

Parallel-Shift Sensitivity Analysis for HLB-Option and Knockout Advances

The Federal Home Loan Bank of Boston (Bank) is providing estimated valuations of the specific HLB-Option and Knockout advances set forth below for members' information and convenience only. The estimated valuations are generated by models obtained from external sources which are used for the Bank's own asset/liability management purposes. The models include the use of specific assumptions, for example, market volatility and discount curve adjusted for the Bank's spread, to estimate the value of the advance. The valuations represent theoretical market values only and should not be construed as a liquidation price for the HLB-Option or Knockout advance.

It is expressly understood that in providing this valuation information to members, the Bank is not performing any advisory service. The valuations are being provided without representation or warranty and the member shall be solely responsible for any decision it makes or actions it takes based on the valuations provided. It is recommended that institutions maintain independent capabilities to value their asset/liability positions, including HLB-Option and Knockout advances.

The table depicts valuation estimates resulting from immediate parallel interest-rate movements of plus/minus 400 basis points in 100 basis point increments. In order to rule out negative interest rates, our model applies an effective floor of plus ten basis points to the yield curve for all down-rate scenarios. As a result, large down-rate shocks will reflect valuation at the floor rate of ten basis points in place of any negative interest rates that would otherwise be produced by the indicated basis point shocks. Please note that the valuation estimates are from the Federal Home Loan Bank of Boston's perspective. Since the advance is held by the member as a liability, positive price changes in the table correspond to the advance having a negative impact on the member's estimated market value of portfolio equity (and vice versa). The theoretical argument follows that as interest rates rise, the value of the advance to the Bank falls. In the case of an HLB-Option advance, the Bank would be likely to exercise its option to cancel the advance as the value falls below 100. In the case of a Knockout advance, the Bank would automatically terminate the advance on any specified cancellation date if LIBOR is equal to or greater than a predetermined "strike rate" four London Business days prior to the scheduled cancellation date. In either case, the member's cost to prepay the advance increases as interest rates fall.

To identify your advance, locate the appropriate maturity date and then verify the coupon rate. The report is sorted in ascending order by start date, followed by coupon. Once the appropriate structure is determined, read across to view the sensitivity analysis that has been performed on the advance.

If you have any questions or would like further explanation of this analysis, contact the Money Desk at 1-800-357-3452.

Start Date	Maturity Date	Next Call Date	Coupon	-300	-200	-100	Base	+100	+200	+300	+400
12/14/1998	12/16/2013	12/16/2013	5.390	101.153	101.153	101.153	101.129	100.918	100.708	100.499	100.291
12/14/1998	12/16/2013	12/16/2013	4.890	101.046	101.046	101.046	101.022	100.811	100.601	100.392	100.184
