FAQ on Reference Rate Reform

May 2021

Frequently asked questions about the Reference Rate Reform

What led to a change of reference rates?

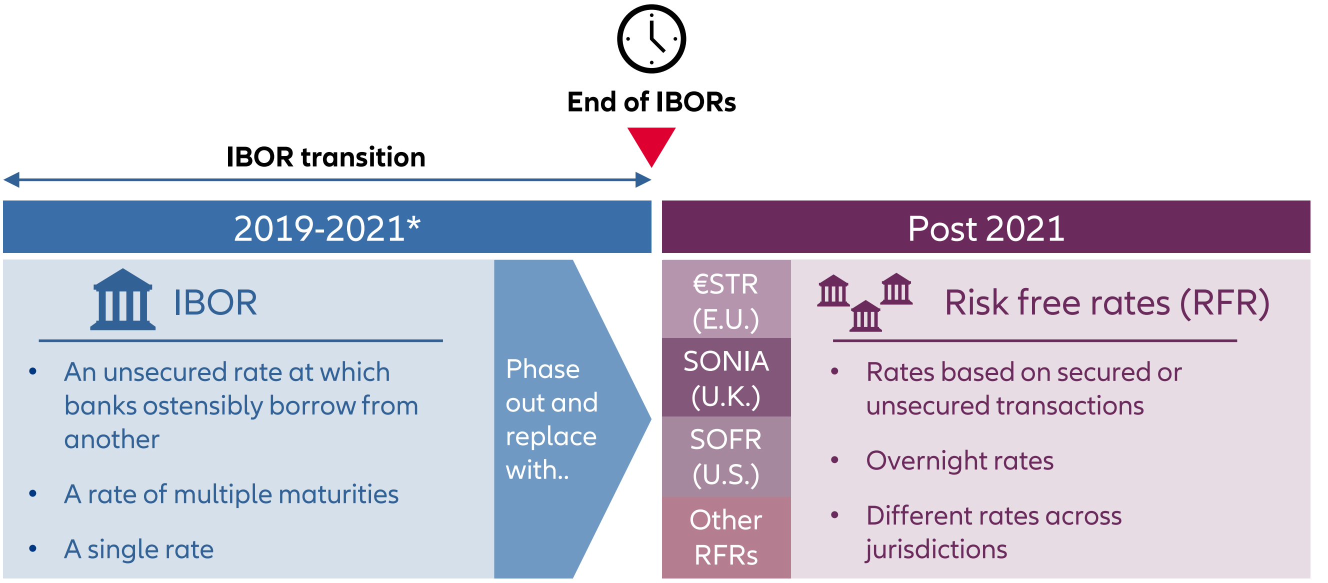
For more than 40 years, interbank offered rates (IBORs), especially the London Interbank Offered Rate (LIBOR), have been a fact of daily life for the global financial services industry. They have set the benchmark rate for lending on an unsecured basis, underpinning the worldwide trade in financial products – from bonds and loans to derivatives and mortgage-backed securities. A series of scandals has overshadowed the once dominant IBOR benchmark. In 2012, a group of banks was accused of manipulating their IBOR submissions during the financial crisis. In the wake of those scandals, the UK Financial Conduct Authority (FCA) shifted supervision of the index to the Intercontinental Exchange Benchmark Administration (IBA).

What was the outcome?

Regulators and industry bodies have proposed and agreed on new Alternative Reference Rates (ARRs) to replace IBOR rates that are anticipated to no longer be published or supported past the end of 2021. Hence interest rate benchmarks including the London Interbank Offered Rate (LIBOR), the Euro Interbank Offered Rate (EURIBOR), the Euro Overnight Index Average (EONIA) and certain other Interbank Offered Rates (IBORs) are being reformed.

Why is the transition important for Allianz Global Investors?

IBORs are embedded in the firm’s operating models. Transitioning to alternative rates will impact several parts of the value chain that may present a number of challenges for the industry and Allianz Global Investors (economic, legal, operational, regulatory, etc.). The new risk-free rates will be broad reaching across all industries that use or invest in interest rate linked products and affect a comprehensive set of financial instruments including fixed income securities, loans, and derivatives. The transition to these new rates will require significant efforts by all impacted functions to address the changes that are required.



