

## **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 purchase 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
7/24/2006	7/25/2016	7/25/2016	4.660	100.324	100.324	100.324	100.298	100.231	100.163	100.096	100.029
7/28/2006	7/28/2016	7/28/2016	4.490	100.349	100.349	100.349	100.321	100.245	100.170	100.095	100.019
8/25/2006	8/25/2016	8/25/2016	4.350	100.677	100.677	100.677	100.613	100.462	100.311	100.161	100.012
11/24/2006	11/25/2016	8/24/2016	4.190	101.722	101.722	101.722	101.501	101.097	100.697	100.310	100.018
12/1/2006	12/1/2016	9/1/2016	4.090	101.750	101.750	101.750	101.515	101.095	100.679	100.292	100.000
12/4/2006	12/5/2016	9/6/2016	4.080	101.791	101.791	101.791	101.548	101.117	100.690	100.294	99.991
12/5/2006	12/5/2016	9/6/2016	4.260	101.870	101.870	101.870	101.627	101.196	100.769	100.362	100.039
12/8/2006	12/8/2016	9/8/2016	3.990	101.784	101.784	101.784	101.535	101.096	100.662	100.264	99.966
12/12/2006	12/12/2016	9/12/2016	3.990	101.829	101.829	101.829	101.570	101.121	100.676	100.268	99.960
12/19/2006	12/19/2016	9/19/2016	4.190	102.002	102.002	102.002	101.728	101.259	100.796	100.358	100.008
12/28/2006	12/28/2016	9/28/2016	4.250	102.137	102.137	102.137	101.843	101.350	100.863	100.399	100.020
12/28/2006	12/28/2016	9/28/2016	4.400	102.212	102.212	102.212	101.918	101.425	100.937	100.467	100.071
1/12/2007	1/12/2017	7/12/2016	4.420	102.406	102.406	102.406	102.077	101.544	101.017	100.514	100.111
1/16/2007	1/17/2017	7/18/2016	4.790	102.674	102.674	102.674	102.332	101.785	101.244	100.717	100.243
2/2/2007	2/2/2017	8/20/2016	4.690	102.827	102.827	102.827	102.446	101.855	101.271	100.694	100.123
2/20/2007	2/21/2017	8/20/2016	4.850	103.179	103.179	103.179	102.749	102.101	101.462	100.830	100.207
2/20/2007	2/21/2017	8/22/2016	4.390	102.878	102.878	102.878	102.448	101.802	101.167	100.573	100.119
2/23/2007	2/23/2017	8/23/2016	4.250	102.810	102.810	102.810	102.375	101.723	101.085	100.495	100.072
2/23/2007	2/23/2017	8/23/2016	4.350	102.876	102.876	102.876	102.441	101.789	101.149	100.552	100.105
3/16/2007	3/16/2017	9/16/2016	4.090	102.942	102.942	102.942	102.452	101.744	101.058	100.449	100.016
3/23/2007	3/23/2017	9/23/2016	4.290	103.170	103.170	103.170	102.660	101.932	101.223	100.576	100.085
4/9/2007	4/10/2017	7/11/2016	4.150	103.274	103.274	103.274	102.715	101.940	101.193	100.529	100.085
4/12/2007	4/12/2017	7/12/2016	4.250	103.376	103.376	103.376	102.812	102.031	101.275	100.594	100.113
4/13/2007	4/13/2017	7/13/2016	4.450	103.547	103.547	103.547	102.980	102.195	101.431	100.728	100.173
5/18/2007	5/18/2017	8/18/2016	4.190	103.747	103.747	103.747	103.085	102.207	101.364	100.614	100.098
5/22/2007	5/22/2017	8/22/2016	4.750	104.301	104.301	104.301	103.626	102.734	101.863	101.046	100.372