12/15/1998	12/16/2013	12/16/2013	4.880	101.044	101.044	101.044	101.020	100.809	100.599	100.390	100.182
1/7/2000	1/7/2015	10/7/2013	5.950	107.669	107.669	107.669	107.113	105.813	104.539	103.309	102.159
7/2/2004	7/2/2014	10/2/2013	3.990	103.048	103.048	103.048	102.814	102.055	101.307	100.570	99.844
12/13/2004	12/15/2014	12/13/2013	3.320	104.067	104.067	104.067	103.567	102.375	101.293	100.458	99.949
9/1/2005	9/1/2015	12/1/2013	4.130	108.042	108.042	108.042	106.883	104.931	103.025	101.162	99.343
9/30/2005	9/30/2015	12/30/2013	4.440	109.003	109.003	109.003	107.752	105.711	103.720	101.776	99.880
10/26/2005	10/26/2015	10/26/2013	4.540	109.533	109.533	109.533	108.197	106.081	104.018	102.006	100.043
1/17/2006	1/19/2016	10/17/2013	4.080	109.531	109.531	109.531	107.914	105.671	103.650	101.960	100.720
4/24/2006	4/25/2016	10/24/2013	4.440	111.568	111.568	111.568	109.541	107.022	104.736	102.776	101.248
5/5/2006	5/5/2016	11/5/2013	4.350	111.454	111.454	111.454	109.390	106.865	104.589	102.658	101.172
5/5/2006	5/5/2016	11/5/2013	4.530	111.928	111.928	111.928	109.855	107.307	104.991	103.000	101.435
5/15/2006	5/16/2016	11/15/2013	4.350	111.587	111.587	111.587	109.472	106.918	104.616	102.663	101.156
5/15/2006	5/16/2016	11/15/2013	4.520	112.040	112.040	112.040	109.916	107.340	104.999	102.987	101.408
5/19/2006	5/19/2016	11/19/2013	4.510	112.051	112.051	112.051	109.913	107.330	104.985	102.970	101.391
6/12/2006	6/13/2016	12/12/2013	4.620	112.666	112.666	112.666	110.406	107.752	105.339	103.257	101.611
6/26/2006	6/27/2016	12/26/2013	4.730	113.151	113.151	113.151	110.818	108.112	105.643	103.497	101.775
7/24/2006	7/25/2016	10/24/2013	4.660	113.319	113.319	113.319	110.852	108.091	105.585	103.422	101.702
7/28/2006	7/28/2016	10/28/2013	4.490	112.871	112.871	112.871	110.399	107.655	105.182	103.071	101.423
8/25/2006	8/25/2016	11/25/2013	4.350	112.808	112.808	112.808	110.206	107.423	104.937	102.846	101.241
10/10/2006	10/10/2013	10/10/2013	4.250	100.118	100.118	100.118	100.115	100.088	100.061	100.035	100.008
10/12/2006	10/15/2013	10/15/2013	4.500	100.187	100.187	100.187	100.183	100.143	100.103	100.062	100.022
11/6/2006	11/6/2013	11/6/2013	4.290	100.441	100.441	100.441	100.431	100.330	100.230	100.130	100.031
11/17/2006	11/18/2013	11/18/2013	4.350	100.592	100.592	100.592	100.578	100.444	100.311	100.178	100.045
11/24/2006	11/25/2016	11/25/2013	4.190	113.407	113.407	113.407	110.319	107.380	104.800	102.672	101.079
11/30/2006	12/2/2013	12/2/2013	4.350	100.761	100.761	100.761	100.743	100.570	100.398	100.227	100.056
12/1/2006	12/1/2016	12/2/2013	4.090	113.155	113.155	113.152	110.053	107.136	104.596	102.523	101.011
12/4/2006	12/5/2016	12/4/2013	4.080	113.168	113.168	113.149	110.042	107.119	104.576	102.502	100.994
12/5/2006	12/5/2016	12/5/2013	4.260	113.749	113.749	113.730	110.596	107.631	105.024	102.869	101.249
12/6/2006	12/6/2013	12/6/2013	4.400	100.819	100.819	100.819	100.799	100.615	100.433	100.250	100.069
12/8/2006	12/8/2016	12/9/2013	3.990	112.911	112.911	112.881	109.780	106.872	104.356	102.322	100.875
12/12/2006	12/12/2016	12/12/2013	3.990	112.956	112.956	112.910	109.798	106.881	104.357	102.319	100.869
12/12/2006	12/12/2016	12/12/2013	4.050	113.150	113.150	113.105	109.983	107.051	104.506	102.434	100.942
12/19/2006	12/19/2016	12/19/2013	4.190	113.686	113.686	113.614	110.450	107.470	104.861	102.713	101.115
