

**Table S1.** Remote sensing data collected from the CoastSat analysis.

<b>Data source</b>	<b>Date of acquisition (year/mm/dd)</b>	<b>Time of acquisition (GMT)</b>	<b>RMSE (m)</b>	<b>Estimated mean seal level (m)</b>
Landsat5	1986/03/10	16:55	4.5	0.60
	1990/03/05	16:49	4.6	-0.34
	1990/03/21	16:50	4.5	-0.32
	1990/04/06	16:49	5.2	0.09
	1990/04/22	16:49	5.3	0.04
	1995/12/16	16:30	4.1	-0.22
	1995/05/22	16:36	8.4	-0.32
	1995/05/06	16:37	6.5	-0.31
	1995/07/09	16:34	6.3	0.23
	1995/07/25	16:34	8.9	0.46
	1995/11/21	16:35	4.1	0.46
	2000/01/28	17:04	4.0	-0.19
	2000/02/13	17:03	4.1	-0.36
	2000/04/17	17:04	5.3	0.39
	2000/05/03	17:05	6.7	0.40
	2000/05/19	17:05	5.1	0.28
	2000/09/24	17:08	5.3	0.34
	2000/10/10	17:08	4.8	0.36
	2000/10/26	17:08	4.1	0.62
	2000/12/13	17:09	3.8	0.73
	2000/12/29	17:09	3.8	0.47
	2005/05/01	17:16	5.4	-0.56
	2005/05/17	17:17	6.9	-0.34
	2005/06/02	17:17	8.2	-0.03
	2005/09/06	17:17	4.6	0.68
	2005/08/05	17:17	7.5	0.53
	2005/10/24	17:17	4.2	0.28
	2005/11/25	17:18	5.2	-0.05
	2010/02/24	17:20	4.2	-0.24
	2010/03/28	17:20	4.4	0.36
	2010/04/29	17:20	5.8	0.25
	2010/06/16	17:20	5.9	-0.08
	2010/06/23	17:26	5.3	0.28
	2010/10/06	17:19	4.5	0.54
	2010/11/07	17:19	3.8	0.76
	2010/11/30	17:25	3.8	-0.26
Landsat 8	2015/02/06	17:29	5.3	0.49
	2015/03/01	17:35	5.6	0.09
	2015/03/10	17:29	5.9	0.08
	2015/05/29	17:28	8.8	0.01
	2015/06/14	17:28	9.4	0.32
	2015/06/30	17:29	10.2	0.38
	2015/09/25	17:35	6.8	0.32

Landsat 8	2015/10/20	17:29	5.9	0.18
	2015/10/27	17:35	6.8	0.74
	2015/11/21	17:29	5.5	-0.13
	2015/12/07	17:29	5.2	0.09
	2015/12/14	17:36	6.1	0.56
	2015/12/23	17:29	5.0	0.35
Sentinel 2	2020/01/06	17:47	<1	-0.06
	2020/01/11	17:47	<1	0.72
	2020/01/21	17:47	<1	0.14
	2020/01/26	17:47	<1	0.61
	2020/02/25	17:47	<1	0.51
	2020/03/01	17:47	<1	-0.17
	2020/03/16	17:47	<1	-0.42
	2020/03/26	17:47	<1	0.36
	2020/03/31	17:47	<1	-0.37
	2020/04/05	17:47	<1	0.12
	2020/04/25	17:47	<1	0.20
	2020/04/30	17:47	<1	-0.50
	2020/05/05	17:47	<1	0.25
	2020/05/10	17:47	<1	-0.09
	2020/05/15	17:47	<1	-0.34