TOKYO SWAP RATE (TSR)

METHODOLOGY CONSULTATION
REFINITIV LIMITED

Issue date: 19 April 2021
1. RESPONDING TO THIS CONSULTATION

1.1 Refinitiv is committed to transparency when developing or reviewing benchmark methodologies or considering material changes to its benchmarks. To that end, Refinitiv is seeking feedback from interested parties in relation to proposed developments to the Tokyo Swap Rate benchmark (‘TSR’). Refinitiv invites comments on all proposals put forward in this paper and in particular on the specific questions summarised in the appendix. Comments are most helpful if they:

- Respond to the questions stated
- Contain a clear rationale that includes evidence to support the views expressed
- Describe any alternative choices that Refinitiv should consider

1.2 To submit your comments, please email them to index_queries@refinitiv.com with ‘TSR Consultation’ in the email subject by no later than close of business on 14 May 2021. Please note that comments submitted after this deadline or submitted via other means may not be processed.

1.3 All responses to this consultation will be treated as confidential and will not be made public. A summary of key points on an anonymised basis may be made available by Refinitiv as appropriate.

2. INTRODUCTION

2.1 Refinitiv, a London Stock Exchange Group business, is a leading calculator and administrator of benchmarks and indices. Refinitiv benchmark products include the WM/Refinitiv® FX benchmarks, convertible bond indices and commodity indices. Within the interest rate asset class, Refinitiv administers products such as the Canadian Dollar Offered Rate (CDOR) and the Saudi Arabian Interbank Offered Rate (SAIBOR). In January 2021, Refinitiv® Term SONIA1, a family of GBP term rates based on OIS rates, was released as a regulated benchmark and in March 2021, the Alternative Reference Rates Committee (ARRC) in the USA announced that Refinitiv had been selected to publish its recommended spread adjustments and spread-adjusted rates for USD cash products2. Refinitiv administers benchmarks either directly under the IOSCO Principles for Financial Benchmarks or via its authorised subsidiary, Refinitiv Benchmark Services (UK) Limited (RBSL), under the UK Benchmark Regulation3.

2.2 Refinitiv calculates and administers the Tokyo Swap Rate (TSR), a Japanese yen (JPY) interest rate swap (IRS) benchmark family comprising benchmarks rates for JPY LIBOR (six-month) swaps with tenors from one year to 40 years and TIBOR (6-month) swaps with tenors from 1 year to 10 years. LIBOR TSR benchmarks are determined using input data from a panel of seven banks and TIBOR TSR benchmarks are determined using input data from a panel of five banks. Input data is supplied for swaps cleared by the Japan Securities Clearing Corporation (JSCC). LIBOR TSR is published at 10:30 and 15:30 Tokyo time, and TIBOR TSR is published at 15:30 Tokyo time, on each business day in Japan.

2.3 On 5 March 2021, the UK Financial Conduct Authority (FCA, the regulator of LIBOR) announced that most LIBOR benchmarks, including all Japanese Yen LIBOR settings, would cease to be published in their current form immediately after 31 December 20214. JPY IRS that reference JPY LIBOR continue to be traded following the announcement but it is widely expected that liquidity will migrate from JPY LIBOR IRS to JPY TONA OIS, where TONA is the overnight risk-free rate (RFR) for JPY5. Consequently, Refinitiv now proposes developments to the Tokyo Swap Rate benchmark.

2.4 This consultation paper provides details and invites feedback on three items:

1. The introduction of a new member of the TSR benchmark family for TONA OIS (TONA TSR)
2. The design of a fallback rate for use in products that currently reference JPY LIBOR TSR
3. The timing of the introduction and the display of the fallback to JPY LIBOR TSR

---

3. Following the UK’s withdrawal from the EU and the end of the transition period, the BMR has been onshored and brought into UK law (UK BMR). The BMR is Regulation (EU) 2016/1011 of the European Parliament and of the Council of 8 June 2016.
3. **TONA TOKYO SWAP RATE**

3.1 In March 2021, Refinitiv made indicative swap rates for TONA OIS available at times that correspond to the publication times of JPY LIBOR TSR (10:30 and 15:30 Tokyo time). These are displayed on Refinitiv® Eikon using the <JPYS=> RIC. Underlying RICs for individual tenors can be accessed from this display (see Figure 1) and the indicative rates are provided with data starting from October 2020. The indicative swap rates are not benchmarks and may not be used for any commercial purpose including, without limitation, as references in financial products (see the disclaimer on the Refinitiv Eikon display JPYSDISC for further information). The indicative swap rates are intended to facilitate the development of the TONA TSR benchmark and the fallback for the JPY LIBOR TSR. The indicative swap rates will not be published following the introduction of the TONA TSR benchmark.