12/20/2006	12/20/2013	12/20/2013	4.500	101.012	101.012	101.012	100.987	100.765	100.545	100.326	100.107
12/28/2006	12/28/2016	12/30/2013	4.250	113.989	113.989	113.882	110.684	107.671	105.024	102.834	101.187
12/28/2006	12/28/2016	12/30/2013	4.400	114.482	114.482	114.376	111.155	108.109	105.413	103.156	101.431
1/12/2007	1/12/2017	10/15/2013	4.420	114.732	114.732	114.557	111.307	108.236	105.521	103.251	101.513
1/16/2007	1/17/2017	10/16/2013	4.790	116.032	116.032	115.833	112.521	109.360	106.527	104.097	102.159
1/23/2007	1/23/2014	10/23/2013	4.490	101.434	101.434	101.434	101.386	101.073	100.761	100.452	100.145
1/29/2007	1/29/2014	10/29/2013	4.790	101.610	101.610	101.610	101.557	101.227	100.899	100.574	100.250
2/2/2007	2/2/2017	11/2/2013	4.690	115.906	115.906	115.630	112.153	108.726	105.424	102.242	99.566
2/20/2007	2/21/2017	11/20/2013	4.850	116.705	116.705	116.335	112.791	109.298	105.934	102.695	99.574
2/20/2007	2/21/2017	11/20/2013	4.390	115.120	115.120	114.770	111.427	108.283	105.522	103.224	101.472
2/23/2007	2/23/2017	11/25/2013	4.250	114.662	114.662	114.307	110.979	107.866	105.151	102.913	101.233
2/23/2007	2/23/2017	11/25/2013	4.350	115.007	115.007	114.650	111.306	108.166	105.416	103.131	101.396
3/16/2007	3/16/2017	12/16/2013	4.090	114.348	114.348	113.900	110.556	107.459	104.784	102.613	101.031
3/21/2007	3/21/2017	12/23/2013	4.220	114.863	114.863	114.385	111.005	107.862	105.127	102.885	101.212
3/23/2007	3/23/2017	12/23/2013	4.290	115.133	115.133	114.643	111.246	108.080	105.316	103.038	101.322
3/23/2007	3/23/2017	12/23/2013	4.290	115.133	115.133	114.643	111.246	108.080	105.316	103.038	101.322
4/9/2007	4/10/2017	10/9/2013	4.150	114.847	114.847	114.268	110.869	107.719	104.997	102.781	101.149
4/12/2007	4/12/2017	10/15/2013	4.250	115.228	115.228	114.634	111.211	108.030	105.263	102.993	101.296
4/13/2007	4/13/2017	10/15/2013	4.450	115.957	115.957	115.351	111.888	108.649	105.809	103.442	101.632
4/23/2007	4/23/2014	10/23/2013	4.620	102.631	102.631	102.631	102.481	101.913	101.353	100.810	100.322
4/27/2007	4/27/2017	10/28/2013	4.250	115.405	115.405	114.731	111.275	108.062	105.271	102.979	101.264
5/2/2007	5/2/2014	11/4/2013	4.590	102.728	102.728	102.728	102.568	101.976	101.392	100.831	100.335
5/4/2007	5/5/2014	11/4/2013	4.550	102.742	102.742	102.742	102.579	101.978	101.387	100.819	100.322
5/18/2007	5/18/2017	11/18/2013	4.190	115.432	115.432	114.656	111.168	107.943	105.158	102.887	101.202
5/22/2007	5/22/2017	11/22/2013	4.750	117.548	117.548	116.727	113.116	109.732	106.733	104.190	102.177
5/29/2007	5/30/2017	11/29/2013	4.250	115.795	115.795	114.962	111.422	108.158	105.336	103.021	101.286
6/1/2007	6/2/2014	12/2/2013	4.500	103.062	103.062	103.062	102.865	102.189	101.524	100.890	100.355
6/7/2007	6/7/2017	12/9/2013	4.820	118.020	118.020	117.114	113.456	110.032	106.997	104.416	102.366
6/8/2007	6/8/2017	12/9/2013	4.490	116.799	116.799	115.905	112.306	108.966	106.045	103.614	101.753
6/11/2007	6/12/2017	12/11/2013	4.490	116.849	116.849	115.932	112.324	108.975	106.049	103.613	101.749
6/18/2007	6/19/2017	12/18/2013	4.500	116.974	116.974	116.017	112.390	109.024	106.082	103.632	101.754
6/19/2007	6/19/2017	12/19/2013	4.650	117.540	117.540	116.574	112.917	109.510	106.511	103.993	102.023
6/22/2007	6/22/2017	12/23/2013	4.500	117.011	117.011	116.038	112.403	109.031	106.083	103.628	101.744

