1026.15	88.96	3.31	34.19	100.69	0.02	-0.34
91800202	48.978	-125.16	12	8.44	32.14	1025.01	91.18	5.87	61.53	178.84	11.98	0.83
91800202	48.978	-125.16	14	8.33	32.20	1025.09	94.27	5.47	57.26	166.68	8.03	0.19
91800202	48.978	-125.16	16	8.26	32.23	1025.13	95.92	5.26	54.99	160.32	5.89	-0.02
91800202	48.978	-125.16	18	8.21	32.28	1025.19	96.84	5.10	53.36	155.49	4.48	-0.20
91800202	48.978	-125.16	20	8.25	32.32	1025.22	97.40	5.23	54.81	159.50	3.51	-0.26
91800202	48.978	-125.16	22	8.29	32.38	1025.27	97.65	5.40	56.68	164.65	2.79	-0.28

91800202	48.978	-125.16	24	8.32	32.41	1025.30	97.77	5.58	58.46	170.18	2.25	-0.29
91800202	48.978	-125.16	26	8.19	32.42	1025.34	97.82	5.30	55.41	161.55	1.82	-0.31
91800202	48.978	-125.16	28	8.14	32.43	1025.36	97.88	5.09	53.19	155.29	1.48	-0.32
91800202	48.978	-125.16	30	8.05	32.47	1025.41	97.90	4.85	50.58	147.87	1.21	-0.33
91800202	48.978	-125.16	32	8.00	32.52	1025.47	97.88	4.67	48.64	142.29	1.00	-0.33
91800202	48.978	-125.16	34	7.98	32.54	1025.50	97.80	4.59	47.82	139.82	0.83	-0.33
91800202	48.978	-125.16	36	7.97	32.57	1025.53	97.81	4.59	47.79	139.89	0.69	-0.32
91800202	48.978	-125.16	38	7.92	32.61	1025.59	97.80	4.45	46.27	135.47	0.57	-0.34
91800202	48.978	-125.16	40	7.89	32.64	1025.62	97.70	4.39	45.61	133.64	0.48	-0.33
91800202	48.978	-125.16	42	7.85	32.65	1025.64	97.70	4.22	43.86	128.60	0.40	-0.32
91800202	48.978	-125.16	44	7.83	32.68	1025.68	97.49	4.15	43.10	126.41	0.33	-0.34
91800202	48.978	-125.16	46	7.80	32.69	1025.70	97.54	4.04	41.98	123.22	0.28	-0.33
91800202	48.978	-125.16	48	7.74	32.74	1025.75	97.40	3.89	40.30	118.42	0.24	-0.34
91800202	48.978	-125.16	50	7.70	32.77	1025.79	97.05	3.70	38.38	112.81	0.20	-0.34
91800202	48.978	-125.16	52	7.68	32.79	1025.82	96.84	3.64	37.76	111.03	0.17	-0.35
91800202	48.978	-125.16	54	7.65	32.81	1025.85	96.62	3.57	36.94	108.69	0.14	-0.35
91800202	48.978	-125.16	56	7.62	32.85	1025.90	96.20	3.46	35.81	105.40	0.12	-0.36
91800202	48.978	-125.16	58	7.60	32.88	1025.93	95.79	3.40	35.18	103.58	0.10	-0.35
91800202	48.978	-125.16	59	7.58	32.91	1025.97	95.15	3.35	34.69	102.13	0.08	-0.36
91800202	48.978	-125.16	61	7.58	32.92	1025.98	94.81	3.34	34.51	101.62	0.07	-0.35
91800202	48.978	-125.16	63	7.57	32.92	1026.00	94.64	3.33	34.42	101.34	0.06	-0.35
91800202	48.978	-125.16	65	7.57	32.94	1026.02	94.32	3.32	34.32	101.06	0.05	-0.34
91800202	48.978	-125.16	67	7.56	32.97	1026.05	93.58	3.30	34.19	100.68	0.04	-0.34
91800202	48.978	-125.16	69	7.55	33.00	1026.09	92.08	3.32	34.31	101.01	0.03	-0.34
91800202	48.978	-125.16	71	7.55	33.00	1026.10	91.11	3.32	34.37	101.18	0.03	-0.34
91800202	48.978	-125.16	73	7.55	33.00	1026.11	90.90	3.32	34.31	101.02	0.02	-0.34
91800202	48.978	-125.16	75	7.55	33.01	1026.12	90.82	3.30	34.09	100.39	0.02	-0.34
91800202	48.978	-125.16	77	7.53	33.04	1026.16	88.20	3.20	33.06	97.36	0.02	-0.33
91800202	48.978	-125.16	79	7.53	33.05	1026.17	85.78	3.15	32.64	96.11	0.02	-0.33
91800202	48.978	-125.16	81	7.53	33.06	1026.19	84.43	3.12	32.26	94.99	0.01	-0.32
91800202	48.978	-125.16	83	7.51	33.08	1026.22	79.30	2.97	30.76	90.61	0.01	-0.32

91800301	48.99	-125.19	12	8.52	32.12	1024.99	91.63	6.00	63.10	183.06	11.12	0.32
91800301	48.99	-125.19	14	8.43	32.15	1025.03	93.85	5.62	58.97	171.31	7.52	0.23
91800301	48.99	-125.19	16	8.35	32.19	1025.09	94.72	5.42	56.69	165.09	5.60	0.04
91800301	48.99	-125.19	18	8.22	32.26	1025.17	96.33	5.08	53.10	154.87	4.21	-0.18
91800301	48.99	-125.19	20	8.17	32.29	1025.22	96.83	4.88	50.99	148.84	3.26	-0.22
91800301	48.99	-125.19	22	8.12	32.33	1025.26	97.07	4.74	49.50	144.64	2.58	-0.25
91800301	48.99	-125.19	24	8.07	32.38	1025.32	97.32	4.63	48.28	141.16	2.07	-0.30
91800301	48.99	-125.19	26	8.03	32.42	1025.36	97.52	4.56	47.57	139.13	1.68	-0.32
91800301	48.99	-125.19	28	8.02	32.43	1025.38	97.63	4.53	47.19	138.05	1.37	-0.32
91800301	48.99	-125.19	30	8.00	32.46	1025.42	97.55	4.47	46.55	136.26	1.12	-0.32
91800301	48.99	-125.19	32	7.95	32.52	1025.48	97.67	4.41	45.86	134.28	0.92	-0.33
91800301	48.99	-125.19	34	7.92	32.54	1025.51	97.67	4.28	44.48	130.30	0.76	-0.33
91800301	48.99	-125.19	36	7.91	32.57	1025.54	97.58	4.21	43.81	128.34	0.63	-0.33
91800301	48.99	-125.19	38	7.90	32.59	1025.57	97.60	4.24	44.11	129.26	0.52	-0.33
91800301	48.99	-125.19	40	7.86	32.61	1025.60	97.58	4.12	42.76	125.41	0.43	-0.34
91800301	48.99	-125.19	42	7.82	32.64	1025.64	97.39	3.92	40.72	119.47	0.36	-0.34
91800301	48.99	-125.19	44	7.80	32.67	1025.67	97.21	3.74	38.88	114.11	0.30	-0.34
91800301	48.99	-125.19	46	7.79	32.68	1025.69	97.08	3.71	38.56	113.20	0.24	-0.34
91800301	48.99	-125.19	48	7.76	32.70	1025.72	97.01	3.68	38.19	112.17	0.20	-0.35
91800301	48.99	-125.19	50	7.72	32.74	1025.77	96.88	3.64	37.70	110.82	0.17	-0.34
91800301	48.99	-125.19	52	7.67	32.80	1025.83	96.53	3.54	36.72	108.01	0.14	-0.35
91800301	48.99	-125.19	54	7.65	32.82	1025.86	96.15	3.50	36.23	106.58	0.12	-0.35
91800301	48.99	-125.19	56	7.64	32.83	1025.87	96.07	3.48	36.05	106.05	0.10	-0.35
91800301	48.99	-125.19	58	7.63	32.84	1025.89	96.00	3.45	35.70	105.05	0.08	-0.36
91800301	48.99	-125.19	59	7.61	32.86	1025.93	95.69	3.39	35.11	103.35	0.07	-0.35
91800301	48.99	-125.19	61	7.59	32.89	1025.96	94.91	3.34	34.53	101.67	0.06	-0.37
91800301	48.99	-125.19	63	7.58	32.91	1025.99	94.36	3.28	33.93	99.90	0.05	-0.36
91800301	48.99	-125.19	65	7.57	32.93	1026.01	93.12	3.23	33.45	98.52	0.04	-0.35
91800301	48.99	-125.19	67	7.56	32.93	1026.03	92.21	3.21	33.16	97.67	0.03	-0.35
91800301	48.99	-125.19	69	7.56	32.94	1026.04	91.52	3.18	32.91	96.93	0.03	-0.35
91800301	48.99	-125.19	71	7.55	32.95	1026.06	90.78	3.15	32.57	95.94	0.02	-0.34
91800301	48.99	-125.19	73	7.55	32.96	1026.08	89.28	3.10	32.08	94.49	0.02	-0.34