![Figure 1: Indicative TONA Swap Rates (subject to disclaimer on JPYSDISC)](image1)

3.2 Swap rates against the compounded overnight TONA benchmark trade at a basis to swap rates against the forward looking six-month JPY LIBOR. Figure 2 illustrates this by comparing 10-year rates for JPY LIBOR TSR and the TONA indicative swap rates.

![Figure 2: JPY LIBOR 10Y TSR (in purple) and TONA 10Y Indicative Swap Rates (in orange) (February – March 2021)](image2)
3.3 The TSR benchmark is currently calculated using input data from a panel of banks (seven for JPY LIBOR TSR, five for TIBOR TSR). Global reforms to interest rate benchmarks have seen a move, where feasible, away from the use of dedicated contributions of input data and toward the use of more transparent data from more accessible markets and trading venues that is representative of actual transactions or where transactions may be executed. Consequently, the TONA TSR benchmark shall seek to use swap rate input data from trading platforms and venues that reflect current trading practices for JPY IRS.

3.4 Interdealer JPY IRS transactions are facilitated by the voice desks at interdealer brokers (IDBs) and indicative rates are published to the market. Interdealer electronic platforms as used for USD IRS trading are not currently available for JPY IRS. However, electronic dealer-to-client (D2C) platforms are active with both executable and indicative JPY IRS quotes.

3.5 In order to ensure a robust TONA TSR, Refinitiv is now considering use of both types of data in a waterfall methodology.

3.6 Refinitiv proposes that primary source for TONA TSR will be executable quotes from D2C electronic platform collected during two daily 30-minute collection windows: 10:00-10:30 and 15:00-15:30 Tokyo time. The 30-minute collection window is designed to be consistent with the current TSR collection window and achieves an optimum balance that produces a rate that reflects market conditions at a particular point in time while being a wide enough window to minimise any risk of short-term price movements negatively impacting the rate. During these collection windows, data will be snapped every 30 seconds. The precise time of capture within each 30-second period varies, enhancing the robustness of the methodology. Each set snap will be subject to a minimum volume and maximum bid-ask spread (neither of which will be disclosed to mitigate the risk of manipulation).

3.7 A mid-rate is calculated using the bid and offer rates from each snap resulting in up to 60 mid-rates for each dealer. The rate is then determined as the median rate of the mid-rates. The use of the median rate supports the stability of the rate as more than half of the mid-rates would need to be impacted by an event to influence the published rate.

3.8 The threshold for use of primary source in the determination of TONA TSR is that there must be at least six active dealers. In the event that there is insufficient data for the TONA TSR to use the primary source, Refinitiv proposes to adopt indicative quotes from interdealer brokers’ voice markets and electronic D2C platforms. This data will be collected during the same collection windows as the primary source and subject to 30-second snaps. Refinitiv, the administrator, will not exercise expert judgment in the determination of the TONA TSR.

3.9 The levels of the waterfall are summarised in the following table:

<table>
<thead>
<tr>
<th>LEVEL</th>
<th>INPUT</th>
<th>DESCRIPTION</th>
<th>MINIMUM THRESHOLD</th>
<th>DESIGN</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>D2C executable quotes</td>
<td>Executable quote from dealers on D2C electronic platform</td>
<td>At least six dealers active</td>
<td>30-minute window, median of not less than 360 snapshots (60 per dealer)</td>
</tr>
<tr>
<td>2</td>
<td>Indicative quotes from brokers and D2C</td>
<td>Indicative swap rates from IDBs and D2C</td>
<td>Indicative quotes from not less than two separate sources</td>
<td>30-minute window, median of not less than 120 snapshots (60 per source)</td>
</tr>
</tbody>
</table>

3.10 JPY LIBOR swaps have fixed and floating legs paying on a semi-annual basis. TONA OIS have fixed and floating legs paying on an annual basis. As the swap market moves from JPY LIBOR to TONA, the convention may change for TONA swaps, but there is no market consensus that this will happen yet and the data that is currently available would support a TONA TSR calculated on an annual basis only for its fixed and floating legs.