Start Date	Maturity Date	Next Call Date	Coupon	-300	-200	-100	Base	+100	+200	+300	+400
6/28/2007	6/28/2017	12/30/2013	4.500	117.086	117.086	116.079	112.430	109.045	106.087	103.623	101.733
7/13/2007	7/13/2017	10/15/2013	4.290	116.468	116.468	115.388	111.765	108.428	105.544	103.183	101.415
7/20/2007	7/20/2017	10/21/2013	4.290	116.551	116.551	115.430	111.792	108.442	105.547	103.176	101.399
7/27/2007	7/27/2017	10/28/2013	4.250	116.480	116.480	115.321	111.678	108.327	105.437	103.075	101.315
7/30/2007	1/30/2019	10/30/2013	3.990	121.589	121.589	117.141	112.620	108.690	105.443	102.906	101.109
7/31/2007	7/31/2017	10/31/2013	3.990	115.516	115.516	114.359	110.785	107.521	104.740	102.517	100.930
7/31/2007	7/31/2017	10/31/2013	3.990	115.516	115.516	114.359	110.785	107.521	104.740	102.517	100.930
7/31/2007	7/31/2017	10/31/2013	4.060	115.788	115.788	114.625	111.030	107.742	104.932	102.666	101.027
8/2/2007	8/4/2014	11/4/2013	4.490	103.841	103.841	103.841	103.562	102.713	101.884	101.108	100.448
8/2/2007	8/2/2017	11/4/2013	4.150	116.161	116.161	114.983	111.364	108.047	105.207	102.910	101.225
8/2/2007	8/2/2017	11/4/2013	4.050	115.771	115.771	114.602	111.010	107.729	104.932	102.691	101.080
8/9/2007	8/9/2017	11/12/2013	3.990	115.615	115.615	114.415	110.822	107.547	104.767	102.554	100.976
8/16/2007	8/16/2017	11/18/2013	3.990	115.693	115.693	114.457	110.845	107.555	104.766	102.543	100.953
8/17/2007	8/17/2017	11/18/2013	4.000	115.743	115.743	114.502	110.884	107.589	104.793	102.563	100.967
8/20/2007	8/20/2014	11/20/2013	4.250	103.825	103.825	103.825	103.523	102.631	101.754	100.891	100.044
8/28/2007	8/28/2014	11/29/2013	4.350	104.011	104.011	104.011	103.698	102.784	101.895	101.065	100.384
8/30/2007	9/2/2014	12/2/2013	3.890	103.641	103.641	103.641	103.321	102.397	101.506	100.713	100.143
9/4/2007	9/5/2017	12/4/2013	3.890	115.516	115.516	114.200	110.572	107.301	104.550	102.381	100.878
9/10/2007	9/11/2017	12/10/2013	3.690	114.779	114.779	113.458	109.881	106.680	104.019	101.974	100.618
9/11/2007	9/11/2017	12/11/2013	3.590	114.379	114.379	113.073	109.529	106.368	103.762	101.782	100.501
9/12/2007	9/12/2014	12/12/2013	3.690	103.557	103.557	103.557	103.221	102.272	101.370	100.592	100.063
9/13/2007	9/15/2014	12/13/2013	3.990	103.879	103.879	103.879	103.538	102.578	101.655	100.827	100.204
9/13/2007	9/13/2017	12/13/2013	3.990	116.003	116.003	114.630	110.956	107.630	104.816	102.573	100.984
9/27/2007	9/29/2014	9/27/2010	4.490	104.540	104.540	104.540	104.176	103.171	102.186	101.220	100.272
9/27/2007	9/27/2017	12/27/2013	3.650	114.781	114.781	113.377	109.782	106.566	103.905	101.865	100.524
10/11/2007	10/14/2014	10/11/2013	4.180	104.400	104.400	104.400	104.011	102.968	101.964	101.055	100.339
10/11/2007	10/11/2017	10/11/2013	3.990	116.314	116.314	114.786	111.068	107.705	104.863	102.602	101.000
10/15/2007	10/16/2017	10/15/2013	3.990	116.369	116.369	114.812	111.084	107.712	104.864	102.599	100.994
10/25/2007	10/27/2014	10/25/2013	4.360	104.747	104.747	104.747	104.336	103.253	102.204	101.241	100.456
10/26/2007	10/26/2017	10/28/2013	3.390	114.001	114.001	112.485	108.951	105.821	103.283	101.399	100.273
11/2/2007	11/3/2014	11/4/2013	3.990	104.422	104.422	104.422	103.999	102.902	101.856	100.935	100.262
11/2/2007	11/3/2014	11/4/2013	4.190	104.644	104.644	104.644	104.220	103.120	102.064	101.116	100.386
11/5/2007	11/5/2014	11/5/2013	3.990	104.444	104.444	104.444	104.017	102.915	101.863	100.937	100.260