91800301	48.99	-125.19	75	7.55	32.97	1026.09	87.26	3.06	31.68	93.31	0.02	-0.34
91800401	48.999	-125.18	12	8.42	32.14	1025.02	87.35	5.65	59.25	172.19	7.01	0.68
91800401	48.999	-125.18	14	8.34	32.17	1025.07	90.49	5.23	54.78	159.52	4.48	0.35
91800401	48.999	-125.18	16	8.26	32.22	1025.13	94.12	4.89	51.12	148.96	3.12	0.01
91800401	48.999	-125.18	18	8.23	32.25	1025.16	95.94	4.82	50.39	146.91	2.27	-0.08
91800401	48.999	-125.18	20	8.21	32.26	1025.19	96.44	4.83	50.51	147.33	1.72	-0.13
91800401	48.999	-125.18	22	8.17	32.29	1025.22	96.77	4.72	49.32	143.94	1.33	-0.19
91800401	48.999	-125.18	24	8.12	32.33	1025.27	96.89	4.69	48.94	142.97	1.05	-0.23
91800401	48.999	-125.18	26	8.07	32.38	1025.33	97.26	4.63	48.23	141.02	0.84	-0.30
91800401	48.999	-125.18	28	8.04	32.42	1025.37	97.50	4.54	47.35	138.47	0.68	-0.31
91800401	48.999	-125.18	30	8.03	32.43	1025.39	97.60	4.52	47.08	137.71	0.56	-0.31
91800401	48.999	-125.18	32	7.99	32.48	1025.44	97.69	4.47	46.56	136.28	0.46	-0.32
91800401	48.999	-125.18	34	7.96	32.51	1025.48	97.72	4.40	45.78	134.06	0.38	-0.32
91800401	48.999	-125.18	36	7.92	32.55	1025.53	97.62	4.25	44.17	129.41	0.31	-0.33
91800401	48.999	-125.18	38	7.90	32.57	1025.55	97.52	4.18	43.46	127.33	0.26	-0.34
91800401	48.999	-125.18	40	7.89	32.58	1025.57	97.48	4.07	42.38	124.19	0.22	-0.33
91800401	48.999	-125.18	42	7.87	32.59	1025.60	97.26	3.91	40.67	119.23	0.18	-0.34
91800401	48.999	-125.18	44	7.83	32.64	1025.65	96.95	3.76	39.02	114.48	0.15	-0.34
91800401	48.999	-125.18	46	7.80	32.67	1025.68	96.74	3.61	37.46	109.92	0.13	-0.34
91800401	48.999	-125.18	48	7.80	32.68	1025.70	96.53	3.58	37.16	109.08	0.11	-0.34
91800401	48.999	-125.18	50	7.76	32.70	1025.73	96.59	3.54	36.68	107.73	0.09	-0.34
91800401	48.999	-125.18	52	7.72	32.74	1025.78	96.37	3.56	36.92	108.51	0.08	-0.35
91800401	48.999	-125.18	54	7.69	32.77	1025.81	96.53	3.58	37.09	109.07	0.06	-0.35
91800401	48.999	-125.18	56	7.63	32.84	1025.88	96.35	3.47	35.93	105.74	0.05	-0.36
91800401	48.999	-125.18	58	7.60	32.87	1025.93	95.63	3.37	34.90	102.75	0.05	-0.36
91800401	48.999	-125.18	59	7.58	32.90	1025.96	94.86	3.31	34.22	100.75	0.04	-0.36
91800401	48.999	-125.18	61	7.58	32.91	1025.98	94.07	3.27	33.86	99.71	0.03	-0.36
91800401	48.999	-125.18	63	7.57	32.91	1025.99	93.66	3.24	33.57	98.86	0.03	-0.35
91800501	49.006	-125.18	12	8.48	32.07	1024.96	84.75	5.46	57.33	166.53	14.29	1.15
91800501	49.006	-125.18	14	8.34	32.15	1025.05	89.85	4.85	50.74	147.76	8.99	0.40

91800501	49.006	-125.18	16	8.23	32.23	1025.14	93.93	4.51	47.18	137.56	6.22	-0.08
91800501	49.006	-125.18	18	8.21	32.25	1025.16	95.99	4.43	46.34	135.12	4.62	-0.18
91800501	49.006	-125.18	20	8.20	32.25	1025.18	96.39	4.42	46.15	134.62	3.57	-0.18
91800501	49.006	-125.18	22	8.18	32.28	1025.21	96.43	4.52	47.17	137.65	2.79	-0.18
91800501	49.006	-125.18	24	8.15	32.31	1025.25	96.47	4.55	47.52	138.74	2.19	-0.18
91800501	49.006	-125.18	26	8.12	32.34	1025.29	96.51	4.51	47.05	137.45	1.74	-0.21
91800501	49.006	-125.18	28	8.09	32.36	1025.32	96.74	4.46	46.57	136.09	1.39	-0.24
91800501	49.006	-125.18	30	8.06	32.39	1025.35	96.93	4.41	45.93	134.30	1.12	-0.27
91800501	49.006	-125.18	32	8.02	32.43	1025.40	97.05	4.29	44.71	130.84	0.90	-0.30
91800501	49.006	-125.18	34	7.96	32.50	1025.47	97.10	4.05	42.21	123.58	0.73	-0.31
91800501	49.006	-125.18	36	7.94	32.52	1025.50	97.03	3.92	40.81	119.50	0.60	-0.32
91800501	49.006	-125.18	38	7.94	32.53	1025.51	96.93	3.87	40.30	118.01	0.49	-0.31
91800501	49.006	-125.18	40	7.92	32.54	1025.54	96.85	3.82	39.70	116.30	0.40	-0.31
91800501	49.006	-125.18	42	7.90	32.57	1025.57	96.72	3.73	38.77	113.62	0.32	-0.32
91800501	49.006	-125.18	44	7.87	32.60	1025.61	96.47	3.59	37.27	109.26	0.26	-0.32
91800501	49.006	-125.18	46	7.86	32.62	1025.64	96.13	3.48	36.22	106.20	0.21	-0.33
91800501	49.006	-125.18	48	7.85	32.63	1025.66	95.83	3.44	35.76	104.87	0.17	-0.32
91800501	49.006	-125.18	50	7.83	32.65	1025.68	95.78	3.38	35.11	102.97	0.14	-0.34
91800501	49.006	-125.18	52	7.82	32.68	1025.72	95.53	3.27	34.01	99.75	0.11	-0.33
91800501	49.006	-125.18	54	7.81	32.69	1025.74	95.20	3.18	33.04	96.93	0.09	-0.34
91800501	49.006	-125.18	56	7.81	32.70	1025.75	94.92	3.11	32.30	94.74	0.07	-0.34
91800501	49.006	-125.18	58	7.80	32.71	1025.77	94.78	3.00	31.19	91.52	0.06	-0.35
91800501	49.006	-125.18	59	7.80	32.72	1025.79	94.24	2.97	30.89	90.61	0.05	-0.34
91800501	49.006	-125.18	61	7.80	32.73	1025.80	93.51	2.94	30.53	89.57	0.04	-0.35
91800501	49.006	-125.18	63	7.80	32.73	1025.81	93.43	2.92	30.32	88.93	0.03	-0.35
91800501	49.006	-125.18	65	7.80	32.74	1025.83	93.57	2.88	29.87	87.62	0.02	-0.35
91800501	49.006	-125.18	67	7.79	32.74	1025.84	93.52	2.89	30.03	88.10	0.02	-0.35
91800501	49.006	-125.18	69	7.78	32.74	1025.85	93.29	2.90	30.14	88.46	0.02	-0.35
91800501	49.006	-125.18	71	7.76	32.75	1025.87	93.37	2.99	31.01	91.07	0.01	-0.34
91800501	49.006	-125.18	73	7.72	32.78	1025.91	93.26	3.07	31.82	93.52	0.01	-0.34
91800501	49.006	-125.18	75	7.67	32.82	1025.96	92.75	3.10	32.16	94.58	0.01	-0.34
91800501	49.006	-125.18	77	7.64	32.86	1026.00	91.40	3.08	31.86	93.74	0.01	-0.34

