Can We Get Rid of LIBOR?

In the current increasing interest rate environment, the debate about the controversial but nevertheless important benchmark has sparked off again. This is why, we thought it relevant to provide in the following article a refresher on the history and functioning of the London Interbank Offered Rate, as well as examine the possibility of the newly introduced indices to replace the long-lived LIBOR.

Brief Overview

LIBOR is the short term interest rate that banks in the London's money market are ready to borrow funds from each other on an unsecured basis. It is computed as an average of the quote submissions by the major players in the interbank market in each of the five currencies – USD, EUR, GBP, CHF, JPY, with maturities that range from overnight to 12 months.

In general, the benchmark rates provide a sense of stability in the financial markets for two main reasons. Firstly, the indexation of contracts to a benchmark rate for pricing these financial contracts helps to reduce complexity and promote standardisation. These range from lending rates, to mortgage and auto loans. Secondly, benchmark rates are also used to deal with balance sheet items as a discount rate. Here, for instance, we can use the discount rate in valuations for accounting purposes and for pricing instruments in the derivatives market. On the whole, as referenced by the Intercontinental Exchange Benchmark Administration (IBA) administering LIBOR since 2014, the total value of contracts using LIBOR as a benchmark rate is around $350tr. There are no comprehensive data about the exact number of contracts relying on LIBOR or the total notional, however it is estimated that IRS account for more than $220bn, exchange-traded interest rate futures for more than $30bn and FRA (forward rate agreements), syndicate loans and floating rate notes for another $50bn. Tens of billions of dollars of adjustable rate home mortgages depends on LIBOR, but it is impossible to come out with numbers here.

Scandal and Changes

One of the most significant scandals in the world of the financial markets hit the industry in 2008 – the manipulation of LIBOR by traders of an array of banks, some of which include Deutsche Bank, Barclays and UBS. This was made possible due to the way in which the rate is calculated. Indeed, the panel of banks is asked to provide the rate at which they would borrow funds in the interbank market prior to 11 am London time every day, for which the average is calculated. The scandal, however, saw bankers colluded while submitting their quotes, making moves that helped them gain enormous profits in other derivatives instruments.

However - since the scandal - the administration of the rate was moved from British Bankers' Association to IBA. Furthermore, several revisions to the calculation of LIBOR were proposed. In the article of October 2016, our colleagues have discussed in great detail the methodology behind LIBOR, so we encourage you to have a look at it for a deeper analysis: http://www.bsic.it/libor-rise-tale-two-laws. However, the key point here is the construction of a rate based on actual data – the number of transactions among the players in the market. This has not been fully implemented as of yet, and the system of using so-called banks' expert judgement, in the form of voluntary quotes, prevails (in 2015 only 30% of submissions were based on transaction volume). And largely due to the fact that interbank lending has decreased significantly following the financial crisis, the number of players has been increased to additionally include central banks, sovereign wealth funds, corporations, other non-bank financial institutions. Last but not least, the manipulation of the rate has been recognized as a criminal offence, in order to deter any attempt of repeating past mistakes.

Libor OIS Spread Widening

In 2016, Libor rose in response to money-market reforms, as the repatriation of cash held overseas brought U.S. firms to pull money from foreign dollar funds. Another possible reason is that the financial system is re-adjusting to a world of less Federal Reserve infused liquidity as the central bank unwinds its balance sheet and proceeds with tapering.

In 2017, Libor-OIS spread reverted back to lower level (15-20 bps), just to rise again at the beginning of 2018, and currently it's sitting at 60 bps, but this time analysts see no stress coming from basis swaps, which means that banks are not facing counterparty risks right now. Higher funding costs naturally follow higher LIBOR, which are expected to be compensated with higher revenues coming from increased fixed-income volume.

One might wonder where this unexpected rise comes from, as other indicators of financial stress did not rise as much as LIBOR. The answer could be in how the FED is tightening its balance sheet: indeed, the rolling-off of assets result in over-supply of Treasuries, which - if not welcomed by liquidity on the other side of the book - leads to higher yields of Treasuries and higher LIBOR. Tapering does not influence OIS directly and that's why it's unchanged.

Alternative Rates

Recognition of the long-term unsustainability of the current LIBOR is leading countries to seek for alternatives. In fact, in July 2017 the CEO of the Financial Conduct Authority Andrew Bailey proposed year 2021 as the date by which market is highly advisable to transition to a new stable benchmark.

1) **US**: Alternative Reference Rates Committee (ARCC) is considered as an alternative to the dollar-denominated LIBOR in the form of the Secured Overnight Financing Rate (SOFR). The latter, based on the overnight Treasury repurchase agreement market worth around $800bn, was published for the first time on the 3rd of April by the New York Federal Reserve and set at the level of 1.8%. The rate is fully transaction-based, is nearly risk-free and correlating closely with other money market rates. In addition, SOFR futures market is planned to launch on the 7th of May 2018. Currently, banks rely heavily on CME Group's Eurodollar futures market based on LIBOR for hedging swap transactions, so the new SOFR futures would provide a realistic alternative for developing substitute market.

2) **UK**: SONIA interest rate has been devised as a replacement for the sterling LIBOR. The new feature would be the addition of unsecured overnight transactions on top of those generated via brokers. The calculation of the final rate would be made by means of a volume-weighted trimmed mean, excluding the bottom and top 25% of the distribution. The new rate will start to be published on the 23rd of April.

3) **Europe**: although it is still in the middle of the consultation phase, the ECB is set on modernising the current EONIA rate in light of a failure of the rate to comply with the EU's Benchmark Reform. The new rate would reflect the borrowing costs of Euro area banks on unsecured overnight loans not only on an interbank, but on a wholesale level with their other financial counterparts. Current EONIA relies on voluntary single contributions of quotes from each bank, while the new proposed rate would be built on daily data submissions of banks under the Money Market Statistical Reporting (MMSR) regulation. The calculation procedure would be similar to that of Bank of England's SONIA using a volume-weighted mean with trimming applied at the lower and upper 25% of the rate distribution. Another important rate also administered by the European Money Market Institute (EMMI) is EURIBOR, which is a quote-based benchmark. Facing a problem similar to that of LIBOR, the EMMI has been carrying out verification tests to examine the applicability of the new fully transaction-based methodology. The outcomes, however proved that it would be impossible to do so under current market conditions due to decreased participation

in the interbank funding, and consequently higher activity in the wholesale market with non-bank institutions. For this reason, a hybrid methodology is being developed, with maximum possible reliance on real transactions, while also enlarging the scope of eligible transactions and counterparties.

Whatever the new benchmark rate will be, the following are some of the potential risks associated with substitution of the currently existing rate. One of them is that liquidity may dry up in the LIBOR market, and given the high volumes of LIBOR-referenced contracts, a possibility of a systemic risk will loom. In addition, a certain consensus will have to be agreed upon so that compensating spread between LIBOR and the new benchmark rate is fair and reflective of the original interest rate and credit risk embedded within LIBOR. Finally, rolling over the contracts with maturities ahead of the replacement would present an enormous challenge.

The rate however will still have to be kept in the coming years to serve as a reference rate before new benchmark is developed.

Tags: LIBOR, Improvements, Scandal, Interest Rates, Money Market