5/29/2007	5/30/2017	8/29/2016	4.250	103.943	103.943	103.943	103.248	102.337	101.460	100.674	100.119
6/7/2007	6/7/2017	9/7/2016	4.820	104.579	104.579	104.579	103.861	102.924	102.013	101.158	100.452
6/8/2007	6/8/2017	9/8/2016	4.490	104.278	104.278	104.278	103.558	102.621	101.717	100.892	100.259
6/18/2007	6/19/2017	9/19/2016	4.500	104.425	104.425	104.425	103.676	102.709	101.775	100.922	100.261
6/19/2007	6/19/2017	9/19/2016	4.650	104.572	104.572	104.572	103.823	102.854	101.916	101.047	100.350
6/22/2007	6/22/2017	9/22/2016	4.500	104.462	104.462	104.462	103.705	102.730	101.788	100.929	100.260
6/28/2007	6/28/2017	9/28/2016	4.500	104.537	104.537	104.537	103.764	102.773	101.815	100.941	100.259
7/13/2007	7/13/2017	7/13/2016	4.290	104.504	104.504	104.504	103.694	102.662	101.675	100.803	100.174
7/20/2007	7/20/2017	7/20/2016	4.290	104.588	104.588	104.588	103.760	102.707	101.699	100.809	100.173
7/27/2007	7/27/2017	7/27/2016	4.250	104.628	104.628	104.628	103.782	102.709	101.683	100.782	100.157
7/30/2007	1/30/2019	8/1/2016	3.990	110.462	110.462	110.462	108.082	105.591	103.367	101.556	100.376
7/31/2007	7/31/2017	8/1/2016	3.990	104.389	104.389	104.389	103.534	102.456	101.440	100.581	100.068
7/31/2007	7/31/2017	8/1/2016	3.990	104.389	104.389	104.389	103.534	102.456	101.440	100.581	100.068
7/31/2007	7/31/2017	8/1/2016	4.060	104.466	104.466	104.466	103.611	102.531	101.509	100.636	100.091
8/2/2007	8/2/2017	8/2/2016	4.150	104.588	104.588	104.588	103.728	102.641	101.613	100.727	100.137
8/2/2007	8/2/2017	8/2/2016	4.050	104.477	104.477	104.477	103.618	102.534	101.514	100.648	100.098
8/9/2007	8/9/2017	8/9/2016	3.990	104.488	104.488	104.488	103.612	102.510	101.476	100.605	100.069
8/16/2007	8/16/2017	8/16/2016	3.990	104.566	104.566	104.566	103.672	102.551	101.498	100.609	100.062
8/17/2007	8/17/2017	8/17/2016	4.000	104.589	104.589	104.589	103.692	102.568	101.511	100.618	100.065
9/4/2007	9/5/2017	9/6/2016	3.890	104.668	104.668	104.668	103.725	102.555	101.468	100.580	100.029
9/10/2007	9/11/2017	9/12/2016	3.690	104.489	104.489	104.489	103.534	102.355	101.276	100.434	99.940
9/11/2007	9/11/2017	9/12/2016	3.590	104.368	104.368	104.368	103.413	102.239	101.175	100.364	99.905
9/13/2007	9/13/2017	9/13/2016	3.990	104.876	104.876	104.876	103.914	102.718	101.598	100.665	100.060
9/27/2007	9/27/2017	9/27/2016	3.650	104.603	104.603	104.603	103.609	102.387	101.273	100.405	99.889
10/11/2007	10/11/2017	7/11/2016	3.990	105.187	105.187	105.187	104.156	102.885	101.700	100.714	100.111
10/15/2007	10/16/2017	7/15/2016	3.990	105.242	105.242	105.242	104.199	102.915	101.716	100.716	100.108
10/26/2007	10/26/2017	7/26/2016	3.390	104.548	104.548	104.548	103.488	102.207	101.075	100.245	99.939