3.11 Comments and feedback are invited on the following questions.

Question 1:  Do you have a preference whether D2C executable quotes from an electronic platform or indicative quotes from voice-brokered markets are the primary or secondary source of data in the waterfall?

Question 2:  If the minimum threshold is not reached for the second level, should a ‘NO FIX’ be published or should the benchmark value for the relevant tenor or tenors from the previous business day be republished?

Question 3:  Data is sampled at a customised time within each 30-second interval. Do you believe there should be any adjustments to the sampling frequency? Please provide supporting rationale.

Question 4:  What other factors should Refinitiv consider when developing a TONA TSR benchmark (for instance, other sources of data)?
4. A Fallback Rate for JPY LIBOR TSR

4.1 Following the announcement from the FCA on 5 March 2021, most LIBOR settings, including all JPY LIBOR settings, will cease to be published in their current form immediately after 31 December 2021. At the same time, ISDA announced that the “fallbacks (i.e., to the adjusted risk-free rate plus spread) will automatically occur for outstanding derivatives contracts that incorporate the IBOR Fallbacks Supplement or are subject to adherence of the ISDA 2020 IBOR Fallbacks Protocol” after 31 December 2021 for all outstanding derivatives referenced to various LIBOR settings including JPY LIBOR.

4.2 The Refinitiv Tokyo Swap Rate is widely used in derivative and cash financial products. Interest rate swaps referencing JPY LIBOR continue to be traded following the FCA announcement, but activity is expected to cease once JPY LIBOR ceases to be published immediately after 31 December 2021. JPY LIBOR TSR will continue to be published during 2021 but will necessarily cease once underlying JPY LIBOR IRS activity stops. Consequently, a fallback rate is required for legacy products that currently reference JPY LIBOR TSR.

4.3 The design for such a fallback rate proposed by Refinitiv follows the same logic described in recent publications on swap rate benchmark fallbacks by the Working Group on Sterling Risk-Free Reference Rates in the UK and the Alternative Reference Rates Committee in the US. The floating leg of JPY IRS will fall back from six-month JPY LIBOR to compounded TONA in arrears plus a fixed spread adjustment. The fallback for the fixed swap rate benchmark (i.e., JPY LIBOR TSR) should be designed so as to match as closely as possible the present value of the floating leg after the underlying JPY LIBOR fallback has taken place.

4.4 Equation 1 equates the present value of the fixed and floating side of an IRS following the JPY LIBOR fallback to spread-adjusted compounded TONA in order to identify the JPY LIBOR TSR fallback, \( F_{6M}^{TSR} \). The fallback rate naturally matches the semi-annual and Act/365 conventions of JPY LIBOR TSR, whereas the ISDA fallback spread for six-month JPY LIBOR, \( S_{6M} \), is published using the semi-annual Act/360 convention of JPY LIBOR.

4.5 In equation 1, \( n \) is number of days in a semi-annual accrual period, \( m \) is the number of days from one business day to the next in the daily compounding of TONA, \( TONA \) is the daily TONA rate and \( d \) is the zero-coupon discount factor applicable for each semi-annual accrual period.

\[
\sum \frac{F_{6M}^{TSR} \cdot n_t}{365} \cdot d_t = \sum \left \{ \left [ \prod_{j} \left [ 1 + \frac{TONA_j}{365} \cdot \frac{m_j}{365} \right ] \right ] - 1 \right \} \cdot \frac{360}{n_{t}} + S_{6M} \cdot \frac{n_{t}}{365} \cdot d_{t}
\]

4.6 The compounded forward TONA rates when discounted and summed are equal to the present value of a semi-annual TONA OIS rate over the same semi-annual interest accrual periods, \( R_{6M}^{TONA} \). Consequently, equation 1 may be rewritten as equation 2 and, simplifying further, equation 3.