91800501	49.006	-125.18	79	7.61	32.88	1026.04	87.93	3.05	31.61	93.02	0.01	-0.33
91800501	49.006	-125.18	81	7.61	32.89	1026.05	85.86	3.06	31.71	93.32	0.01	-0.34
91800501	49.006	-125.18	83	7.61	32.89	1026.06	84.28	3.06	31.72	93.35	0.01	-0.34
91800601	49.016	-125.16	12	8.40	32.11	1025.00	82.60	4.83	50.66	147.35	9.32	0.80
91800601	49.016	-125.16	14	8.35	32.14	1025.04	84.36	4.48	46.97	136.69	6.12	0.37
91800601	49.016	-125.16	16	8.30	32.17	1025.08	87.93	4.19	43.86	127.78	4.38	0.14
91800601	49.016	-125.16	18	8.22	32.24	1025.15	90.32	3.90	40.77	118.91	3.21	-0.11
91800601	49.016	-125.16	20	8.16	32.29	1025.22	93.10	3.89	40.60	118.55	2.41	-0.25
91800601	49.016	-125.16	22	8.12	32.33	1025.26	94.19	4.07	42.44	123.99	1.85	-0.31
91800601	49.016	-125.16	24	8.09	32.35	1025.29	95.38	4.14	43.20	126.23	1.45	-0.32
91800601	49.016	-125.16	26	8.07	32.38	1025.32	96.25	4.02	41.95	122.66	1.15	-0.32
91800601	49.016	-125.16	28	8.03	32.41	1025.36	96.74	3.98	41.53	121.45	0.93	-0.32
91800601	49.016	-125.16	30	8.01	32.43	1025.39	96.82	3.94	41.00	119.98	0.75	-0.33
91800601	49.016	-125.16	32	7.97	32.48	1025.45	96.97	3.86	40.16	117.58	0.60	-0.33
91800601	49.016	-125.16	34	7.93	32.53	1025.50	96.97	3.77	39.26	114.99	0.49	-0.33
91800601	49.016	-125.16	36	7.91	32.55	1025.53	96.97	3.69	38.41	112.53	0.40	-0.32
91800601	49.016	-125.16	38	7.90	32.57	1025.56	96.84	3.61	37.58	110.12	0.33	-0.32
91800601	49.016	-125.16	40	7.87	32.62	1025.61	96.58	3.39	35.27	103.40	0.27	-0.34
91800601	49.016	-125.16	42	7.85	32.66	1025.65	96.38	3.17	33.00	96.73	0.22	-0.34
91800601	49.016	-125.16	44	7.84	32.68	1025.68	96.01	3.01	31.34	91.87	0.17	-0.34
91800601	49.016	-125.16	46	7.84	32.69	1025.69	95.45	2.96	30.79	90.27	0.14	-0.34
91800601	49.016	-125.16	48	7.84	32.69	1025.70	95.16	2.97	30.88	90.54	0.11	-0.34
91800601	49.016	-125.16	50	7.84	32.69	1025.71	94.94	2.95	30.66	89.89	0.08	-0.34
91800601	49.016	-125.16	52	7.84	32.70	1025.73	94.75	2.92	30.31	88.86	0.07	-0.35
91800601	49.016	-125.16	54	7.84	32.70	1025.74	94.68	2.86	29.70	87.04	0.05	-0.35
91800601	49.016	-125.16	56	7.84	32.70	1025.75	94.57	2.83	29.39	86.15	0.04	-0.34
91800601	49.016	-125.16	57	7.84	32.70	1025.76	94.48	2.84	29.50	86.47	0.03	-0.35
91800601	49.016	-125.16	59	7.84	32.71	1025.77	94.38	2.81	29.25	85.74	0.03	-0.34
91800601	49.016	-125.16	61	7.84	32.71	1025.78	94.38	2.78	28.91	84.72	0.02	-0.35
91800601	49.016	-125.16	63	7.84	32.72	1025.80	94.30	2.75	28.62	83.88	0.02	-0.35
91800601	49.016	-125.16	65	7.83	32.72	1025.81	94.18	2.74	28.52	83.62	0.02	-0.34

91800601	49.016	-125.16	67	7.83	32.73	1025.83	94.06	2.74	28.52	83.59	0.01	-0.35
91800601	49.016	-125.16	69	7.83	32.73	1025.84	93.93	2.74	28.46	83.44	0.01	-0.35
91800601	49.016	-125.16	71	7.82	32.73	1025.85	93.79	2.73	28.38	83.21	0.01	-0.35
91800601	49.016	-125.16	73	7.82	32.74	1025.86	93.70	2.73	28.38	83.21	0.01	-0.36
91800601	49.016	-125.16	75	7.81	32.74	1025.87	93.61	2.73	28.36	83.15	0.01	-0.36
91800601	49.016	-125.16	77	7.81	32.74	1025.89	93.43	2.73	28.35	83.15	0.01	-0.35
91800601	49.016	-125.16	79	7.80	32.75	1025.90	93.31	2.74	28.42	83.35	0.01	-0.34
91800601	49.016	-125.16	81	7.81	32.74	1025.91	93.14	2.73	28.37	83.20	0.01	-0.35
91800601	49.016	-125.16	83	7.81	32.74	1025.92	92.93	2.73	28.32	83.05	0.01	-0.36
91800601	49.016	-125.16	85	7.81	32.75	1025.93	92.97	2.73	28.33	83.07	0.01	-0.36
91800601	49.016	-125.16	87	7.81	32.75	1025.93	92.97	2.72	28.30	82.99	0.01	-0.36
91800601	49.016	-125.16	89	7.81	32.74	1025.94	92.95	2.72	28.27	82.91	0.01	-0.36
91800601	49.016	-125.16	91	7.80	32.75	1025.95	92.89	2.73	28.38	83.24	0.01	-0.35
91800601	49.016	-125.16	93	7.80	32.75	1025.97	92.97	2.74	28.50	83.60	0.01	-0.35
91800601	49.016	-125.16	95	7.80	32.75	1025.97	92.89	2.74	28.49	83.55	0.01	-0.35
91800601	49.016	-125.16	97	7.80	32.75	1025.98	92.85	2.74	28.52	83.64	0.01	-0.36
91800601	49.016	-125.16	99	7.80	32.75	1025.99	92.63	2.76	28.66	84.07	0.01	-0.36
91800601	49.016	-125.16	101	7.78	32.76	1026.01	92.69	2.79	28.95	84.93	0.01	-0.36
91800601	49.016	-125.16	103	7.79	32.76	1026.02	92.65	2.79	29.01	85.11	0.01	-0.35
91800601	49.016	-125.16	105	7.78	32.76	1026.03	92.67	2.80	29.03	85.18	0.01	-0.35
91800601	49.016	-125.16	107	7.76	32.77	1026.05	92.54	2.86	29.70	87.19	0.01	-0.35
91800601	49.016	-125.16	109	7.75	32.78	1026.07	92.52	2.91	30.17	88.58	0.01	-0.35
91800601	49.016	-125.16	111	7.74	32.78	1026.08	92.50	2.93	30.37	89.17	0.01	-0.35
91800601	49.016	-125.16	113	7.73	32.79	1026.10	92.36	2.95	30.62	89.91	0.01	-0.34
91800601	49.016	-125.16	115	7.73	32.79	1026.11	92.07	2.97	30.84	90.58	0.01	-0.34
91800601	49.016	-125.16	117	7.73	32.79	1026.12	91.69	2.98	30.90	90.76	0.01	-0.34
91800601	49.016	-125.16	119	7.73	32.79	1026.13	91.45	2.98	30.87	90.67	0.01	-0.34
91800601	49.016	-125.16	121	7.73	32.79	1026.14	91.23	2.98	30.92	90.81	0.01	-0.34
91800601	49.016	-125.16	123	7.72	32.80	1026.15	91.21	2.99	31.04	91.17	0.01	-0.34
91800601	49.016	-125.16	125	7.70	32.80	1026.17	91.18	3.04	31.54	92.67	0.01	-0.35
91800601	49.016	-125.16	127	7.70	32.81	1026.18	91.68	3.06	31.72	93.22	0.01	-0.34
91800601	49.016	-125.16	129	7.70	32.81	1026.19	91.58	3.06	31.74	93.25	0.01	-0.34

91800601	49.016	-125.16	131	7.71	32.80	1026.20	91.73	3.06	31.70	93.17	0.01	-0.34
91800701	49.023	-125.15	12	8.47	32.08	1024.97	77.85	5.34	56.02	162.76	12.87	1.29
91800701	49.023	-125.15	14	8.36	32.14	1025.04	83.08	4.56	47.84	139.18	7.28	0.53
91800701	49.023	-125.15	16	8.31	32.16	1025.07	87.74	4.29	44.89	130.78	4.83	0.24
91800701	49.023	-125.15	18	8.19	32.26	1025.18	91.47	3.96	41.35	120.69	3.49	-0.11
91800701	49.023	-125.15	20	8.11	32.34	1025.26	93.92	3.79	39.54	115.52	2.59	-0.29
91800701	49.023	-125.15	22	8.07	32.39	1025.31	95.38	3.67	38.26	111.84	1.97	-0.32
91800701	49.023	-125.15	24	8.04	32.42	1025.35	96.08	3.63	37.80	110.54	1.53	-0.33
91800701	49.023	-125.15	26	8.03	32.43	1025.37	96.48	3.65	38.06	111.33	1.18	-0.33
91800701	49.023	-125.15	28	8.00	32.45	1025.40	96.55	3.65	37.99	111.17	0.92	-0.34
91800701	49.023	-125.15	30	7.97	32.49	1025.45	96.65	3.62	37.69	110.34	0.72	-0.34
91800701	49.023	-125.15	32	7.95	32.51	1025.47	96.64	3.63	37.83	110.78	0.57	-0.34
91800701	49.023	-125.15	34	7.92	32.54	1025.51	96.65	3.61	37.55	110.00	0.45	-0.33
91800701	49.023	-125.15	36	7.90	32.58	1025.55	96.64	3.47	36.08	105.70	0.36	-0.33
91800701	49.023	-125.15	38	7.89	32.59	1025.57	96.49	3.37	35.06	102.74	0.29	-0.34
91800701	49.023	-125.15	40	7.87	32.62	1025.61	96.30	3.26	33.92	99.43	0.23	-0.34
91800701	49.023	-125.15	42	7.86	32.64	1025.64	96.06	3.11	32.34	94.77	0.18	-0.35
91800701	49.023	-125.15	44	7.86	32.67	1025.66	95.73	2.99	31.12	91.19	0.14	-0.34
91800701	49.023	-125.15	46	7.86	32.68	1025.68	95.37	2.93	30.50	89.37	0.11	-0.34
91800701	49.023	-125.15	48	7.86	32.68	1025.69	95.04	2.90	30.13	88.27	0.09	-0.34
91800701	49.023	-125.15	50	7.86	32.70	1025.71	94.79	2.80	29.15	85.39	0.07	-0.34
91800701	49.023	-125.15	52	7.87	32.71	1025.73	94.65	2.73	28.36	83.08	0.05	-0.34
91800701	49.023	-125.15	54	7.87	32.71	1025.74	94.39	2.70	28.05	82.17	0.04	-0.34
91800701	49.023	-125.15	56	7.87	32.71	1025.75	94.45	2.65	27.61	80.86	0.03	-0.35
91800701	49.023	-125.15	57	7.87	32.73	1025.77	94.42	2.59	26.95	78.91	0.03	-0.35
91800701	49.023	-125.15	59	7.87	32.73	1025.79	94.36	2.55	26.53	77.70	0.02	-0.35
91800701	49.023	-125.15	61	7.87	32.73	1025.80	94.22	2.54	26.43	77.41	0.02	-0.35
91800701	49.023	-125.15	63	7.87	32.73	1025.81	94.17	2.54	26.39	77.28	0.02	-0.35
91800701	49.023	-125.15	65	7.87	32.74	1025.82	94.05	2.53	26.36	77.23	0.01	-0.36
91800701	49.023	-125.15	67	7.85	32.74	1025.83	94.04	2.57	26.68	78.17	0.01	-0.36
91800701	49.023	-125.15	69	7.84	32.75	1025.85	93.85	2.59	26.97	79.02	0.01	-0.36

