

Flipper Advance Primer

I. Product Information

Characteristics

The Flipper advance is a LIBOR (London Interbank Offered Rate) indexed floating-rate advance that converts (“flips”) to a predetermined fixed rate if not canceled by FHLB Boston at the end of the lockout period.

The Bank offers “Bermudan” structures, which are cancelable at the end of the lockout period as well as on a quarterly or annual basis thereafter, and “European” structures, which are cancelable only at the end of the lockout period. Cancellation dates, whether Bermudan or European, are mutually agreed upon at the commencement of the Flipper advance. FHLB Boston can only “flip” the advance to a fixed rate at the end of the lockout period. For giving FHLB Boston that option, the member benefits by paying a rate that is below prevailing variable rate advances during the lockout period. Members choose the lockout period, the final maturity, the spread to LIBOR for the lockout period, and whether the advance is a Bermudan or European structure. A Flipper advance with a variable rate of LIBOR minus 30 basis points would have a higher fixed rate than an advance with the same structure (final maturity, lockout period, and Bermudan or European structure) having a variable rate of LIBOR minus 10 basis points. The spread to the variable rate in effect during the lockout period and the fixed advance rate after the lockout period (if flipped) are mutually agreed upon by the member and FHLB Boston at the time of the initial transaction.

The advance is non-amortizing and typically adjusts to either one- or three-month LIBOR during the lockout period. The interest rate can reset at a rate less than zero. If the advance is flipped at the end of the lockout period, the rate is fixed for the remaining term of the advance. Flipper advances are available with final maturities out to 20 years. Principal is due at maturity. Interest is calculated on an actual/360 basis, payable monthly on the second business day. In the event of a cancellation, principal and interest are due on the cancellation date. Typically, Flippers can be requested up until 1 p.m. and the funds will be available two business days after the trade date. Flipper advances have a \$2 million minimum, but smaller requests may be aggregated during special offerings conducted by FHLB Boston from time to time. Members may choose to prepay the Flipper at any time, subject to a fee, which may be substantially greater than those associated with Classic advances of the same maturity. Partial prepayments may be in amounts as small as \$100,000 and in intervals of \$100,000 thereafter.

How it Works

The table below indicatively demonstrates how a Flipper advance that has a one-time cancellation option (European) reacts in various interest rate environments. The example is a Flipper with a five-year term and a two-year lockout period (“5 yr/2 yr Flipper”). During the lockout period, the advance floats to three-month LIBOR less 35 basis points, adjusting on a quarterly basis. As an example, if three-month LIBOR were at 0.36 percent when the advance disburses, the initial advance rate would be 0.01 percent for the first three months. The advance would continue to adjust to three-month LIBOR less 35

basis points on a quarterly basis for the remainder of the lockout period. At the end of two years (the “lockout period”), FHLB Boston has a one-time option to either flip the advance to the predetermined fixed rate until final maturity or cancel the advance. The predetermined fixed rate in this case is 1.63 percent. At the end of the lockout period, if interest rates have risen, it is likely that FHLB Boston will cancel the advance. Conversely, if rates have fallen since disbursement, it is likely that FHLB Boston will flip the advance. Although current interest rates at the time of the flip option affect FHLB Boston’s decision, FHLB Boston will also consider such things as the shape of the yield curve, the time remaining to final maturity, and other variables when making the flip decision.

Parallel-Shift Sensitivity Analysis

The following table is intended to help you understand the risks of taking out a Flipper advance. The table illustrates the expectations for behavior in those interest rate environments. However, the table is not intended to be an indication of the future performance of the Flipper advance or of future interest rate trends associated with the Flipper advance.

**5 Yr/2 Yr Flipper Advance (European) LIBOR
-35 bp, Fixed at 1.63%, 3M LIBOR at 0.36%**

Rate change	3MLIBOR On cancellation day	Flipper advance rate Years 3 through 5
+200	2.36%	Canceled
+100	1.36%	Canceled
Unchanged	0.36%	Uncertain
-10	0.26%	1.63%
-20	0.16%	1.63%

As interest rates decline, the value of the Flipper advance to FHLB Boston increases and the advance would likely be flipped at a fixed rate for the remaining term to maturity. If interest rates are unchanged, it is uncertain whether FHLB Boston would cancel the advance. As interest rates rise, the value of the Flipper advance to FHLB Boston falls and FHLB Boston would likely exercise its option to cancel the advance.

Flipper advances with Bermudan structures would behave in the same manner as in the above table but would need to be reevaluated at each subsequent cancellation date.

II. Risks Associated with the Flipper and Other Considerations

With the Flipper advance, the member provides FHLB Boston with an option to flip the advance and an option or series of options to cancel the advance. When providing an option or series of options, it is important to understand the inherent risks and evaluate them as part of the member’s entire balance sheet. Members are familiar with providing options on the asset side of the balance sheet. Almost every residential mortgage loan on members’ balance sheets provides the customer with an option to prepay the loan without penalty. Many investment portfolios also contain callable bonds. As interest rates change, members should be aware that any strategy involving prepayable or callable assets funded with Flippers could result in margin pressures and requires active funds management. These options on both sides of the balance sheet result in opposite

call/cancellation profiles for the instruments. When interest rates rise, mortgage prepayments would likely slow and the portfolio would likely extend. Likewise, callable bonds also would extend because issuers would not exercise their call options. At the same time, FHLB Boston would likely cancel the Flipper if rates rise. If FHLB Boston exercises its option to cancel, the member must repay the advance, but may replace the advance with a new advance. The new advance may be for any structure and term to maturity agreed upon between the member and FHLB Boston, subject to FHLB Boston's Products and Solutions Guide. The rate on the new advance will be that in effect at the time the new advance is taken.

In a falling interest rate environment, the exact opposite would be likely to occur. Mortgagors, anxious to reduce their monthly payments, would likely prepay and refinance at lower rates. Furthermore, the issuers of callable bonds, who are using these instruments to hedge their own mortgage portfolios, would call the bonds from investors. The Flipper would likely be flipped to a fixed rate for the remaining term of the advance. This would generally be at higher than market rates and again, the member's margin could be compressed.

Members generally are attracted to the Flipper in a flat yield curve environment as a macro balance sheet funding tool to lower their cost of funds and enhance their net interest margin. While this results in a lower advance rate than otherwise could be achieved, it is important for the member to quantify the effects on their net interest margin. Flippers also require active management as interest rates change. Contact your Asset/Liability or financial advisor for strategies you could employ in different interest rate environments. As usage of this product increases, members should be able to quantify how changes in market rates would impact their net interest margin.

FHLB Boston has onsite financial strategists who can help members best decide what type of funding meets their specific needs. If you would like a strategist to put together an analysis, please call the strategists at 800-357-3452 or via email at strategies@fhldboston.com.

A member should review the [Products and Solutions Guide](#) prior to taking an advance so as to understand the terms of the contract and the prepayment provisions.

This statement does not purport to disclose all of the risks and other material considerations associated with Flipper advances. Members should not construe this disclosure statement as business, legal, tax, or accounting advice from FHLB Boston. Members should consult with their own business, legal, tax, and accounting advisers with respect to Flipper advances and should refrain from using a Flipper unless they have fully understood the terms and risks of the advance.