\[
\sum \frac{F_{6M}^{TSR} \cdot n_t}{365} \cdot d_t = \sum \frac{R_{6M}^{TONA} \cdot n_t}{365} \cdot d_t + \sum \frac{S_{6M} \cdot n_t}{365} \cdot d_t
\]

\[
F_{6M}^{TSR} = R_{6M}^{TONA} + \frac{365}{360} S_{6M}
\]

4.7 Semi-annual TONA OIS rates, \( R_{6M}^{TONA} \), are not available. However, following introduction of the TONA TSR rate, annual TONA OIS rates, \( TONAS^{12M} \), will be available. These may be used to derive implied semi-annual TONA OIS rates in accordance with equation 4.

\[
R_{6M}^{TONA} = 2 \cdot \left [ \left ( 1 + TONAS^{12M} \right ) - 1 \right ]
\]

7. www.isda.org/2021/03/05/isda-statement-on-uk-fca-libor-announcement
4.8 Therefore, two options are available for the introduction of the JPY LIBOR TSR fallback as shown below. The first simply uses the annual TONA TSR benchmark as a proxy for the unavailable semi-annual TONA OIS rate. The second applies equation 4 to correct for the difference in the compounding period.

Option 1

\[ P_{6M}^{TSR} = TSR_{12M}^{TONA} + S_{6M} \cdot \frac{365}{360} \]

Option 2

\[ P_{6M}^{TSR} = 2 \cdot \left[ \sqrt{1 + TSR_{12M}^{TONA}} - 1 \right] + S_{6M} \cdot \frac{365}{360} \]

4.9 If the market convention for TONA OIS rates changes in the future from an annual to a semi-annual basis, the TONA TSR benchmark would be reviewed and amended accordingly, permitting equation 3 to be used directly for the JPY LIBOR TSR fallback.

4.10 A comparison of the LIBOR TSR rates against the unadjusted TONA OIS rates (as described in 2.1 above) and also the adjusted TONA OIS rates (in accordance with Option 1 and Option 2 above) are shown in Figures 3, 4, 5 and 6 for the one-year, five-year, 10-year and 30-year tenors. In the current low-rate environment, there is negligible difference between Option 1 and Option 2 (and the difference cannot be seen in Figures 3-6). The principle difference is that Option 2, when expanded as a series, includes a square of \( TSR_{12M}^{TONA} \) and this leads to a difference between the two options in a higher-rate environment.

4.11 Table 1 shows the average, maximum and minimum spreads of (i) TONA OIS, (ii) JPY LIBOR TSR fallback (Option 1) and (iii) JPY LIBOR TSR fallback (Option 2), all over JPY LIBOR TSR and over the period from October 2020 to March 2021.

4.12 The ISDA fallbacks for LIBOR are based on the difference between each LIBOR setting and the corresponding RFR benchmark compounded over a period that matches the tenor of the LIBOR setting. Each fallback spread is taken as the median of this difference over a five-year period and has been fixed since the FCA announcement on 5 March 2021 regarding the cessation of LIBOR. The fixed fallback spreads are typically different to the spot spread between each LIBOR setting and the corresponding compounded RFR at the time of the FCA announcement. Consequently, the fixed rate for a swap that references LIBOR directly will typically be different to the fixed rate for a swap that references the ISDA fallback rate.

4.13 Figures 3-6 and Table 1 highlight the fact that the proposed JPY LIBOR TSR fallbacks are rates that relate to swaps that have fallen back from JPY LIBOR to the corresponding ISDA fallback rate. For this reason, the proposed JPY LIBOR TSR fallbacks are only intended for use after the cessation of JPY LIBOR (i.e., from immediately after 31 December 2021 onwards). Any publication of the proposed JPY LIBOR TSR fallbacks by Refinitiv on or before 31 December 2021 would be indicative and strictly for information only. Any such publication would include disclaimers to highlight this fact.
Figure 3: JPY Libor TSR, TONA Indicative OIS Rates and Adjusted TONA OIS Rates Options 1 and 2 (indistinguishable in the current rate environment), 1Y Tenor