91800701	49.023	-125.15	71	7.84	32.75	1025.86	93.64	2.60	27.04	79.24	0.01	-0.35
91800701	49.023	-125.15	73	7.84	32.75	1025.87	93.41	2.60	27.05	79.27	0.01	-0.36
91800701	49.023	-125.15	75	7.83	32.75	1025.88	93.32	2.61	27.15	79.58	0.01	-0.36
91800701	49.023	-125.15	77	7.83	32.75	1025.89	93.22	2.61	27.19	79.67	0.01	-0.36
91800701	49.023	-125.15	79	7.83	32.76	1025.90	93.11	2.62	27.19	79.69	0.01	-0.36
91800701	49.023	-125.15	81	7.83	32.76	1025.91	93.05	2.63	27.32	80.07	0.01	-0.36
91800701	49.023	-125.15	83	7.82	32.76	1025.92	92.92	2.64	27.44	80.45	0.01	-0.36
91800701	49.023	-125.15	85	7.81	32.76	1025.94	92.83	2.67	27.72	81.30	0.01	-0.36
91800701	49.023	-125.15	87	7.80	32.76	1025.95	92.69	2.68	27.88	81.77	0.01	-0.36
91800701	49.023	-125.15	89	7.79	32.76	1025.96	92.56	2.73	28.30	83.04	0.01	-0.36
91800701	49.023	-125.15	91	7.77	32.76	1025.97	92.36	2.79	28.97	85.01	0.01	-0.35
91800701	49.023	-125.15	93	7.77	32.77	1025.98	92.14	2.83	29.33	86.09	0.01	-0.35
91800701	49.023	-125.15	95	7.76	32.77	1026.00	91.93	2.84	29.51	86.60	0.01	-0.36
91800701	49.023	-125.15	97	7.76	32.77	1026.00	91.79	2.85	29.60	86.89	0.01	-0.35
91800701	49.023	-125.15	99	7.76	32.77	1026.01	91.77	2.86	29.69	87.16	0.01	-0.35
91800701	49.023	-125.15	101	7.76	32.77	1026.02	91.73	2.85	29.58	86.83	0.01	-0.35
91800701	49.023	-125.15	103	7.76	32.77	1026.03	91.69	2.84	29.50	86.58	0.01	-0.35
91800701	49.023	-125.15	105	7.76	32.77	1026.04	91.73	2.85	29.54	86.71	0.01	-0.35
91800701	49.023	-125.15	107	7.75	32.77	1026.06	91.69	2.87	29.81	87.52	0.01	-0.35
91800701	49.023	-125.15	109	7.75	32.77	1026.07	91.69	2.89	30.04	88.21	0.01	-0.36
91800701	49.023	-125.15	111	7.75	32.78	1026.08	91.76	2.92	30.29	88.93	0.01	-0.35
91800701	49.023	-125.15	113	7.73	32.78	1026.09	91.66	2.94	30.49	89.57	0.01	-0.35
91800701	49.023	-125.15	115	7.70	32.81	1026.13	91.66	3.00	31.12	91.41	0.01	-0.34
91800801	49.033	-125.15	12	8.51	32.07	1024.95	74.92	5.42	56.96	165.39	13.77	2.07
91800801	49.033	-125.15	14	8.37	32.15	1025.04	74.25	4.27	44.78	130.31	6.65	0.64
91800801	49.033	-125.15	16	8.27	32.21	1025.12	80.45	3.85	40.24	117.26	4.22	0.10
91800801	49.033	-125.15	18	8.22	32.24	1025.16	86.37	3.62	37.83	110.32	2.99	-0.11
91800801	49.033	-125.15	20	8.20	32.27	1025.19	90.28	3.50	36.56	106.62	2.23	-0.20
91800801	49.033	-125.15	22	8.17	32.30	1025.23	92.61	3.39	35.42	103.38	1.67	-0.22
91800801	49.033	-125.15	24	8.12	32.34	1025.28	93.87	3.56	37.10	108.40	1.26	-0.29
91800801	49.033	-125.15	26	8.06	32.39	1025.34	94.81	3.62	37.75	110.40	0.95	-0.33

91800801	49.033	-125.15	28	8.00	32.45	1025.40	95.50	3.71	38.64	113.08	0.74	-0.33
91800801	49.033	-125.15	30	7.96	32.49	1025.45	95.88	3.64	37.91	110.99	0.58	-0.34
91800801	49.033	-125.15	32	7.94	32.52	1025.48	96.26	3.50	36.43	106.66	0.46	-0.34
91800801	49.033	-125.15	34	7.93	32.54	1025.50	96.39	3.40	35.42	103.74	0.36	-0.34
91800801	49.033	-125.15	36	7.88	32.61	1025.58	96.34	3.22	33.44	98.01	0.29	-0.35
91800801	49.033	-125.15	38	7.87	32.64	1025.62	96.10	3.08	32.04	93.90	0.23	-0.34
91800801	49.033	-125.15	40	7.86	32.66	1025.64	95.81	3.03	31.52	92.38	0.17	-0.34
91800801	49.033	-125.15	42	7.86	32.67	1025.66	95.39	2.99	31.05	90.99	0.13	-0.34
91800801	49.033	-125.15	44	7.86	32.69	1025.68	95.09	2.88	29.98	87.82	0.10	-0.34
91800801	49.033	-125.15	46	7.87	32.71	1025.70	94.96	2.74	28.46	83.37	0.08	-0.34
91800801	49.033	-125.15	48	7.87	32.71	1025.71	94.77	2.69	27.99	81.98	0.06	-0.34
91800801	49.033	-125.15	50	7.88	32.72	1025.73	94.69	2.62	27.23	79.71	0.05	-0.34
91800801	49.033	-125.15	52	7.89	32.72	1025.74	94.53	2.53	26.33	77.08	0.04	-0.34
91800801	49.033	-125.15	54	7.89	32.73	1025.75	94.44	2.50	26.04	76.24	0.03	-0.34
91800801	49.033	-125.15	56	7.89	32.73	1025.76	94.43	2.47	25.76	75.41	0.02	-0.34
91800801	49.033	-125.15	57	7.89	32.74	1025.78	94.28	2.45	25.48	74.58	0.02	-0.34
91800801	49.033	-125.15	59	7.89	32.74	1025.79	94.25	2.45	25.46	74.54	0.02	-0.34
91800801	49.033	-125.15	61	7.87	32.75	1025.81	94.10	2.50	26.02	76.21	0.01	-0.34
91800801	49.033	-125.15	63	7.86	32.75	1025.82	94.01	2.56	26.66	78.08	0.01	-0.37
91800801	49.033	-125.15	65	7.86	32.75	1025.83	93.97	2.57	26.77	78.39	0.01	-0.37
91800801	49.033	-125.15	67	7.86	32.75	1025.84	94.00	2.57	26.78	78.44	0.01	-0.36
91800801	49.033	-125.15	69	7.86	32.75	1025.85	93.98	2.57	26.77	78.39	0.01	-0.36
91800801	49.033	-125.15	71	7.86	32.76	1025.86	93.84	2.57	26.75	78.34	0.01	-0.36
91800801	49.033	-125.15	73	7.87	32.76	1025.87	93.79	2.56	26.69	78.14	0.01	-0.37
91800801	49.033	-125.15	75	7.87	32.76	1025.88	93.72	2.56	26.61	77.91	0.01	-0.37
91800801	49.033	-125.15	77	7.86	32.76	1025.89	93.63	2.56	26.58	77.86	0.01	-0.36
91800801	49.033	-125.15	79	7.86	32.76	1025.90	93.63	2.57	26.74	78.30	0.01	-0.36
91800801	49.033	-125.15	81	7.85	32.76	1025.91	93.53	2.58	26.84	78.62	0.01	-0.37
91800801	49.033	-125.15	83	7.85	32.76	1025.92	93.35	2.60	27.00	79.09	0.01	-0.36
91800801	49.033	-125.15	85	7.85	32.76	1025.93	93.23	2.60	27.08	79.33	0.01	-0.36
91800801	49.033	-125.15	87	7.83	32.76	1025.94	93.19	2.62	27.28	79.97	0.01	-0.36
91800801	49.033	-125.15	89	7.82	32.76	1025.95	93.13	2.66	27.61	80.95	0.01	-0.36