11/5/2007	11/6/2017	8/5/2016	4.390	106.024	106.024	106.024	104.927	103.575	102.290	101.158	100.333
11/6/2007	11/6/2017	8/8/2016	3.480	104.775	104.775	104.775	103.688	102.377	101.212	100.353	99.950
11/19/2007	11/20/2017	11/19/2012	4.290	106.053	106.053	106.053	104.922	103.522	102.147	100.797	99.471
11/20/2007	11/20/2017	8/22/2016	3.740	105.277	105.277	105.277	104.153	102.786	101.538	100.549	99.998
11/23/2007	11/24/2017	11/23/2011	3.990	105.674	105.674	105.674	104.536	103.127	101.745	100.387	99.054

Start Date	Maturity Date	Next Call Date	Coupon	-300	-200	-100	Base	+100	+200	+300	+400
11/23/2007	11/24/2017	11/23/2011	3.990	105.674	105.674	105.674	104.536	103.127	101.745	100.387	99.054
11/29/2007	11/29/2017	8/29/2016	2.950	104.236	104.236	104.236	103.105	101.782	100.691	100.045	99.784
11/30/2007	11/30/2017	8/30/2016	3.190	104.590	104.590	104.590	103.450	102.097	100.936	100.162	99.828
12/10/2007	12/11/2017	9/12/2016	3.450	105.069	105.069	105.069	103.900	102.501	101.266	100.361	99.877
12/24/2007	12/26/2017	12/24/2012	3.990	106.029	106.029	106.029	104.813	103.317	101.850	100.411	98.999
1/7/2008	1/8/2018	7/7/2016	2.590	104.007	104.007	104.007	102.802	101.462	100.453	99.993	99.968
1/8/2008	1/8/2018	7/8/2016	2.570	103.976	103.976	103.976	102.771	101.436	100.432	99.984	99.963
1/8/2008	1/8/2018	7/8/2016	2.640	104.084	104.084	104.084	102.876	101.524	100.492	100.004	99.964
1/11/2008	1/11/2018	7/11/2016	2.720	104.231	104.231	104.231	103.011	101.635	100.566	100.028	99.954
1/14/2008	1/16/2018	7/14/2016	3.240	105.085	105.085	105.085	103.833	102.365	101.107	100.235	99.961
1/16/2008	1/16/2018	7/18/2016	2.380	103.735	103.735	103.735	102.524	101.213	100.275	99.956	99.907
1/17/2008	1/17/2018	7/18/2016	2.250	103.537	103.537	103.537	102.335	101.059	100.204	99.949	99.901
1/18/2008	1/18/2018	7/18/2016	2.290	103.606	103.606	103.606	102.398	101.108	100.223	99.951	99.903
2/14/2008	2/14/2018	2/14/2012	3.190	105.263	105.263	105.263	103.931	102.305	100.712	99.152	97.623
2/25/2008	2/26/2018	8/25/2016	2.420	104.073	104.073	104.073	102.764	101.348	100.344	99.892	99.713
3/7/2008	3/7/2018	9/7/2016	3.550	106.064	106.064	106.064	104.684	103.057	101.620	100.543	99.952
3/14/2008	3/14/2018	9/14/2016	2.400	104.146	104.146	104.146	102.805	101.371	100.358	99.848	99.599
3/17/2008	3/19/2018	9/19/2016	3.300	105.747	105.747	105.747	104.343	102.712	101.312	100.326	99.819
4/28/2008	4/30/2018	7/28/2016	2.150	103.995	103.995	103.995	102.569	101.118	100.195	99.913	99.838
4/30/2008	4/30/2018	4/30/2013	3.740	106.950	106.950	106.950	105.417	103.572	101.769	100.006	98.281
5/23/2008	5/23/2018	8/23/2016	3.270	106.285	106.285	106.285	104.714	102.930	101.409	100.354	99.886
6/30/2008	7/2/2018	6/30/2011	3.690	107.502	107.502	107.502	105.792	103.774	101.806	99.885	98.010