* Postponement of the discontinuation date to June 2023 for LIBOR USD O/N, 1m, 3m, 6m and 12m.

Value. Shared.

What Allianz Global Investors is doing

Allianz Global Investors has initiated an enterprise-wide pre-study beginning of 2019 to assess the impact of IBOR discontinuation and to ensure a smooth transition from IBOR to the new ARRs. Subsequently, a global implementation project has been established. Allianz Global Investors investment professionals, responsible for the accounts in scope, decide on the transition from IBOR to ARR case by case, based on market development, instrument liquidity and vendors readiness. All required changes are then triggered and steered within the project and executed within established business processes.

What alternative benchmarks may replace the current IBORS?

Currency	IBOR Reference Rate	Alternative Reference Rate	Administrator
USD	USD LIBOR	SOFR (Secured Overnight Financing Rate)	Federal Reserve Bank of New York
EUR	EURIBOR	EURIBOR (reformed)	European Money Market Institute
EUR	EONIA	€STR (Euro Short Term Rate)	European Central Bank
GBP	GBP LIBOR	SONIA (Sterling Over Night Index Average)	Bank of England
CHF	CHF LIBOR	SARON (Swiss Average Rate Overnight)	Swiss National Bank
JPY	JPY LIBOR & TIBOR (JPY)	TONAR (Tokyo Overnight Average Rate)	Bank of Japan
HKG	HIBOR	HIBOR (reformed) / HONIA (Hong Kong Dollar Overnight Index Average)	Hong Kong Association of Banks / Treasury Market Association

When will the changes take effect?

The timing of the transition will vary by currency depending on the availability of the alternative reference rate and liquidity of the relevant markets. For example, in the UK, SONIA is already widely used as the reference rate for Sterling Overnight Indexed Swaps (OIS) and discounting for Sterling interest rate portfolios. By contrast, the new US rate SOFR, has not been published until the second quarter of 2018 and the publication of term rates for SOFR is not expected before the end of the transition periods in 2021.

What is €STR?

€STR stands for Euro Short-Term Rate (€STR) and it reflects the wholesale euro unsecured overnight borrowing deposit transactions reported by a group of euro-area banks to the European Central Bank (ECB). The ECB has been publishing €STR since 2nd October 2019 at 8.00 CET on each Target2 business day. From 15th April 2021, the ECB will start publishing compounded €STR average rates and a compounded index based on €STR.

Why is €STR based on unsecured market transactions, while the secured market may have provided a broader base?

The ECB decided to develop an unsecured rate, instead of a secured rate, for a number of reasons. €STR is intended to complement and serve as a backstop to existing critical benchmark rates such as the euro overnight index average (EONIA), which reflected the unsecured money market. In this respect, €STR should have features that would make it comparable to these rates.

Why is €STR only published the next day? What are the constraints preventing earlier publication of the rate?

The ECB rate is based exclusively on transaction-by-transaction data reported in accordance with the Money Market Statistical Reporting (MMSR) Regulation. The MMSR Regulation specifies that data shall be transmitted once per day to the ECB between 18:00 CET on the trade date and 07:00 CET on the first TARGET2 settlement day after the trade date. The complete dataset is therefore only available for the computation of €STR after 07:00 CET on the following TARGET2 day.

Who is impacted?

If the answer is **YES** to any to these questions, then it is very likely that you are impacted.
Approach your Client Account Manager / Allianz Global Investors contact to get more information.

Is the switch to a new alternative reference rate voluntary when it comes to EONIA?