91800801	49.033	-125.15	91	7.82	32.76	1025.96	92.83	2.67	27.72	81.27	0.01	-0.36
91800801	49.033	-125.15	93	7.81	32.76	1025.97	92.67	2.67	27.80	81.51	0.01	-0.36
91800801	49.033	-125.15	95	7.81	32.76	1025.98	92.62	2.68	27.87	81.71	0.01	-0.36
91800801	49.033	-125.15	97	7.81	32.76	1025.99	92.36	2.67	27.81	81.50	0.01	-0.36
91800801	49.033	-125.15	99	7.83	32.77	1026.00	92.13	2.60	27.06	79.31	0.01	-0.36
91800801	49.033	-125.15	101	7.81	32.76	1026.01	92.25	2.65	27.54	80.75	0.01	-0.37
91800801	49.033	-125.15	103	7.82	32.76	1026.02	92.19	2.66	27.63	80.98	0.01	-0.36
91800801	49.033	-125.15	105	7.81	32.77	1026.03	92.08	2.64	27.45	80.49	0.01	-0.36
91800801	49.033	-125.15	107	7.80	32.76	1026.04	92.03	2.67	27.70	81.23	0.01	-0.35
91800801	49.033	-125.15	109	7.80	32.77	1026.05	91.99	2.68	27.83	81.65	0.01	-0.36
91800801	49.033	-125.15	111	7.76	32.77	1026.07	91.70	2.78	28.88	84.76	0.01	-0.35
91800801	49.033	-125.15	113	7.76	32.77	1026.08	91.68	2.85	29.58	86.82	0.01	-0.35
91800801	49.033	-125.15	115	7.75	32.77	1026.09	91.31	2.86	29.73	87.28	0.01	-0.35
91800801	49.033	-125.15	117	7.75	32.77	1026.10	91.02	2.88	29.89	87.73	0.01	-0.35
91800801	49.033	-125.15	119	7.75	32.77	1026.11	90.80	2.88	29.94	87.89	0.01	-0.35
91800801	49.033	-125.15	121	7.74	32.78	1026.13	90.62	2.90	30.11	88.40	0.01	-0.34
91800801	49.033	-125.15	123	7.74	32.78	1026.14	90.42	2.92	30.34	89.08	0.01	-0.34
91800801	49.033	-125.15	125	7.74	32.78	1026.15	90.01	2.94	30.47	89.47	0.01	-0.34
91800801	49.033	-125.15	127	7.74	32.78	1026.16	89.51	2.94	30.47	89.48	0.01	-0.34
91800801	49.033	-125.15	129	7.74	32.78	1026.17	89.57	2.94	30.47	89.46	0.01	-0.35
91800801	49.033	-125.15	131	7.74	32.78	1026.17	89.41	2.94	30.49	89.52	0.01	-0.34
91800801	49.033	-125.15	133	7.74	32.78	1026.18	89.56	2.94	30.49	89.52	0.01	-0.34
91800801	49.033	-125.15	135	7.74	32.78	1026.19	89.52	2.94	30.52	89.61	0.01	-0.34
91800801	49.033	-125.15	137	7.74	32.78	1026.20	89.44	2.94	30.54	89.69	0.01	-0.34
91800801	49.033	-125.15	139	7.74	32.78	1026.21	89.37	2.94	30.52	89.63	0.01	-0.34
91800801	49.033	-125.15	141	7.74	32.78	1026.22	89.38	2.94	30.54	89.67	0.01	-0.34
91800801	49.033	-125.15	143	7.74	32.78	1026.23	89.28	2.94	30.56	89.72	0.01	-0.34
91800801	49.033	-125.15	145	7.74	32.78	1026.24	89.09	2.95	30.57	89.76	0.01	-0.34
91800901	49.043	-125.15	12	8.55	32.06	1024.94	69.80	5.50	57.83	167.78	17.27	2.01
91800901	49.043	-125.15	14	8.40	32.12	1025.02	77.39	4.51	47.22	137.39	9.39	0.88
91800901	49.043	-125.15	16	8.31	32.19	1025.09	84.52	3.98	41.65	121.27	6.01	0.17

91800901	49.043	-125.15	18	8.28	32.20	1025.11	90.09	3.80	39.78	115.90	4.26	0.05
91800901	49.043	-125.15	20	8.21	32.26	1025.18	92.86	3.54	37.04	108.04	3.12	-0.11
91800901	49.043	-125.15	22	8.14	32.35	1025.27	94.49	3.10	32.40	94.58	2.34	-0.27
91800901	49.043	-125.15	24	8.12	32.39	1025.32	95.05	2.85	29.75	86.86	1.77	-0.31
91800901	49.043	-125.15	26	8.07	32.43	1025.36	95.21	2.85	29.76	86.98	1.32	-0.32
91800901	49.043	-125.15	28	8.02	32.46	1025.40	95.30	3.02	31.43	91.92	0.97	-0.34
91800901	49.043	-125.15	30	8.00	32.49	1025.44	95.45	3.02	31.42	91.96	0.73	-0.34
91800901	49.043	-125.15	32	7.96	32.51	1025.47	95.60	3.25	33.84	99.08	0.55	-0.34
91800901	49.043	-125.15	34	7.93	32.54	1025.51	95.69	3.25	33.83	99.08	0.42	-0.34
91800901	49.043	-125.15	36	7.90	32.58	1025.56	95.76	3.16	32.87	96.31	0.33	-0.34
91800901	49.043	-125.15	38	7.87	32.62	1025.60	95.60	3.12	32.41	95.00	0.26	-0.35
91800901	49.043	-125.15	40	7.86	32.66	1025.64	95.39	3.07	31.90	93.46	0.20	-0.35
91800901	49.043	-125.15	42	7.87	32.69	1025.67	95.15	2.90	30.12	88.23	0.15	-0.34
91800901	49.043	-125.15	44	7.86	32.70	1025.69	94.96	2.83	29.41	86.17	0.12	-0.34
91800901	49.043	-125.15	46	7.86	32.70	1025.70	94.86	2.80	29.09	85.22	0.09	-0.35
91800901	49.043	-125.15	48	7.86	32.71	1025.72	94.79	2.72	28.33	82.99	0.07	-0.35
91800901	49.043	-125.15	50	7.87	32.72	1025.73	94.71	2.68	27.87	81.64	0.05	-0.35
91800901	49.043	-125.15	52	7.88	32.72	1025.74	94.66	2.59	26.91	78.80	0.04	-0.35
91800901	49.043	-125.15	54	7.88	32.73	1025.76	94.52	2.49	25.89	75.81	0.03	-0.35
91800901	49.043	-125.15	56	7.88	32.74	1025.77	94.37	2.46	25.63	75.05	0.03	-0.36
91800901	49.043	-125.15	58	7.88	32.74	1025.78	94.17	2.47	25.70	75.23	0.02	-0.36
91800901	49.043	-125.15	59	7.88	32.74	1025.79	93.95	2.49	25.95	75.97	0.02	-0.37
91800901	49.043	-125.15	61	7.87	32.75	1025.81	93.90	2.54	26.45	77.45	0.01	-0.35
91800901	49.043	-125.15	63	7.86	32.75	1025.82	93.90	2.59	26.92	78.82	0.01	-0.36
91800901	49.043	-125.15	65	7.86	32.75	1025.83	93.96	2.59	26.96	78.96	0.01	-0.37
91800901	49.043	-125.15	67	7.86	32.75	1025.84	94.02	2.60	27.10	79.37	0.01	-0.37
91800901	49.043	-125.15	69	7.86	32.75	1025.85	93.99	2.61	27.15	79.51	0.01	-0.36
91800901	49.043	-125.15	71	7.86	32.75	1025.86	93.94	2.61	27.14	79.49	0.01	-0.37
91800901	49.043	-125.15	73	7.87	32.76	1025.87	93.94	2.59	26.93	78.85	0.01	-0.37
91800901	49.043	-125.15	75	7.88	32.76	1025.88	93.91	2.56	26.69	78.14	0.01	-0.36
91800901	49.043	-125.15	77	7.88	32.76	1025.89	93.92	2.56	26.64	77.99	0.01	-0.37
91800901	49.043	-125.15	79	7.87	32.76	1025.90	93.89	2.55	26.52	77.65	0.01	-0.37

91800901	49.043	-125.15	81	7.88	32.77	1025.91	93.85	2.53	26.32	77.06	0.01	-0.36
91800901	49.043	-125.15	83	7.88	32.77	1025.92	93.87	2.51	26.17	76.61	0.01	-0.37
91800901	49.043	-125.15	85	7.87	32.77	1025.93	93.80	2.52	26.21	76.74	0.01	-0.37
91800901	49.043	-125.15	87	7.86	32.77	1025.94	93.81	2.53	26.34	77.14	0.01	-0.37
91800901	49.043	-125.15	89	7.87	32.77	1025.95	93.82	2.52	26.23	76.80	0.01	-0.36
91800901	49.043	-125.15	91	7.86	32.77	1025.96	93.81	2.51	26.13	76.50	0.01	-0.37
91800901	49.043	-125.15	93	7.86	32.77	1025.97	93.75	2.51	26.13	76.50	0.01	-0.36
91800901	49.043	-125.15	95	7.86	32.77	1025.98	93.71	2.51	26.12	76.50	0.01	-0.37
91800901	49.043	-125.15	97	7.86	32.77	1025.99	93.67	2.51	26.11	76.46	0.01	-0.36
91800901	49.043	-125.15	99	7.85	32.77	1026.00	93.59	2.52	26.18	76.71	0.01	-0.37
91800901	49.043	-125.15	101	7.83	32.77	1026.01	93.54	2.57	26.71	78.29	0.01	-0.36
91800901	49.043	-125.15	103	7.82	32.77	1026.02	93.05	2.61	27.08	79.38	0.01	-0.36
91800901	49.043	-125.15	105	7.81	32.77	1026.03	92.93	2.62	27.25	79.91	0.01	-0.36
91800901	49.043	-125.15	107	7.81	32.77	1026.04	92.64	2.64	27.46	80.53	0.01	-0.36
91800901	49.043	-125.15	109	7.81	32.77	1026.05	92.39	2.65	27.56	80.82	0.01	-0.36
91800901	49.043	-125.15	111	7.81	32.77	1026.06	92.11	2.64	27.44	80.43	0.01	-0.36
91800901	49.043	-125.15	113	7.81	32.77	1026.07	92.21	2.63	27.32	80.10	0.01	-0.36
91800901	49.043	-125.15	115	7.81	32.77	1026.08	92.05	2.63	27.31	80.07	0.01	-0.36
91800901	49.043	-125.15	117	7.81	32.77	1026.09	92.28	2.62	27.22	79.81	0.01	-0.37
91800901	49.043	-125.15	119	7.81	32.77	1026.10	92.41	2.63	27.33	80.14	0.01	-0.36
91800901	49.043	-125.15	121	7.81	32.77	1026.11	92.35	2.63	27.35	80.18	0.01	-0.37
91800901	49.043	-125.15	123	7.81	32.77	1026.12	92.24	2.63	27.38	80.27	0.01	-0.37
91800901	49.043	-125.15	125	7.81	32.77	1026.13	92.14	2.63	27.37	80.25	0.01	-0.36
91800901	49.043	-125.15	127	7.80	32.77	1026.14	92.29	2.64	27.42	80.40	0.01	-0.36
91800901	49.043	-125.15	129	7.81	32.77	1026.15	92.24	2.64	27.43	80.43	0.01	-0.37
91800901	49.043	-125.15	131	7.81	32.77	1026.16	92.29	2.60	27.02	79.21	0.01	-0.36
91800901	49.043	-125.15	133	7.82	32.77	1026.17	92.58	2.57	26.76	78.43	0.01	-0.36
91800901	49.043	-125.15	135	7.83	32.78	1026.18	92.57	2.54	26.39	77.34	0.01	-0.36
91800901	49.043	-125.15	137	7.82	32.78	1026.18	92.65	2.53	26.30	77.07	0.01	-0.36
91800901	49.043	-125.15	139	7.83	32.78	1026.19	92.77	2.52	26.16	76.65	0.01	-0.36
91800901	49.043	-125.15	141	7.83	32.78	1026.20	92.84	2.50	26.00	76.20	0.01	-0.36
91800901	49.043	-125.15	143	7.83	32.78	1026.21	92.91	2.50	25.96	76.06	0.01	-0.36

91800901	49.043	-125.15	145	7.83	32.78	1026.22	92.91	2.49	25.88	75.83	0.01	-0.35
91800901	49.043	-125.15	147	7.84	32.78	1026.23	92.95	2.48	25.78	75.52	0.01	-0.37
91800901	49.043	-125.15	149	7.84	32.78	1026.24	93.04	2.46	25.55	74.85	0.01	-0.36
91800901	49.043	-125.15	151	7.84	32.78	1026.25	93.03	2.44	25.43	74.50	0.01	-0.36
91800901	49.043	-125.15	153	7.84	32.78	1026.26	92.95	2.42	25.18	73.75	0.01	-0.36
91800901	49.043	-125.15	155	7.84	32.78	1026.27	93.08	2.39	24.82	72.73	0.01	-0.36
91800901	49.043	-125.15	157	7.83	32.78	1026.28	93.02	2.44	25.33	74.21	0.01	-0.35
91800901	49.043	-125.15	159	7.84	32.78	1026.29	93.01	2.41	25.07	73.43	0.01	-0.36
91800901	49.043	-125.15	161	7.85	32.78	1026.30	93.04	2.37	24.68	72.28	0.01	-0.36
91800901	49.043	-125.15	163	7.87	32.79	1026.31	92.91	2.26	23.48	68.74	0.01	-0.36
91800901	49.043	-125.15	165	7.86	32.79	1026.31	93.00	2.24	23.34	68.33	0.01	-0.36
91800901	49.043	-125.15	167	7.87	32.79	1026.32	93.00	2.23	23.19	67.91	0.01	-0.36
91800901	49.043	-125.15	168	7.88	32.79	1026.33	92.95	2.17	22.63	66.19	0.01	-0.36
91800901	49.043	-125.15	170	7.91	32.80	1026.34	93.05	1.99	20.71	60.58	0.01	-0.35
91800901	49.043	-125.15	172	7.91	32.80	1026.35	93.16	1.94	20.16	58.96	0.01	-0.35
91800901	49.043	-125.15	174	7.91	32.80	1026.36	93.23	1.92	20.00	58.49	0.01	-0.35
91800901	49.043	-125.15	176	7.91	32.80	1026.37	93.10	1.92	19.99	58.47	0.01	-0.36
91800901	49.043	-125.15	178	7.90	32.80	1026.38	93.13	1.95	20.26	59.28	0.01	-0.36
91800901	49.043	-125.15	180	7.88	32.79	1026.39	93.13	2.05	21.39	62.61	0.01	-0.35
91800901	49.043	-125.15	182	7.86	32.79	1026.40	92.83	2.18	22.73	66.56	0.01	-0.35
91800901	49.043	-125.15	184	7.86	32.79	1026.41	92.64	2.20	22.93	67.15	0.01	-0.35
91800901	49.043	-125.15	186	7.86	32.79	1026.42	92.25	2.20	22.92	67.09	0.01	-0.35
91800901	49.043	-125.15	188	7.88	32.79	1026.43	91.87	2.09	21.76	63.64	0.01	-0.35
91800901	49.043	-125.15	190	7.94	32.81	1026.44	91.87	1.74	18.16	53.06	0.01	-0.35
91800901	49.043	-125.15	192	7.97	32.81	1026.45	91.84	1.47	15.36	44.85	0.01	-0.35
91800901	49.043	-125.15	194	7.97	32.81	1026.45	92.25	1.45	15.14	44.20	0.01	-0.35
91801001	49.051	-125.14	12	8.53	32.08	1024.96	80.62	4.84	50.90	147.69	17.33	1.63
91801001	49.051	-125.14	14	8.42	32.13	1025.02	82.82	4.19	43.91	127.66	10.07	0.89
91801001	49.051	-125.14	16	8.32	32.19	1025.09	87.03	3.81	39.90	116.16	6.72	0.31
91801001	49.051	-125.14	18	8.28	32.23	1025.14	90.29	3.57	37.32	108.70	4.79	0.06
91801001	49.051	-125.14	20	8.25	32.25	1025.17	93.09	3.41	35.69	104.03	3.54	-0.03

91801001	49.051	-125.14	22	8.19	32.31	1025.24	94.23	3.21	33.59	97.97	2.65	-0.18
91801001	49.051	-125.14	24	8.14	32.35	1025.28	94.84	3.09	32.23	94.13	2.00	-0.24
91801001	49.051	-125.14	26	8.07	32.43	1025.37	95.21	2.96	30.88	90.22	1.51	-0.30
91801001	49.051	-125.14	28	8.04	32.45	1025.39	95.42	2.94	30.66	89.66	1.13	-0.32
91801001	49.051	-125.14	30	7.99	32.50	1025.45	95.48	2.98	31.00	90.70	0.85	-0.33
91801001	49.051	-125.14	32	7.97	32.54	1025.49	95.52	2.90	30.20	88.36	0.64	-0.34
91801001	49.051	-125.14	34	7.93	32.58	1025.54	95.47	2.88	29.94	87.70	0.48	-0.34
91801001	49.051	-125.14	36	7.90	32.59	1025.56	95.34	3.06	31.81	93.19	0.36	-0.34
91801001	49.051	-125.14	38	7.88	32.62	1025.59	95.21	3.14	32.64	95.66	0.28	-0.35
91801001	49.051	-125.14	40	7.86	32.65	1025.63	95.17	3.17	33.01	96.73	0.21	-0.35
91801001	49.051	-125.14	42	7.86	32.67	1025.66	95.08	3.09	32.16	94.25	0.16	-0.35
91801001	49.051	-125.14	44	7.86	32.69	1025.68	94.94	2.96	30.84	90.35	0.12	-0.34
91801001	49.051	-125.14	46	7.87	32.70	1025.70	94.87	2.80	29.17	85.44	0.09	-0.35
91801001	49.051	-125.14	48	7.88	32.72	1025.72	94.75	2.66	27.68	81.04	0.07	-0.34
91801001	49.051	-125.14	50	7.89	32.73	1025.73	94.67	2.54	26.46	77.45	0.06	-0.35
91801001	49.051	-125.14	52	7.89	32.73	1025.75	94.57	2.48	25.78	75.48	0.04	-0.35
91801001	49.051	-125.14	54	7.89	32.74	1025.76	94.32	2.43	25.26	73.94	0.03	-0.34
91801001	49.051	-125.14	56	7.89	32.74	1025.77	93.91	2.44	25.42	74.43	0.03	-0.35
91801001	49.051	-125.14	57	7.88	32.74	1025.79	93.87	2.47	25.66	75.13	0.02	-0.35
91801001	49.051	-125.14	59	7.88	32.75	1025.80	93.97	2.49	25.88	75.76	0.02	-0.35
91801001	49.051	-125.14	61	7.88	32.75	1025.81	94.03	2.50	26.06	76.31	0.02	-0.35
91801001	49.051	-125.14	63	7.87	32.75	1025.82	94.08	2.48	25.81	75.57	0.01	-0.35
91801001	49.051	-125.14	65	7.87	32.75	1025.83	94.05	2.46	25.63	75.05	0.01	-0.35
91801001	49.051	-125.14	67	7.87	32.75	1025.84	93.63	2.47	25.70	75.26	0.01	-0.35
91801001	49.051	-125.14	69	7.87	32.76	1025.85	93.23	2.46	25.59	74.92	0.01	-0.35
91801101	49.058	-125.15	12	8.63	32.05	1024.91	83.49	5.01	52.70	152.66	22.95	2.14
91801101	49.058	-125.15	14	8.47	32.11	1025.00	87.55	4.04	42.36	123.05	13.99	1.22
91801101	49.058	-125.15	16	8.36	32.18	1025.08	92.79	3.50	36.71	106.80	9.00	0.34
91801101	49.058	-125.15	18	8.29	32.22	1025.13	94.68	3.32	34.71	101.08	6.28	0.03
91801101	49.058	-125.15	20	8.25	32.27	1025.18	95.26	3.08	32.26	93.98	4.64	-0.16
91801101	49.058	-125.15	22	8.22	32.29	1025.22	95.46	3.00	31.39	91.50	3.47	-0.23

