October 28, 2022

Minutes of the Telbor Committee meeting held on October 24 and 27, 2022

Committee members present:	Mimi Regev, Bank of Israel Markets Department (Committee Chairperson) Eyal Klein, Representative of ACI Israel (Forex) Ketty Cohen, Bank of Israel Markets Department
Other participants:	Ran Abraham, Mizrahi-Tefahot Bank Yossi Cuomo, Bank Hapoalim Heli Siman Tov, Bank Hapoalim Zach Sharon, Bank Leumi Ian Klotnick, Israel Discount Bank Rami Ugdan, First International Bank of Israel Shuki Hay, First International Bank of Israel Tsila Billet Blank, BOI Markets Department
Participated remotely in the meeting on October 27, 2022:	Ann Battle, Senior Counsel, Market Transitions & Head of Benchmark Reform, International Swaps and Derivatives Association, Inc. (ISDA) Jonathan Seymour, Data Strategy, Bloomberg

The issues that were discussed:

1. A proposed roadmap was presented. It includes the important stages in the process that was decided upon until the end of Telbor publication. It was conveyed that in a conversation between the Bank of Israel and LCH it appears that they will be ready to clear SHIR transactions at the end of the first quarter of 2023. It is therefore expected that this milestone will open the way to executing SHIR-derivatives transactions.
2. <u>The Fallback Rate (hereinafter, "FB")</u>: On the day that publication of the Telbor interest rate ceases, it will be necessary to adjust the existing transactions to the SHIR. ISDA has formulated a methodology that has been accepted (almost) across the board for adjusting derivatives transactions from an IBOR interest rate to a risk-free interest rate. According to it, the transactions will be adjusted to the new SHIR interest rate, compounded in arrears, throughout the fixing period by adding a spread adjustment. The methodology for calculating the spread adjustment examines the history of the gap for each tenor between the IBOR and the RFR compounded in arrears. The Spread Adjustment is calculated as the median, over a 5-year period, of the gaps noted above. For example, the median for 5 years for the 3-month Telbor is:

5-Year Median = {(3MTelborxd1-90DCompSHIRxd1)…(3MTelborxd5Y - 90DCompSHIRxd5Y)}

The median is calculated on a daily basis, where for each day an updated observation is added and the observation from the beginning of the period is removed. The gap between the Telbor and the Compounded SHIR has increased markedly in recent months, due to the notable change in the interest-rate environment. With that, this development has a small impact at this stage on the median as the calculation is based on a long period of stability in the gaps. The Spread Adjustment is calculated via Bloomberg, which was chosen by ISDA to serve as the Fallback Adjustment Vendor. The Spread Adjustment is updated daily, and is fixed conclusively on the date of the announcement of the (future) cessation of the publication of IBOR-type interest rates. A sensitivity analysis that was demonstrated, indicates that the median Spread Adjustment for the 3-month interest rate. was stable at zero, over the course of the next few months. Jonathan from Bloomberg presented the calculations that he carried out for the Telbor spread adjustment for each of the tenors for the period July 1, 2022 through September 23, 2022. He noted that as for most of the period of the past 5 years, the interest rate environment was stable and near-zero, it therefore turns out that the Spread Adjustment for nearly all tenors is zero. In the 12-month tenor, there is a Spread Adjustment that amounted to one basis point.
Ann from ISDA detailed the process of updating the ISDA's legal documents, which is set to be published in the middle of November. She also responded to participants' questions on the methodology formulated for the FB. She explained that the FB rate uses a 2-day backwards shift, so that on the fixing date, the interest rate paid is already known. She explained that the calculation methodology is included and explained in designated screens of Bloomberg, which will be published for the Telbor as well. She noted that the date of the announcement of the future cessation of Telbor is very sensitive, as on this date the spread adjustment will be determined from here on, going forward. The implementation of the FB protocol to existing Telbor transactions, that were executed before the publication date, has to be done by signing an adherence protocol that is published for all members, in order to ease the shift of existing transactions to the new interest rate.
In a vote held without the presence of the ISDA and Bloomberg participants, it was decided unanimously that the spread to be calculated for the SHIR interest rate for the purpose as a Fallback, will be based on the methodology that was implemented by ISDA for other IBOR interest rates. In this methodology, the Spread Adjustment is the median, over a 5-year period, of the gaps between the Telbor rate and the SHIR-compounded in arrears rate.
Mimi updated that the Bank of Israel was requested to write a letter to the ISDA regarding its recommendation for the FB for the Telbor rate and that a letter will be sent with a recommendation in line with this decision from the Markets Department Director Dr. Golan Benita, in order to complete the process vis-à-vis ISDA.

3. <u>Frequency of the interest rate calculation:</u> The participants discussed the decision that was reached on the calculation of the interest rate every 3 months relative to the generally accepted convention worldwide for other risk-free interest rates. To date, the Telbor has been calculated every 3 months but it could be that it is worthwhile considering a change to an annual calculation. It was decided that the participants will consider the matter and hold a discussion on the issue at the next Telbor meeting.

Decisions reached at this meeting:

It was decided that the spread to be calculated for the SHIR interest rate as needed for the Fallback Rate will be based on the methodology implemented by ISDA for other IBOR interest rates.

In this methodology, the Spread Adjustment is the median, over a period of 5 years, of the gaps between the Telbor rate and the SHIR-compounded in arrears.