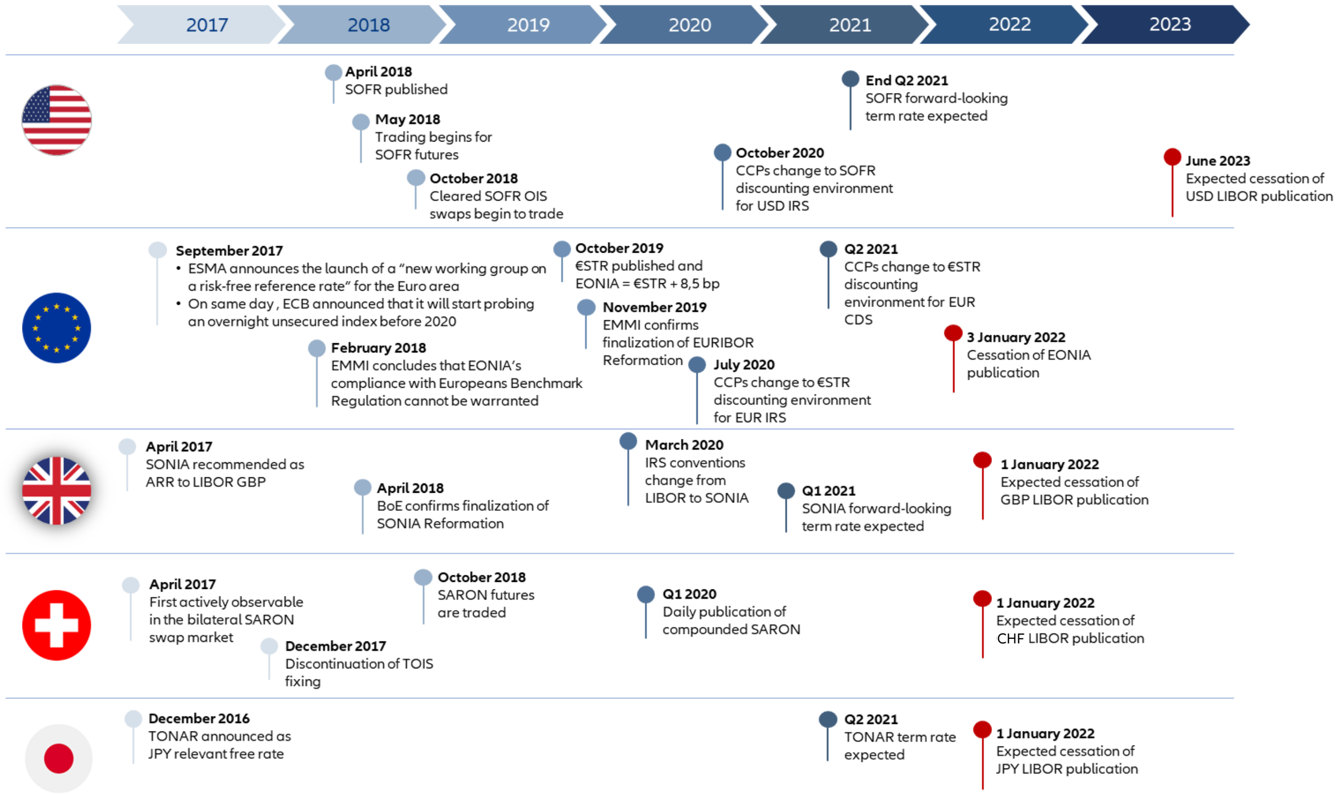
No. The Euro Overnight Index Average (EONIA) is critically important interest rate benchmarks for the Eurozone. EONIA will cease by 3rd January 2022 and be replaced by the €STR, because EONIA does not comply with the recently introduced EU Benchmarks Regulation.

What is the difference between €STR and EONIA?

Since 1st October 2019, EONIA methodology calculation has been reformed: EONIA is computed as €STR plus a spread of 8.5 basis points. The spread was calculated by the ECB on 31st May 2019 and reflects the historical difference between the two curves. Prior to that date, EONIA was calculated as a weighted average rate of voluntary submitted contributions of euro overnight unsecured lending transactions.

What about EURIBOR ?

The Euro Interbank Offered Rate (EURIBOR) represents the measure of banks' costs of borrowing in unsecured money markets. The rate administrator European Money Market Institution (EMMI) started in 2018 to work on the reformation of the EURIBOR calculation methodology to become compliant with the EU Benchmark regulation.
In 2019 EMMI gradually transitioned the quote-based EURIBOR methodology to the hybrid methodology. The implementation of the new methodology was completed by 28th November 2019. EURIBOR continue to be published daily on every TARGET day, at or shortly after 11:00 a.m. CET for each of the Defined Tenors (1 week, 1 month, 3 months, 6 months and 12 months). EURIBOR can be used after 1st January 2020 for existing or new contracts/instruments, and it will not be discontinued end of 2021 as other IBORs.