91801101	49.058	-125.15	24	8.19	32.34	1025.27	95.50	2.76	28.84	84.12	2.60	-0.28
91801101	49.058	-125.15	26	8.17	32.35	1025.29	95.33	2.70	28.23	82.34	1.95	-0.29
91801101	49.058	-125.15	28	8.12	32.40	1025.34	95.43	2.67	27.83	81.29	1.44	-0.31
91801101	49.058	-125.15	30	8.06	32.46	1025.41	95.40	2.64	27.56	80.51	1.07	-0.33
91801101	49.058	-125.15	32	8.06	32.50	1025.45	95.31	2.33	24.27	70.89	0.80	-0.34
91801101	49.058	-125.15	34	8.06	32.52	1025.47	95.14	2.09	21.80	63.67	0.59	-0.33
91801101	49.058	-125.15	36	8.06	32.54	1025.50	95.01	1.89	19.72	57.61	0.44	-0.34
91801101	49.058	-125.15	38	8.02	32.56	1025.53	95.09	2.07	21.58	63.07	0.32	-0.34
91801101	49.058	-125.15	40	7.99	32.57	1025.55	95.11	2.26	23.59	68.99	0.24	-0.34
91801101	49.058	-125.15	42	7.96	32.58	1025.57	95.09	2.56	26.71	78.15	0.17	-0.35
91801201	49.066	-125.15	12	8.60	32.07	1024.93	84.44	4.54	47.77	138.41	26.13	1.53
91801201	49.066	-125.15	14	8.48	32.12	1025.00	88.44	3.76	39.42	114.50	16.82	0.73
91801201	49.066	-125.15	16	8.38	32.17	1025.07	90.89	3.44	36.11	105.00	11.38	0.31
91801201	49.066	-125.15	18	8.31	32.21	1025.12	93.25	3.27	34.20	99.58	8.09	0.02
91801201	49.066	-125.15	20	8.27	32.26	1025.17	94.32	3.06	32.00	93.20	5.89	-0.14
91801201	49.066	-125.15	22	8.24	32.29	1025.22	94.99	2.78	29.10	84.79	4.35	-0.23
91801201	49.066	-125.15	24	8.20	32.34	1025.27	95.18	2.62	27.38	79.83	3.21	-0.28
91801201	49.066	-125.15	26	8.17	32.39	1025.32	95.10	2.29	23.89	69.67	2.35	-0.31
91801201	49.066	-125.15	28	8.15	32.43	1025.36	94.96	1.96	20.53	59.86	1.71	-0.33
91801201	49.066	-125.15	30	8.13	32.45	1025.39	94.77	1.92	20.09	58.61	1.25	-0.32
91801201	49.066	-125.15	32	8.09	32.46	1025.41	94.78	2.18	22.72	66.35	0.90	-0.34
91801201	49.066	-125.15	34	8.07	32.48	1025.44	94.89	2.29	23.88	69.72	0.65	-0.34
91801201	49.066	-125.15	36	8.08	32.50	1025.46	94.86	2.04	21.28	62.12	0.47	-0.34
91801201	49.066	-125.15	38	8.10	32.51	1025.48	94.58	1.70	17.76	51.83	0.34	-0.34
91801201	49.066	-125.15	40	8.09	32.52	1025.49	94.42	1.62	16.95	49.45	0.25	-0.34
91801201	49.066	-125.15	42	8.11	32.52	1025.51	94.38	1.45	15.17	44.26	0.18	-0.34
91801201	49.066	-125.15	44	8.12	32.53	1025.52	94.49	1.23	12.85	37.48	0.13	-0.34
91801201	49.066	-125.15	46	8.12	32.54	1025.53	94.76	1.10	11.52	33.58	0.09	-0.34
91801201	49.066	-125.15	48	8.13	32.54	1025.55	94.96	1.05	11.00	32.07	0.07	-0.34
91801201	49.066	-125.15	50	8.13	32.54	1025.56	95.16	1.10	11.50	33.54	0.05	-0.34
91801201	49.066	-125.15	52	8.11	32.54	1025.57	95.21	1.20	12.51	36.48	0.04	-0.34

91801201	49.066	-125.15	54	8.09	32.54	1025.58	95.15	1.39	14.48	42.27	0.03	-0.34
91801201	49.066	-125.15	56	8.05	32.54	1025.59	95.11	1.81	18.84	55.02	0.03	-0.34
91801201	49.066	-125.15	57	8.06	32.54	1025.60	95.04	1.81	18.85	55.02	0.02	-0.34
91801201	49.066	-125.15	59	8.06	32.55	1025.61	94.99	1.75	18.28	53.38	0.02	-0.35
91801201	49.066	-125.15	61	8.06	32.55	1025.62	94.83	1.81	18.86	55.07	0.02	-0.34
91801201	49.066	-125.15	63	8.06	32.55	1025.63	94.82	1.79	18.65	54.43	0.01	-0.34
91801201	49.066	-125.15	65	8.08	32.55	1025.64	94.77	1.58	16.54	48.26	0.01	-0.34
91801201	49.066	-125.15	67	8.08	32.56	1025.66	94.63	1.54	16.04	46.82	0.01	-0.34
91801201	49.066	-125.15	69	8.08	32.56	1025.67	94.48	1.49	15.59	45.48	0.01	-0.34
91801201	49.066	-125.15	71	8.08	32.56	1025.68	94.38	1.52	15.86	46.27	0.01	-0.34
91801201	49.066	-125.15	73	8.08	32.56	1025.69	94.32	1.52	15.87	46.32	0.01	-0.34
91801201	49.066	-125.15	75	8.07	32.56	1025.70	94.33	1.56	16.30	47.60	0.01	-0.34
91801201	49.066	-125.15	77	8.04	32.56	1025.71	94.32	1.80	18.79	54.88	0.01	-0.34
91801201	49.066	-125.15	79	8.04	32.56	1025.72	94.33	1.89	19.69	57.51	0.01	-0.34
91801201	49.066	-125.15	81	8.03	32.56	1025.73	94.36	1.96	20.46	59.77	0.01	-0.34
91801201	49.066	-125.15	83	8.03	32.56	1025.74	94.38	1.98	20.71	60.49	0.01	-0.34
91801201	49.066	-125.15	85	8.03	32.56	1025.75	94.30	1.99	20.79	60.75	0.01	-0.34
91801201	49.066	-125.15	87	8.03	32.56	1025.76	94.30	2.00	20.88	60.99	0.01	-0.34
91801201	49.066	-125.15	89	8.03	32.56	1025.77	94.42	2.02	21.11	61.68	0.01	-0.34
91801201	49.066	-125.15	91	8.03	32.56	1025.78	94.38	2.04	21.29	62.20	0.01	-0.34
91801201	49.066	-125.15	93	8.03	32.56	1025.79	94.42	2.04	21.33	62.32	0.01	-0.34
91801201	49.066	-125.15	95	8.03	32.56	1025.80	94.44	2.05	21.34	62.35	0.01	-0.34
91801201	49.066	-125.15	97	8.03	32.56	1025.81	94.41	2.04	21.33	62.32	0.01	-0.34
91801201	49.066	-125.15	99	8.03	32.56	1025.82	94.46	2.04	21.30	62.23	0.01	-0.34
91801201	49.066	-125.15	101	8.03	32.57	1025.82	94.29	2.03	21.23	62.02	0.01	-0.34
91801201	49.066	-125.15	103	8.03	32.57	1025.84	94.43	2.05	21.36	62.41	0.01	-0.33
91801301	49.073	-125.16	12	8.58	32.08	1024.95	82.98	4.14	43.52	126.13	10.92	1.45
91801301	49.073	-125.16	14	8.45	32.15	1025.03	85.90	3.39	35.63	103.47	6.57	0.44
91801301	49.073	-125.16	16	8.38	32.20	1025.09	88.99	3.04	31.87	92.68	4.41	0.06
91801301	49.073	-125.16	18	8.30	32.25	1025.15	91.35	2.81	29.45	85.74	3.23	-0.12
91801301	49.073	-125.16	20	8.25	32.28	1025.20	93.42	2.78	29.06	84.68	2.39	-0.22