7/11/2008	7/11/2018	7/11/2012	3.750	107.718	107.718	107.718	105.980	103.936	101.943	99.998	98.100
7/14/2008	7/16/2018	7/14/2016	2.500	105.180	105.180	105.180	103.525	101.811	100.557	99.991	99.932
7/14/2008	7/16/2018	7/14/2016	3.250	106.734	106.734	106.734	105.017	103.114	101.510	100.379	99.962
7/17/2008	7/17/2018	7/14/2016	3.750	107.781	107.781	107.781	106.024	103.964	101.955	99.995	98.083
8/15/2008	8/15/2018	8/15/2016	3.830	108.255	108.255	108.255	106.424	104.365	102.522	101.052	100.161
12/27/2011	12/27/2021	12/29/2014	3.550	119.780	119.780	117.525	111.767	106.311	101.161	96.298	91.705
5/15/2012	5/15/2017	11/17/2014	1.950	101.728	101.728	101.728	101.080	100.216	99.368	98.534	97.714
6/20/2012	6/20/2017	6/22/2015	1.630	101.607	101.607	101.607	100.865	99.908	98.969	98.048	97.143
7/16/2012	7/17/2017	7/16/2014	1.720	101.825	101.825	101.825	101.014	99.981	98.966	97.967	96.985
7/18/2012	7/18/2018	7/20/2015	2.720	105.651	105.651	105.651	103.909	101.869	99.879	97.938	96.044
7/19/2012	7/19/2017	7/21/2014	1.690	101.802	101.802	101.802	100.987	99.948	98.927	97.923	96.935
10/1/2012	10/1/2019	4/1/2015	2.250	107.424	107.424	107.366	104.062	100.861	97.775	94.800	91.930
10/5/2012	10/5/2017	10/6/2014	1.630	102.092	102.092	102.092	101.088	99.838	98.609	97.400	96.212
3/8/2013	3/8/2018	3/9/2015	1.780	103.045	103.045	103.045	101.674	100.005	98.372	96.773	95.207
5/7/2014	5/7/2018	5/7/2015	1.760	103.304	103.304	103.304	101.779	99.951	98.164	96.417	94.709
10/16/2014	10/16/2018	10/17/2016	0.413	104.990	104.990	104.990	103.147	101.307	100.228	99.905	99.836
10/24/2014	10/24/2018	10/26/2015	1.740	104.088	104.088	104.088	102.067	99.789	97.573	95.417	93.318
10/24/2014	10/24/2018	10/26/2015	1.740	104.088	104.088	104.088	102.067	99.789	97.573	95.417	93.318
2/20/2015	2/20/2019	2/22/2016	1.790	104.798	104.798	104.798	102.377	99.781	97.264	94.823	92.454
3/26/2015	3/26/2019	3/29/2016	1.610	104.467	104.467	104.467	101.930	99.251	96.655	94.140	91.702
3/26/2015	3/26/2020	3/29/2016	1.590	106.028	106.028	105.510	101.755	98.143	94.678	91.353	88.161
6/29/2015	7/1/2019	6/29/2017	0.350	105.589	105.589	105.589	103.206	101.352	100.078	99.329	98.905
7/30/2015	7/30/2019	8/1/2016	0.347	105.495	105.495	105.495	102.465	100.299	99.833	99.741	99.655
8/14/2015	8/14/2025	8/14/2020	1.850	117.120	117.120	111.760	105.721	100.534	95.971	91.871	88.122
8/19/2015	8/19/2025	8/21/2017	0.990	109.174	109.174	105.934	102.463	100.049	98.346	97.028	95.884
8/25/2015	8/25/2020	8/25/2017	0.950	104.002	104.002	103.606	101.288	99.503	98.100	96.897	95.785
8/26/2015	8/26/2025	8/26/2020	1.750	116.253	116.253	111.018	105.065	99.941	95.418	91.343	87.604
9/14/2015	9/14/2020	9/14/2017	1.050	104.482	104.482	104.025	101.585	99.674	98.166	96.883	95.708