What is SONIA?

SONIA stands for Sterling Overnight Index Average and it is the preferred ARR to LIBOR GBP. SONIA reflects the overnight interest rate paid by banks in the British sterling unsecured market. It is based on actual transactions that have taken place the day before publication and calculated as a trimmed mean. SONIA was introduced in 1997 and then reformed in 2018 by Bank of England (BoE) who administrates the rate since 2016. From August 2020, BoE is also publishing SONIA Compounded Index to facilitate the transition away from LIBOR.

What is the difference between SONIA and LIBOR GBP?

SONIA and LIBOR differ in many characteristics. SONIA is an overnight rate transaction-based whereas LIBOR is based on daily submissions of estimated borrowing rates by a panel of banks. Moreover, LIBOR provides the cost of borrowing for different tenors (1 month, 3 month etc.). Finally, LIBOR is a forward-looking rate while SONIA is a backward-looking one. This means that SONIA cannot be determined until the end of an agreed interest period.

What is SOFR?

SOFR stands for Secured Overnight Financing Rate and it is the interbank overnight interest rate in the US secured market. SOFR has been identified by the Alternative Reference Rate Committee (ARRC) as the ARR to LIBOR USD. SOFR is transaction-based and calculated as a volume-weighted median. SOFR is administrated by the Federal Reserve Bank of New York and it is published since April 2018 each business day, on the New York Fed website at approximately 8:00 a.m. ET.

What is the difference between SOFR and LIBOR USD?

LIBOR is an estimation of the interbank borrowing rate whereas SOFR is based on observable transactions and for this reason considered more robust. In addition, LIBOR is a forward-looking term rate while SOFR is a backward-looking index. Then, the applicable interest is therefore not known until the end of the interest period. Finally, SOFR is a risk-free rate, while LIBOR includes the credit risk of borrowing from a bank.

What is SARON?

The Swiss Average Rate Overnight (SARON) is a rate which measures the conditions of the overnight transactions in the secured CHF money market. SARON was published for the first time in August 2009 and the Swiss National Working Group identified it as the replacement for LIBOR CHF. SARON is administrated by SIX Swiss Exchange and calculated as weighted average of transactions volume and binding quotes. It is continually calculated in real-time and published every 10 minutes. Three times a day (at 12 p.m., 4 p.m. and 6 p.m.) SIX Swiss Exchange conducts a fixing. The 6 p.m. publication is used as reference rate for derivative products and the valuation of financial assets.

What about HIBOR? And what is HONIA?

The Hong Kong Inter-bank Offered Rate (HIBOR) is the annualized rate charged for inter-bank lending on Hong Kong Dollar (HKD) denominated instruments for a specified period. HIBOR is released every day at 11:00 a.m. local time and it is a trimmed average based on contributed quotes of 20 banks determined by the Hong Kong Association of Banks (HKAB). In 2013 the HKAB together with the Treasury Market Association (TMA) started working on some fixing measures designed to enhance the transparency and robustness of the rate. Considering the new methodology in use, authorities announced there is no plan to discontinue HIBOR.

Following the Financial Stability Board (FSB) recommendation, TMA identified the Hong Kong Dollar Overnight Index Average (HONIA) as ARR to HIBOR. HONIA is a transaction-based index representing the overnight interbank funding rate and it is administrated by TMA. HONIA is way more volatile than HIBOR, this makes more difficult the application in long term loans.

HONIA and HIBOR will co-exist in the market and market participants are free to choose between them.

What is going to happen to TIBOR?

The Tokyo Interbank Offered Rate (TIBOR) is a forward-looking interest rate benchmark based on the interest rates at which banks offer to lend unsecured funds to other banks in the Japan interbank market.