11/5/2007	11/6/2017	11/5/2013	4.390	118.266	118.266	116.549	112.664	109.120	106.066	103.566	101.680
11/6/2007	11/6/2017	11/6/2013	3.480	114.480	114.480	112.901	109.319	106.147	103.559	101.622	100.416
11/9/2007	11/10/2014	11/12/2013	4.330	104.883	104.883	104.883	104.446	103.324	102.243	101.258	100.475
11/13/2007	11/13/2014	11/13/2013	3.350	103.806	103.806	103.806	103.366	102.256	101.240	100.436	99.990
11/19/2007	11/19/2014	11/19/2013	4.270	104.922	104.922	104.922	104.468	103.322	102.219	101.219	100.436
11/19/2007	11/19/2014	11/19/2013	3.750	104.323	104.323	104.323	103.870	102.733	101.661	100.737	100.115
11/19/2007	11/20/2017	11/19/2013	4.290	118.017	118.017	116.028	111.716	107.531	103.529	99.702	96.041
11/20/2007	11/20/2017	11/20/2013	3.740	115.707	115.707	114.015	110.294	106.976	104.221	102.093	100.666
11/23/2007	11/24/2017	11/23/2013	3.990	116.801	116.801	114.791	110.489	106.318	102.331	98.519	94.873
11/23/2007	11/24/2017	11/24/2013	3.990	116.801	116.801	114.791	110.489	106.318	102.331	98.519	94.873
11/29/2007	11/29/2017	11/29/2013	2.950	112.463	112.463	110.912	107.499	104.569	102.287	100.738	99.960
11/30/2007	11/30/2017	12/2/2013	3.190	113.485	113.485	111.871	108.341	105.282	102.849	101.101	100.133
12/10/2007	12/11/2017	12/10/2013	3.450	114.690	114.690	112.961	109.314	106.109	103.511	101.579	100.369
12/24/2007	12/26/2017	12/24/2013	3.990	117.156	117.156	114.946	110.553	106.300	102.238	98.356	94.647
1/3/2008	1/5/2015	10/3/2013	3.650	104.684	104.684	104.684	104.140	102.884	101.721	100.752	100.154
1/4/2008	1/4/2018	10/4/2013	3.360	114.531	114.531	112.696	109.064	105.883	103.321	101.441	100.316
1/7/2008	1/7/2015	10/7/2013	3.490	104.498	104.498	104.498	103.951	102.696	101.544	100.621	100.097
1/7/2008	1/8/2018	10/7/2013	2.590	111.229	111.229	109.598	106.371	103.637	101.619	100.356	99.973
1/8/2008	1/8/2018	10/8/2013	2.570	111.143	111.143	109.518	106.302	103.581	101.577	100.339	99.969
1/8/2008	1/8/2018	10/8/2013	2.640	111.446	111.446	109.797	106.538	103.771	101.714	100.405	99.970
1/11/2008	1/11/2018	10/11/2013	2.720	111.816	111.816	110.123	106.812	103.987	101.865	100.489	99.962
1/14/2008	1/16/2018	10/15/2013	3.240	114.120	114.120	112.243	108.649	105.515	103.018	101.211	100.217
1/16/2008	1/16/2018	10/16/2013	2.380	110.372	110.372	108.774	105.675	103.074	101.210	100.193	99.930
1/17/2008	1/17/2018	10/17/2013	2.250	109.811	109.811	108.265	105.252	102.743	100.987	100.119	99.919
1/18/2008	1/20/2015	10/18/2013	2.350	103.113	103.113	103.113	102.554	101.362	100.444	99.993	99.919
1/18/2008	1/18/2018	10/18/2013	2.290	109.992	109.992	108.424	105.382	102.842	101.047	100.137	99.916
2/14/2008	2/14/2018	11/14/2013	3.190	114.159	114.159	111.643	107.170	102.862	98.754	94.835	91.095
2/25/2008	2/26/2018	11/25/2013	2.420	110.822	110.822	109.071	105.859	103.193	101.271	100.158	99.765
3/7/2008	3/9/2015	12/9/2013	2.890	104.214	104.214	104.214	103.544	102.179	101.026	100.227	99.816
3/7/2008	3/7/2018	12/9/2013	3.550	115.964	115.964	113.777	109.947	106.595	103.866	101.819	100.510
3/14/2008	3/14/2018	12/16/2013	2.400	110.839	110.839	109.032	105.827	103.174	101.272	100.161	99.692
3/17/2008	3/19/2018	12/17/2013	3.300	114.950	114.950	112.765	109.029	105.795	103.212	101.334	100.203
4/14/2008	4/14/2015	10/14/2013	2.750	104.285	104.285	104.285	103.519	101.975	100.462	98.979	97.524
4/28/2008	4/28/2015	10/28/2013	3.250	105.191	105.191	105.191	104.396	102.871	101.533	100.513	100.005
4/28/2008	4/30/2018	10/28/2013	2.150	109.990	109.990	108.086	105.038	102.540	100.838	100.044	99.859

Start Date	Maturity Date	Next Call Date	Coupon	-300	-200	-100	Base	+100	+200	+300	+400
4/30/2008	4/30/2018	10/30/2013	3.740	117.379	117.379	114.352	109.623	105.071	100.738	96.612	92.682
5/2/2008	5/4/2015	11/4/2013	3.990	106.439	106.439	106.439	105.620	104.036	102.574	101.327	100.431
5/5/2008	5/5/2015	11/5/2013	3.170	105.124	105.124	105.124	104.315	102.788	101.469	100.490	99.997
5/19/2008	5/19/2015	11/21/2013	4.700	107.781	107.781	107.781	106.916	105.249	103.616	102.016	100.449
5/23/2008	5/23/2018	11/25/2013	3.270	115.404	115.404	112.887	109.068	105.782	103.174	101.283	100.176
6/24/2008	6/24/2015	12/24/2013	3.830	106.723	106.723	106.723	105.773	104.063	102.505	101.208	100.298
6/30/2008	7/2/2018	12/30/2013	3.690	117.793	117.793	114.307	109.409	104.705	100.234	95.984	91.942
7/10/2008	7/10/2014	10/10/2013	4.800	103.773	103.773	103.773	103.528	102.744	101.973	101.213	100.465
7/11/2008	7/11/2018	10/11/2013	3.750	118.176	118.176	114.619	109.690	104.958	100.461	96.187	92.123
7/14/2008	7/14/2015	10/15/2013	4.900	108.874	108.874	108.874	107.854	106.024	104.235	102.484	100.772
7/14/2008	7/16/2018	10/15/2013	2.500	112.152	112.152	109.715	106.340	103.536	101.504	100.295	99.939
7/14/2008	7/16/2018	10/15/2013	3.250	115.797	115.797	112.984	109.123	105.807	103.185	101.301	100.240
7/17/2008	7/17/2018	10/17/2013	3.750	118.238	118.238	114.635	109.690	104.943	100.433	96.147	92.073
8/15/2008	8/15/2018	11/15/2013	3.830	118.936	118.936	115.721	111.514	107.834	104.805	102.469	100.866
5/13/2009	5/13/2014	11/13/2013	4.000	102.500	102.500	102.500	102.327	101.706	101.097	100.531	100.101
5/11/2010	5/11/2015	5/11/2015	3.700	106.043	106.043	106.043	105.198	103.466	101.488	99.040	96.289
5/24/2010	5/26/2015	11/26/2013	2.250	103.768	103.768	103.768	102.899	101.247	99.630	98.046	96.495
6/15/2010	6/15/2015	12/15/2013	2.280	103.945	103.945	103.945	103.023	101.316	99.645	98.010	96.409
10/8/2010	10/8/2015	10/9/2012	2.250	104.612	104.612	104.612	103.356	101.340	99.372	97.453	95.580
12/27/2011	12/27/2021	12/29/2014	3.550	128.644	120.107	111.697	103.597	90.225	78.005	66.839	56.634
4/27/2012	4/27/2016	4/27/2013	1.430	103.733	103.733	103.733	101.724	99.192	96.735	94.351	92.038
4/30/2012	5/2/2016	4/30/2013	1.380	103.622	103.622	103.622	101.591	99.048	96.580	94.187	91.864
5/15/2012	5/15/2017	5/15/2014	-0.196	105.715	105.715	104.885	101.831	100.328	99.729	99.525	99.394
5/15/2012	5/15/2017	11/17/2014	-0.196	105.902	105.902	105.071	102.386	100.820	99.973	99.536	99.300
6/20/2012	6/20/2017	6/22/2015	1.630	106.152	106.152	105.110	100.855	95.371	90.143	85.158	80.404
7/16/2012	7/17/2017	7/16/2014	-0.182	104.880	104.880	103.673	101.183	100.251	99.990	99.936	99.935
7/18/2012	7/18/2018	7/20/2015	-0.184	107.470	107.470	103.933	101.287	100.123	99.518	99.253	99.145
7/19/2012	7/19/2017	7/21/2014	-0.184	105.149	105.149	103.930	101.250	100.245	99.979	99.923	99.918
10/1/2012	10/1/2019	4/1/2015	-0.086	109.728	107.839	102.411	100.555	99.870	99.612	99.542	99.532
10/5/2012	10/5/2017	10/6/2014	-0.076	104.630	104.630	102.943	100.890	100.211	99.971	99.909	99.884
3/8/2013	3/8/2018	3/9/2015	-0.012	105.124	105.124	102.539	100.731	99.900	99.477	99.210	99.001