9/15/2015	9/16/2019	9/15/2016	0.304	105.432	105.432	105.402	102.228	100.201	99.618	99.391	99.186
9/18/2015	9/18/2020	9/18/2017	1.090	104.665	104.665	104.190	101.696	99.745	98.209	96.907	95.718
9/29/2015	9/30/2019	9/29/2016	0.310	104.979	104.979	104.923	101.758	99.976	99.481	99.229	98.986
10/2/2015	10/2/2020	10/2/2017	0.890	103.843	103.843	103.416	101.151	99.324	97.839	96.540	95.332
10/2/2015	10/2/2025	10/2/2020	1.690	115.869	115.864	110.647	104.687	99.532	94.965	90.836	87.042
11/6/2015	11/6/2020	11/6/2017	1.050	104.636	104.636	104.124	101.608	99.583	97.939	96.516	95.206
11/6/2015	11/7/2022	11/6/2018	1.400	109.024	109.024	107.130	103.275	100.031	97.258	94.800	92.545
12/4/2015	12/4/2025	12/4/2018	1.360	113.008	112.905	108.616	104.007	100.307	97.252	94.616	92.243

As of: **6/30/2016** Parallel-Shift Sensitivity Analysis for HLB-Option and Knockout Advances

Start Date	Maturity Date	Next Call Date	Coupon	-300	-200	-100	Base	+100	+200	+300	+400
12/8/2015	12/8/2020	12/8/2016	0.174	105.517	105.517	104.869	102.208	100.536	99.690	99.323	99.112
12/11/2015	12/12/2022	12/11/2017	0.145	109.509	109.509	107.033	103.492	101.212	99.663	98.629	97.917
12/15/2015	12/16/2019	12/15/2016	0.384	104.250	104.250	104.094	101.839	100.411	99.682	99.341	99.121
12/15/2015	12/15/2022	12/15/2017	0.134	109.488	109.488	107.000	103.475	101.267	99.854	99.005	98.505
12/18/2015	12/18/2020	12/18/2017	0.389	106.591	106.591	105.718	102.979	101.214	100.024	99.269	98.797
12/24/2015	12/24/2020	12/26/2017	1.250	105.686	105.686	105.044	102.222	99.940	98.084	96.490	95.037
12/24/2015	12/24/2025	12/24/2020	1.990	119.146	118.994	113.032	106.573	101.002	96.090	91.677	87.645
1/8/2016	1/8/2019	1/9/2017	1.120	102.868	102.868	102.868	101.270	100.070	99.310	98.746	98.234
1/12/2016	1/13/2020	1/12/2017	0.031	105.387	105.387	105.140	102.671	101.028	100.113	99.747	99.642
1/19/2016	1/19/2021	1/19/2018	1.150	105.314	105.314	104.672	101.922	99.665	97.799	96.169	94.669
1/19/2016	1/20/2026	1/22/2019	1.350	113.089	112.921	108.586	103.803	99.870	96.541	93.615	90.948
1/22/2016	1/22/2020	1/23/2017	0.035	104.130	104.130	103.898	101.715	100.419	99.800	99.581	99.505
1/29/2016	1/29/2021	1/30/2017	0.038	105.453	105.453	104.705	102.099	100.556	99.805	99.526	99.420
2/2/2016	2/2/2021	2/2/2018	0.037	105.849	105.849	104.901	102.298	100.730	99.711	99.107	98.770
2/17/2016	2/17/2021	2/17/2017	0.028	103.228	103.228	102.689	100.783	99.861	99.461	99.277	99.150
2/26/2016	2/26/2020	2/27/2017	0.065	103.500	103.500	103.261	101.196	100.039	99.464	99.194	99.027
2/26/2016	2/26/2021	2/26/2018	0.890	104.207	104.207	103.651	101.100	98.944	97.097	95.431	93.862
2/26/2016	2/26/2026	2/26/2021	1.490	114.599	114.361	109.254	103.209	97.918	93.178	88.857	84.862