TIBOR was first published in 1995 by the Japanese Bankers Association (JBA). In 2014, JBA TIBOR Administration took over the calculation and publication duties of the index and reformed it in 2017 to become compliant with new benchmark requirements. TIBOR is a quote-based index computed as trimmed average and released at 11:00 a.m. local time each business day.

Japanese authorities decided to continue publishing the JPY TIBOR as it is widely used in the domestic market, whereas it is possible that the Euroyen TIBOR will be discontinued.

What is TONAR?

The Tokyo Overnight Average Rate (TONAR) – also called TONA – is the unsecured interbank overnight interest rate and reference rate for Japanese yen. TONAR was identified in 2016 as ARR to LIBOR JPY by the Japanese working group on Risk-Free Reference Rates. TONAR is a transaction-based index calculated as volume-weighted average and published daily around 10 a.m. local time by Bank of Japan.

Japan will apply a multiple rate approach: domestic TIBOR and TONAR will co-exist in the market as benchmark reference rates.

What is the current market for the main ARRs?

The market liquidity looks different for each of the ARR. SONIA market for both, floating rate notes (FRNs) as well as for derivatives is the most liquid and active one. The main reason behind is that the market already existed prior to the IBOR discontinuation announcement.

The bond market for SOFR is picking up: more than 890 bn of FRNs have been issued as of end December 2020, while for the derivatives market there has been a positive trend in the adoption of SOFR futures and SOFR OIS but from a low base.

€STR bond market is less healthy and slightly behind the curve with only 5 bn FRNs over 7 issuances as of end 2020. It is a similar situation for the interest rate swaps space where there is very limited liquidity in fixed-float swaps linked to €STR. However, since the beginning of the 2021, there is a gradual introduction of variable rate instruments referenced €STR. Little by little, market participants, in particular asset managers, are switching to the €STR benchmark for short term OIS swaps.

When will term rates for the ARRs be available?

In December 2018, the Sterling Risk Free Rate Working Group invited interested benchmark administrators to make available free-to-use Beta SONIA Term Rates. Since mid-2020 three independent administrators - FTSE Russell, ICE Benchmark Administration and Refinitiv – are publishing SONIA forward-looking term rates with 1, 3, 6 & 12-month tenor. From January 2021, the working group has proposed to administrators to remove the "beta" tag from the term rates.

On September 2020, ARRC published a Request for Proposals (RFP) to select a potential administrator to publish forward-looking SOFR term rates. Publication is expected by end Q2 2021.

The Euro Area Working Group investigated different methods for calculating €STR forward-looking term rates and several potential administrators expressed interest in producing the term rates. However, the compulsory condition to produce a robust €STR-based term rate is to have a derivatives market which is sufficiently liquid.

For the time being, no forward-looking term rate for SARON will be determined and published as it is not feasible to produce a robust rate based on SARON derivatives market.

In Japan, QUICK Corp has been appointed as administrator for the calculation and publication for the Tokyo Term Risk Free Rate (TORF). First publication is expected by end Q2 2021.

What happens to the instruments with maturity longer than 2021?

For derivatives, ISDA has published the ISDA 2020 IBOR Fallback Protocol and Supplement to provide new fallback language to the instruments referring to LIBOR. Allianz Global Investors decided to follow ISDA best practice by adhering to the Protocol. Nevertheless, Allianz Global Investors plans to re-negotiate all the Collateral Services Agreements with the respective counterparties by end of 2021. Discounting curve and price alignment have been already migrated in 2020 from EONIA to €STR for cleared EUR denominated Interest Rates Swaps (IRS) and from Effective Federal Funds Rate (EFFR) to SOFR for cleared USD denominated IRS. Same transition is expected in Q2 2021 for the cleared credit instruments. Finally, cleared derivatives with LIBOR as reference rate will be moved to the new curves by central clearing counterparties (CCPs) in a big bang approach. This change will happen as close as possible to the respective LIBOR discontinuation dates.

The magnitude of impact on Floating rate notes (FRNs) depends on the fallback provision included in the respective agreements. Allianz Global Investors investment professionals have already reviewed the fallback language for all the FRNs maturing after the IBOR cessation dates. For all new issues, the fallback language is carefully reviewed and on occasions, Allianz Global Investors might engage with the issuer / issuing bank to get their opinion.