91801301	49.073	-125.16	22	8.21	32.30	1025.23	94.39	2.83	29.62	86.36	1.76	-0.25
91801301	49.073	-125.16	24	8.16	32.34	1025.27	94.87	2.93	30.63	89.37	1.30	-0.26
91801301	49.073	-125.16	26	8.16	32.39	1025.32	95.26	2.49	25.99	75.76	0.97	-0.31
91801301	49.073	-125.16	28	8.16	32.42	1025.35	95.30	1.97	20.60	60.10	0.73	-0.32
91801301	49.073	-125.16	30	8.12	32.45	1025.39	94.93	2.08	21.70	63.30	0.54	-0.33
91801301	49.073	-125.16	32	8.11	32.48	1025.43	94.87	1.86	19.47	56.80	0.39	-0.33
91801301	49.073	-125.16	34	8.12	32.49	1025.44	94.73	1.64	17.13	49.97	0.28	-0.34
91801301	49.073	-125.16	36	8.11	32.50	1025.46	94.62	1.61	16.78	48.95	0.21	-0.34
91801301	49.073	-125.16	38	8.10	32.51	1025.48	94.45	1.58	16.49	48.11	0.15	-0.34
91801301	49.073	-125.16	40	8.11	32.52	1025.50	94.43	1.41	14.75	43.01	0.11	-0.34
91801301	49.073	-125.16	42	8.12	32.53	1025.51	94.51	1.21	12.67	36.93	0.08	-0.34
91801301	49.073	-125.16	44	8.12	32.54	1025.52	94.72	1.11	11.55	33.69	0.06	-0.34
91801301	49.073	-125.16	46	8.13	32.54	1025.53	94.94	1.09	11.35	33.10	0.04	-0.34
91801301	49.073	-125.16	48	8.13	32.54	1025.55	95.02	1.11	11.64	33.93	0.03	-0.35
91801301	49.073	-125.16	50	8.12	32.55	1025.56	95.20	1.13	11.86	34.59	0.03	-0.34
91801301	49.073	-125.16	52	8.11	32.55	1025.57	95.21	1.24	12.91	37.67	0.02	-0.34
91801301	49.073	-125.16	54	8.11	32.55	1025.58	95.17	1.23	12.91	37.63	0.02	-0.35
91801301	49.073	-125.16	56	8.12	32.56	1025.59	94.91	1.10	11.48	33.47	0.02	-0.34
91801301	49.073	-125.16	58	8.12	32.56	1025.60	94.71	1.13	11.82	34.45	0.01	-0.34
91801301	49.073	-125.16	59	8.14	32.56	1025.62	94.29	0.97	10.14	29.54	0.01	-0.34
91801301	49.073	-125.16	61	8.13	32.56	1025.63	93.68	0.93	9.77	28.49	0.01	-0.34
91801301	49.073	-125.16	63	8.13	32.56	1025.63	93.36	0.98	10.21	29.77	0.01	-0.35
91801301	49.073	-125.16	65	8.11	32.56	1025.65	93.32	1.09	11.37	33.17	0.01	-0.35
91801301	49.073	-125.16	67	8.11	32.56	1025.66	93.47	1.25	13.08	38.14	0.01	-0.35
91801301	49.073	-125.16	69	8.15	32.57	1025.67	93.49	0.93	9.77	28.46	0.01	-0.34
91801301	49.073	-125.16	71	8.13	32.57	1025.68	91.78	0.92	9.61	28.01	0.01	-0.34
91801301	49.073	-125.16	73	8.11	32.57	1025.69	90.86	1.04	10.88	31.73	0.01	-0.34
91801301	49.073	-125.16	75	8.07	32.57	1025.70	90.71	1.36	14.19	41.41	0.01	-0.35
91801301	49.073	-125.16	77	8.06	32.57	1025.71	91.91	1.54	16.06	46.89	0.01	-0.34
91801301	49.073	-125.16	79	8.06	32.57	1025.72	92.47	1.64	17.07	49.84	0.01	-0.34
91801301	49.073	-125.16	81	8.06	32.57	1025.73	92.93	1.61	16.78	48.99	0.01	-0.35
91801301	49.073	-125.16	83	8.07	32.57	1025.74	92.78	1.54	16.07	46.92	0.01	-0.34

91801301	49.073	-125.16	85	8.05	32.57	1025.75	92.59	1.66	17.35	50.65	0.01	-0.35
91801301	49.073	-125.16	87	8.05	32.57	1025.76	92.45	1.76	18.32	53.51	0.01	-0.34
91801301	49.073	-125.16	89	8.04	32.57	1025.77	92.53	1.81	18.94	55.31	0.01	-0.34
91801301	49.073	-125.16	91	8.03	32.57	1025.78	92.93	1.94	20.23	59.12	0.01	-0.34
91801301	49.073	-125.16	93	8.02	32.57	1025.79	93.19	2.06	21.48	62.79	0.01	-0.35
91801301	49.073	-125.16	95	8.01	32.57	1025.80	93.52	2.14	22.32	65.24	0.01	-0.34
91801301	49.073	-125.16	97	8.02	32.57	1025.81	93.72	2.09	21.82	63.75	0.01	-0.35
91801301	49.073	-125.16	99	8.02	32.57	1025.82	94.03	2.07	21.55	62.97	0.01	-0.34
91801301	49.073	-125.16	101	8.02	32.58	1025.83	94.07	2.04	21.33	62.31	0.01	-0.34
91801301	49.073	-125.16	103	8.02	32.58	1025.84	94.04	2.03	21.15	61.79	0.01	-0.35
91801401	49.086	-125.18	12	8.67	32.12	1024.96	84.60	2.85	30.06	86.91	4.95	0.66
91801401	49.086	-125.18	14	8.56	32.18	1025.04	91.02	2.06	21.66	62.72	3.08	0.04
91801401	49.086	-125.18	16	8.47	32.22	1025.09	93.98	1.95	20.50	59.50	2.18	-0.10
91801401	49.086	-125.18	18	8.40	32.26	1025.15	94.85	1.90	19.98	58.04	1.60	-0.19
91801401	49.086	-125.18	20	8.33	32.29	1025.19	95.02	1.90	19.88	57.83	1.17	-0.24
91801401	49.086	-125.18	22	8.27	32.33	1025.24	94.93	2.00	20.91	60.87	0.85	-0.28
91801401	49.086	-125.18	24	8.25	32.36	1025.28	94.90	1.81	18.93	55.09	0.62	-0.30
91801401	49.086	-125.18	26	8.24	32.40	1025.32	94.84	1.40	14.70	42.80	0.45	-0.31
91801401	49.086	-125.18	28	8.22	32.44	1025.36	94.41	1.14	11.90	34.65	0.33	-0.31
91801401	49.086	-125.18	30	8.22	32.46	1025.38	93.94	0.98	10.29	29.96	0.24	-0.31
91801401	49.086	-125.18	32	8.18	32.46	1025.40	93.45	1.19	12.47	36.33	0.18	-0.32
91801401	49.086	-125.18	34	8.16	32.48	1025.43	93.67	1.24	12.98	37.82	0.13	-0.33
91801401	49.086	-125.18	36	8.14	32.50	1025.45	94.05	1.22	12.78	37.25	0.09	-0.33
91801401	49.086	-125.18	38	8.14	32.51	1025.47	94.31	1.14	11.89	34.66	0.07	-0.32
91801401	49.086	-125.18	40	8.13	32.52	1025.49	93.80	1.02	10.67	31.12	0.05	-0.32
91801401	49.086	-125.18	42	8.13	32.53	1025.51	93.87	1.00	10.49	30.60	0.04	-0.33
91801401	49.086	-125.18	44	8.13	32.53	1025.52	94.47	0.92	9.60	27.99	0.03	-0.33
91801401	49.086	-125.18	46	8.13	32.54	1025.53	94.65	0.81	8.43	24.58	0.02	-0.34
91801401	49.086	-125.18	48	8.13	32.54	1025.54	94.73	0.83	8.64	25.18	0.02	-0.34
91801401	49.086	-125.18	50	8.14	32.54	1025.55	94.79	0.77	8.05	23.46	0.02	-0.34
91801401	49.086	-125.18	52	8.14	32.55	1025.57	94.71	0.82	8.57	24.99	0.01	-0.34

91801501	49.092	-125.19	13	8.75	32.09	1024.93	87.14	2.11	22.31	64.43	3.01	0.49
91801501	49.092	-125.19	14	8.66	32.13	1024.99	90.76	1.73	18.26	52.79	2.12	0.25
91801501	49.092	-125.19	16	8.57	32.18	1025.05	93.13	1.48	15.55	45.02	1.48	0.04
91801501	49.092	-125.19	18	8.51	32.22	1025.10	93.81	1.30	13.63	39.50	1.08	-0.08
91801501	49.092	-125.19	20	8.45	32.26	1025.15	93.94	1.13	11.84	34.35	0.78	-0.18
91801501	49.092	-125.19	22	8.41	32.30	1025.19	93.68	1.07	11.25	32.65	0.56	-0.23
91801501	49.092	-125.19	24	8.36	32.34	1025.24	93.86	0.85	8.87	25.76	0.40	-0.28
91801501	49.092	-125.19	26	8.31	32.39	1025.30	93.79	0.78	8.19	23.81	0.29	-0.29
91801501	49.092	-125.19	28	8.28	32.41	1025.32	93.27	0.77	8.11	23.57	0.21	-0.30
91801501	49.092	-125.19	30	8.25	32.44	1025.36	93.34	0.70	7.32	21.32	0.14	-0.31