3/8/2016	3/8/2023	3/8/2018	0.990	106.714	106.714	105.054	101.910	99.402	97.353	95.576	93.946
3/18/2016	3/18/2020	3/20/2017	0.039	104.636	104.636	104.310	101.907	100.356	99.458	98.984	98.702
4/5/2016	4/5/2021	4/2/2018	0.990	104.784	104.784	103.467	99.100	98.608	96.916	95.261	93.641
4/8/2016	4/8/2020	4/10/2017	0.031	103.253	103.253	102.941	101.058	100.090	99.655	99.506	99.465
4/12/2016	4/12/2021	4/12/2017	0.031	103.521	103.521	102.860	100.905	99.975	99.589	99.462	99.423
4/28/2016	4/28/2020	4/28/2017	0.034	103.838	103.838	103.465	101.360	100.182	99.583	99.330	99.221
4/28/2016	4/28/2021	4/28/2017	0.034	104.821	104.821	103.999	101.577	100.253	99.601	99.333	99.222
4/28/2016	4/28/2021	4/30/2018	0.034	105.809	105.809	104.427	101.623	100.101	99.239	98.797	98.579
5/2/2016	5/2/2023	5/4/2018	0.037	107.513	107.513	104.928	101.999	100.385	99.416	98.871	98.575
5/2/2016	5/4/2026	5/2/2017	0.037	107.680	107.449	104.281	101.519	100.145	99.525	99.274	99.157
5/5/2016	5/5/2021	5/7/2018	0.890	104.375	104.375	103.745	101.093	98.776	96.752	94.908	93.170
5/5/2016	5/5/2026	5/5/2021	1.490	114.881	114.535	109.311	103.121	97.684	92.805	88.352	84.237
5/6/2016	5/6/2026	5/8/2017	0.034	106.396	106.194	103.447	101.039	99.905	99.406	99.195	99.080
5/6/2016	5/6/2026	5/8/2017	0.341	106.428	106.225	103.478	101.070	99.936	99.438	99.226	99.111
5/10/2016	5/11/2026	5/10/2017	0.490	104.900	104.758	102.856	100.665	99.215	98.183	97.317	96.505
5/12/2016	5/12/2026	5/12/2017	0.490	104.902	104.759	102.855	100.659	99.205	98.170	97.299	96.482
5/13/2016	5/13/2026	5/15/2017	0.027	106.761	106.544	103.660	101.131	99.916	99.367	99.125	98.988
5/17/2016	5/17/2021	5/17/2018	0.028	105.395	105.395	103.969	101.285	99.842	99.014	98.567	98.318
5/20/2016	5/20/2026	5/22/2017	0.590	105.916	105.744	103.490	100.987	99.352	98.223	97.306	96.461
6/6/2016	6/6/2031	6/6/2017	0.590	108.935	107.195	104.175	101.266	99.358	98.042	96.990	96.037
6/8/2016	6/8/2026	6/8/2017	0.590	105.947	105.772	103.509	101.001	99.319	98.134	97.166	96.277
6/14/2016	6/16/2031	6/14/2017	0.490	107.433	105.952	103.376	100.834	99.162	97.986	97.015	96.116
6/16/2016	6/16/2026	6/18/2018	0.690	106.970	106.766	104.151	100.988	98.383	96.184	94.216	92.376
6/16/2016	6/16/2031	6/16/2021	1.210	118.361	115.092	108.857	102.126	96.392	91.342	86.788	82.607
6/24/2016	6/24/2026	6/26/2017	0.590	105.973	105.793	103.487	100.955	99.241	98.018	97.010	96.080
6/27/2016	6/27/2031	6/27/2018	0.690	110.490	108.459	104.932	101.326	98.500	96.189	94.162	92.287
6/27/2016	6/27/2031	6/27/2019	0.910	113.836	111.250	106.767	101.944	98.033	94.703	91.736	89.000
6/30/2016	6/30/2021	6/30/2017	0.590	102.991	102.991	102.471	100.536	99.085	97.955	96.967	96.034