Disclaimer:

Investing involves risk. The value of an investment and the income from it will fluctuate and investors may not get back the principal invested. Past performance is not indicative of future performance. This is a marketing communication. It is for informational purposes only. This document does not constitute investment advice or a recommendation to buy, sell or hold any security and shall not be deemed an offer to sell or a solicitation of an offer to buy any security.

The views and opinions expressed herein, which are subject to change without notice, are those of the issuer or its affiliated companies at the time of publication. Certain data used are derived from various sources believed to be reliable, but the accuracy or completeness of the data is not guaranteed and no liability is assumed for any direct or consequential losses arising from their use. The duplication, publication, extraction or transmission of the contents, irrespective of the form, is not permitted.

This material has not been reviewed by any regulatory authorities. In mainland China, it is used only as supporting material to the offshore investment products offered by commercial banks under the Qualified Domestic Institutional Investors scheme pursuant to applicable rules and regulations. This document does not constitute a public offer by virtue of Act Number 26.831 of the Argentine Republic and General Resolution No. 622/2013 of the NSC. This communication's sole purpose is to inform and does not under any circumstance constitute promotion or publicity of Allianz Global Investors products and/or services in Colombia or to Colombian residents pursuant to part 4 of Decree 2555 of 2010. This communication does not in any way aim to directly or indirectly initiate the purchase of a product or the provision of a service offered by Allianz Global Investors. Via reception of his document, each resident in Colombia acknowledges and accepts to have contacted Allianz Global Investors via their own initiative and that the communication under no circumstances does not arise from any promotional or marketing activities carried out by Allianz Global Investors. Colombian residents accept that accessing any type of social network page of Allianz Global Investors is done under their own responsibility and initiative and are aware that they may access specific information on the products and services of Allianz Global Investors. This communication is strictly private and confidential and may not be reproduced. This communication does not constitute a public offer of securities in Colombia pursuant to the public offer regulation set forth in Decree 2555 of 2010. This communication and the information provided herein should not be considered a solicitation or an offer by Allianz Global Investors or its affiliates to provide any financial products in Brazil, Panama, Peru, and Uruguay. In Australia, this material is presented by Allianz Global Investors Asia Pacific Limited ("AllianzGI AP") and is intended for the use of investment consultants and other institutional/professional investors only, and is not directed to the public or individual retail investors. AllianzGI AP is not licensed to provide financial services to retail clients in Australia. AllianzGI AP (Australian Registered Body Number 160 464 200) is exempt from the requirement to hold an Australian Foreign Financial Service License under the Corporations Act 2001 (Cth) pursuant to ASIC Class Order (CO 03/1103) with respect to the provision of financial services to wholesale clients only. AllianzGI AP is licensed and regulated by Hong Kong Securities and Futures Commission under Hong Kong laws, which differ from Australian laws.

This document is being distributed by the following Allianz Global Investors companies: Allianz Global Investors U.S. LLC, an investment adviser registered with the U.S. Securities and Exchange Commission; Allianz Global Investors Distributors LLC, distributor registered with FINRA, is affiliated with Allianz Global Investors U.S. LLC; Allianz Global Investors GmbH, an investment company in Germany, authorized by the German Bundesanstalt für Finanzdienstleistungsaufsicht (BaFin); Allianz Global Investors (Schweiz) AG; Allianz Global Investors Asia Pacific Ltd., licensed by the Hong Kong Securities and Futures Commission; Allianz Global Investors Singapore Ltd., regulated by the Monetary Authority of Singapore [Company Registration No. 199907169Z]; Allianz Global Investors Japan Co., Ltd., registered in Japan as a Financial Instruments Business Operator [Registered No. The Director of Kanto Local Finance Bureau (Financial Instruments Business Operator), No. 424, Member of Japan Investment Advisers Association and Investment Trust Association, Japan];and Allianz Global Investors Taiwan Ltd., licensed by Financial Supervisory Commission in Taiwan.

Disclaimer: