

**The Daily Astorian.**  
ASTORIA, OREGON:  
SATURDAY, JANUARY 11, 1890

**TIDE TABLE FOR ASTORIA.**  
JANUARY.

HIGH WATER.		LOW WATER.	
Time.	Height.	Time.	Height.
6:50	11.2	12:50	2.5
7:10	11.5	1:10	2.2
7:30	11.8	1:30	1.9
7:50	12.1	1:50	1.6
8:10	12.4	2:10	1.3
8:30	12.7	2:30	1.0
8:50	13.0	2:50	0.7
9:10	13.3	3:10	0.4
9:30	13.6	3:30	0.1
9:50	13.9	3:50	0.0
10:10	14.2	4:10	0.0
10:30	14.5	4:30	0.0
10:50	14.8	4:50	0.0
11:10	15.1	5:10	0.0
11:30	15.4	5:30	0.0
11:50	15.7	5:50	0.0
12:10	16.0	6:10	0.0
12:30	16.3	6:30	0.0
12:50	16.6	6:50	0.0
1:10	16.9	7:10	0.0
1:30	17.2	7:30	0.0
1:50	17.5	7:50	0.0
2:10	17.8	8:10	0.0
2:30	18.1	8:30	0.0
2:50	18.4	8:50	0.0
3:10	18.7	9:10	0.0
3:30	19.0	9:30	0.0
3:50	19.3	9:50	0.0
4:10	19.6	10:10	0.0
4:30	19.9	10:30	0.0
4:50	20.2	10:50	0.0
5:10	20.5	11:10	0.0
5:30	20.8	11:30	0.0
5:50	21.1	11:50	0.0
6:10	21.4	12:10	0.0
6:30	21.7	12:30	0.0
6:50	22.0	12:50	0.0
7:10	22.3	1:10	0.0
7:30	22.6	1:30	0.0
7:50	22.9	1:50	0.0
8:10	23.2	2:10	0.0
8:30	23.5	2:30	0.0
8:50	23.8	2:50	0.0
9:10	24.1	3:10	0.0
9:30	24.4	3:30	0.0
9:50	24.7	3:50	0.0
10:10	25.0	4:10	0.0
10:30	25.3	4:30	0.0
10:50	25.6	4:50	0.0
11:10	25.9	5:10	0.0
11:30	26.2	5:30	0.0
11:50	26.5	5:50	0.0
12:10	26.8	6:10	0.0
12:30	27.1	6:30	0.0
12:50	27.4	6:50	0.0
1:10	27.7	7:10	0.0
1:30	28.0	7:30	0.0
1:50	28.3	7:50	0.0
2:10	28.6	8:10	0.0
2:30	28.9	8:30	0.0
2:50	29.2	8:50	0.0
3:10	29.5	9:10	0.0
3:30	29.8	9:30	0.0
3:50	30.1	9:50	0.0
4:10	30.4	10:10	0.0
4:30	30.7	10:30	0.0
4:50	31.0	10:50	0.0
5:10	31.3	11:10	0.0
5:30	31.6	11:30	0.0
5:50	31.9	11:50	0.0
6:10	32.2	12:10	0.0
6:30	32.5	12:30	0.0
6:50	32.8	12:50	0.0
7:10	33.1	1:10	0.0
7:30	33.4	1:30	0.0
7:50	33.7	1:50	0.0
8:10	34.0	2:10	0.0
8:30	34.3	2:30	0.0
8:50	34.6	2:50	0.0
9:10	34.9	3:10	0.0
9:30	35.2	3:30	0.0
9:50	35.5	3:50	0.0
10:10	35.8	4:10	0.0
10:30	36.1	4:30	0.0
10:50	36.4	4:50	0.0
11:10	36.7	5:10	0.0
11:30	37.0	5:30	0.0
11:50	37.3	5:50	0.0
12:10	37.6	6:10	0.0
12:30	37.9	6:30	0.0
12:50	38.2	6:50	0.0
1:10	38.5	7:10	0.0
1:30	38.8	7:30	0.0
1:50	39.1	7:50	0.0
2:10	39.4	8:10	0.0
2:30	39.7	8:30	0.0
2:50	40.0	8:50	0.0
3:10	40.3	9:10	0.0
3:30	40.6	9:30	0.0
3:50	40.9	9:50	0.0
4:10	41.2	10:10	0.0
4:30	41.5	10:30	0.0
4:50	41.8	10:50	0.0
5:10	42.1	11:10	0.0
5:30	42.4	11:30	0.0
5:50	42.7	11:50	0.0
6:10	43.0	12:10	0.0
6:30	43.3	12:30	0.0
6:50	43.6	12:50	0.0
7:10	43.9	1:10	0.0
7:30	44.2	1:30	0.0
7:50	44.5	1:50	0.0
8:10	44.8	2:10	0.0
8:30	45.1	2:30	0.0
8:50	45.4	2:50	0.0
9:10	45.7	3:10	0.0
9:30	46.0	3:30	0.0
9:50	46.3	3:50	0.0
10:10	46.6	4:10	0.0
10:30	46.9	4:30	0.0
10:50	47.2	4:50	0.0
11:10	47.5	5:10	0.0
11:30	47.8	5:30	0.0
11:50	48.1	5:50	0.0
12:10	48.4	6:10	0.0
12:30	48.7	6:30	0.0
12:50	49.0	6:50	0.0
1:10	49.3	7:10	0.0
1:30	49.6	7:30	0.0
1:50	49.9	7:50	0.0
2:10	50.2	8:10	0.0
2:30	50.5	8:30	0.0
2:50	50.8	8:50	0.0
3:10	51.1	9:10	0.0
3:30	51.4	9:30	0.0
3:50	51.7	9:50	0.0
4:10	52.0	10:10	0.0
4:30	52.3	10:30	0.0
4:50	52.6	10:50	0.0
5:10	52.9	11:10	0.0
5:30	53.2	11:30	0.0
5:50	53.5	11:50	0.0
6:10	53.8	12:10	0.0
6:30	54.1	12:30	0.0
6:50	54.4	12:50	0.0
7:10	54.7	1:10	0.0
7:30	55.0	1:30	0.0
7:50	55.3	1:50	0.0
8:10	55.6	2:10	0.0
8:30	55.9	2:30	0.0
8:50	56.2	2:50	0.0
9:10	56.5	3:10	0.0
9:30	56.8	3:30	0.0
9:50	57.1	3:50	0.0
10:10	57.4	4:10	0.0
10:30	57.7	4:30	0.0
10:50	58.0	4:50	0.0
11:10	58.3	5:10	0.0
11:30	58.6	5:30	0.0
11:50	58.9	5:50	0.0
12:10	59.2	6:10	0.0
12:30	59.5	6:30	0.0
12:50	59.8	6:50	0.0
1:10	60.1	7:10	0.0
1:30	60.4	7:30	0.0
1:50	60.7	7:50	0.0
2:10	61.0	8:10	0.0
2:30	61.3	8:30	0.0
2:50	61.6	8:50	0.0
3:10	61.9	9:10	0.0
3:30	62.2	9:30	0.0
3:50	62.5	9:50	0.0
4:10	62.8	10:10	0.0
4:30	63.1	10:30	0.0
4:50	63.4	10:50	0.0
5:10	63.7	11:10	0.0
5:30	64.0	11:30	0.0
5:50	64.3	11:50	0.0
6:10	64.6	12:10	0.0
6:30	64.9	12:30	0.0
6:50	65.2	12:50	0.0
7:10	65.5	1:10	0.0
7:30	65.8	1:30	0.0
7:50	66.1	1:50	0.0
8:10	66.4	2:10	0.0
8:30	66.7	2:30	0.0
8:50	67.0	2:50	0.0
9:10	67.3	3:10	0.0
9:30	67.6	3:30	0.0
9:50	67.9	3:50	0.0
10:10	68.2	4:10	0.0
10:30	68.5	4:30	0.0
10:50	68.8	4:50	0.0
11:10	69.1	5:10	0.0
11:30	69.4	5:30	0.0
11:50	69.7	5:50	0.0
12:10	70.0	6:10	0.0
12:30	70.3	6:30	0.0
12:50	70.6	6:50	0.0
1:10	70.9	7:10	0.0
1:30	71.2	7:30	0.0
1:50	71.5	7:50	0.0
2:10	71.8	8:10	0.0
2:30	72.1	8:30	0.0
2:50	72.4	8:50	0.0
3:10	72.7	9:10	0.0
3:30	73.0	9:30	0.0
3:50	73.3	9:50	0.0
4:10	73.6	10:10	0.0
4:30	73.9	10:30	0.0
4:50	74.2	10:50	0.0
5:10	74.5	11:10	0.0
5:30	74.8	11:30	0.0
5:50	75.1	11:50	0.0
6:10	75.4	12:10	0.0
6:30	75.7	12:30	0.0
6:50	76.0	12:50	0.0
7:10	76.3	1:10	0.0
7:30	76.6	1:30	0.0
7:50	76.9	1:50	0.0
8:10	77.2	2:10	0.0
8:30	77.5	2:30	0.0
8:50	77.8	2:50	0.0
9:10	78.1	3:10	0.0
9:30	78.4	3:30	0.0
9:50	78.7	3:50	0.0
10:10	79.0	4:10	0.0
10:30	79.3	4:30	0.0
10:50	79.6	4:50	0.0
11:10	79.9	5:10	0.0
11:30	80.2	5:30	0.0
11:50	80.5	5:50	0.0
12:10	80.8	6:10	0.0
12:30	81.1	6:30	0.0
12:50	81.4	6:50	0.0
1:10	81.7	7:10	0.0
1:30	82.0	7:30	0.0
1:50	82.3	7:50	0.0
2:10	82.6	8:10	0.0
2:30	82.9	8:30	0.0
2:50	83.2	8:50	0.0
3:10	83.5	9:10	0.0
3:30	83.8	9:30	0.0
3:50	84.1	9:50	0.0
4:10	84.4	10:10	0.0
4:30	84.7	10:30	0.0
4:50	85.0	10:50	0.0
5:10	85.3	11:10	0.0
5:30	85.6	11:30	0.0
5:50	85.9	11:50	0.0
6:10	86.2	12:10	0.0
6:30	86.5	12:30	0.0
6:50	86.8	12:50	0.0
7:10	87.1	1:10	0.0
7:30	87.4	1:30	0.0
7:50	87.7	1:50	0.0
8:10	88.0	2:10	0.0
8:30	88.3	2:30	0.0
8:50	88.6	2:50	0.0
9:10	88.9	3:10	0.0
9:30	89.2	3:30	0.0
9:50	89.5	3:50	0.0