Figure 4: JPY Libor TSR, TONA Indicative OIS Rates and Adjusted TONA OIS Rates Options 1 and 2 (indistinguishable in the current rate environment), 5Y Tenor
Figure 5: JPY LIBOR TSR, TONA Indicative OIS Rates and Adjusted TONA OIS Rates Options 1 and 2 (indistinguishable in the current rate environment), 10Y Tenor

Figure 6: JPY LIBOR TSR, TONA Indicative OIS Rates and Adjusted TONA OIS Rates Options 1 and 2 (indistinguishable in the current rate environment), 30Y Tenor
### Table 1: Average, Maximum and Minimum Spreads over JPY LIBOR for the Period 12 Oct 2020 to 24 Mar 2021 for TONA OIS Rates and the JPY LIBOR TSR Fallbacks with Option 1 and Option 2 (in basis points)

<table>
<thead>
<tr>
<th></th>
<th>TONA OIS minus LIBOR TSR (bps)</th>
<th>Fallback (Option 1) minus LIBOR TSR (bps)</th>
<th>Fallback (Option 2) minus LIBOR TSR (bps)</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Avg</td>
<td>Max</td>
<td>Min</td>
</tr>
<tr>
<td>1Y</td>
<td>-0.1</td>
<td>1.2</td>
<td>-1.3</td>
</tr>
<tr>
<td>18M</td>
<td>-1.4</td>
<td>-0.6</td>
<td>-3.3</td>
</tr>
<tr>
<td>2Y</td>
<td>-2.4</td>
<td>-1.6</td>
<td>-4.6</td>
</tr>
<tr>
<td>3Y</td>
<td>-3.4</td>
<td>-1.7</td>
<td>-5.4</td>
</tr>
<tr>
<td>4Y</td>
<td>-3.9</td>
<td>-1.9</td>
<td>-5.7</td>
</tr>
<tr>
<td>5Y</td>
<td>-4.2</td>
<td>-2.0</td>
<td>-6.2</td>
</tr>
<tr>
<td>6Y</td>
<td>-4.5</td>
<td>-2.1</td>
<td>-6.5</td>
</tr>
<tr>
<td>7Y</td>
<td>-4.7</td>
<td>-2.1</td>
<td>-6.8</td>
</tr>
<tr>
<td>8Y</td>
<td>-4.8</td>
<td>-2.1</td>
<td>-7.0</td>
</tr>
<tr>
<td>9Y</td>
<td>-4.9</td>
<td>-2.1</td>
<td>-7.1</td>
</tr>
<tr>
<td>10Y</td>
<td>-4.9</td>
<td>-2.3</td>
<td>-7.3</td>
</tr>
<tr>
<td>12Y</td>
<td>-4.9</td>
<td>-2.3</td>
<td>-7.4</td>
</tr>
<tr>
<td>15Y</td>
<td>-4.8</td>
<td>-2.1</td>
<td>-7.9</td>
</tr>
<tr>
<td>20Y</td>
<td>-4.8</td>
<td>-1.5</td>
<td>-8.1</td>
</tr>
<tr>
<td>25Y</td>
<td>-4.7</td>
<td>-1.1</td>
<td>-8.6</td>
</tr>
<tr>
<td>30Y</td>
<td>-4.7</td>
<td>-0.6</td>
<td>-9.0</td>
</tr>
<tr>
<td>35Y</td>
<td>-4.6</td>
<td>-0.6</td>
<td>-8.8</td>
</tr>
<tr>
<td>40Y</td>
<td>-4.6</td>
<td>-0.6</td>
<td>-8.6</td>
</tr>
</tbody>
</table>

4.14 In order to produce a fallback to JPY LIBOR TSR that equates to the extent possible the present value of the fixed and floating legs of a swap after the floating leg has fallen back to the ISDA spread-adjusted compounded TONA in arrears reference, Refinitiv proposes to use Option 2 for the methodology of the JPY LIBOR TSR fallback. This approach is consistent with the approach considered for GBP swap rate benchmark fallbacks. Comments and feedback on the following questions are invited.

**Question 5:** Are there any reasons for preferring Option 1 rather than Option 2?

**Question 6:** Are there any additional factors that Refinitiv should consider before selecting an option?

---

5. PUBLICATION OF RATES AND CESSATION OF JPY LIBOR TSR

5.1 The overview display for Tokyo Swap Rate on Refinitiv Eikon is <TSRINDEX>. The benchmark display for the JPY LIBOR TSR values on the Refinitiv Eikon page are <17143> and the tiles are <JPYTSRA=> and <JPYTSRP=>. The TIBOR TSR values are published on the Refinitiv Eikon page <27143> and the tile <JPYTSRT=>. Benchmark values are also published on individual RICs which can be accessed from the tiles.

5.2 Pending consideration of feedback to this consultation paper, Refinitiv intends to publish the TONA TSR benchmark and the JPY LIBOR TSR fallback rates on new Refinitiv Eikon pages and tiles and with links from the main display <TSRINDEX>.

5.3 Activity in JPY LIBOR interest rate swaps will end no later than the cessation of JPY LIBOR itself, which occurs immediately after 31 December 2021. Activity in JPY IRS may diminish prior to that date. The Cross-Industry Committee on Japanese Yen Interest Rate Benchmarks’ Sub-Group for the Development of Term Reference Rates proposed in March 2021 a target deadline of ‘no later than the end of September 2021’ for ceasing the initiation of new interest rate swaps referencing JPY LIBOR and maturing after the end of 2021 except for the purpose of risk management of existing positions. However, a need to maintain LIBOR swap benchmarks until the LIBOR cessation itself (from which point onwards fallback rates for the swap benchmarks are suitable for use) has been recognised.

5.4 Following the cessation of JPY LIBOR and the fallback of the JPY interest rate swap market, the JPY LIBOR TSR fallback rate would be available for use in legacy financial products that currently reference JPY LIBOR TSR. For the purposes of continuity, following a cessation of JPY LIBOR, it is possible to publish the JPY LIBOR TSR fallback rates on the existing JPY LIBOR TSR Refinitiv Eikon page <17143>, tiles and RICs. This would be in addition to ongoing publication of the fallbacks on dedicated pages, tiles and RICs.

5.5 Comments and feedback on the following questions are invited.

Question 7: Should Refinitiv continue to publish JPY LIBOR TSR up to 31 December 2021 (subject to the ongoing availability of input data from panel banks) to avoid a gap between the availability of JPY LIBOR TSR and the date from which the JPY LIBOR TSR fallback rates are intended for use (the intended use being from immediately after 31 December 2021 onwards)?

Question 8: The JPY LIBOR TSR fallbacks will be published on dedicated pages, tiles and RICs. Immediately following any cessation of JPY LIBOR TSR, should the fallback rates also be published on the JPY LIBOR TSR Refinitiv Eikon page, tiles and RICs, or should the fallbacks be published on dedicated pages, tiles and RICs only?

Question 9: What other factors relating to the cessation of JPY LIBOR TSR and the publication of the related fallbacks should Refinitiv consider?

---

6. CONSULTATION FEEDBACK AND NEXT STEPS

6.1 Feedback is invited from Tokyo Swap Rate stakeholders on the questions listed above or any other related points that stakeholders feel that Refinitiv should consider.

6.2 Refinitiv reserves the right to use such feedback and to take such actions as it deems appropriate in order to ensure ongoing alignment with international best practice in the administration of benchmarks and to maintain the integrity of TSR.

6.3 Feedback from stakeholders should be sent to index_queries@refinitiv.com and include ‘TSR Consultation’ in the email subject. Feedback is requested by close of business on 14 May 2021. All responses to this consultation will be treated as confidential and will not be made public.

6.4 Any decisions taken in due course by Refinitiv will be announced with a suitable notice period. A summary of key points on an anonymised basis may be made available by Refinitiv as appropriate.
APPENDIX: LIST OF QUESTIONS

TONA Tokyo Swap Rate

1. Do you have a preference whether D2C executable quotes from an electronic platform or indicative quotes from voice-brokered markets are the primary or secondary source of data in the waterfall?

2. If the minimum threshold is not reached for the second level, should a ‘NO FIX’ be published or should the benchmark value for the relevant tenor or tenors from the previous business day be republished?

3. Data is sampled at a customised time within each 30-second interval. Do you believe there should be any adjustments to the sampling frequency? Please provide supporting rationale.

4. What other factors should Refinitiv consider when developing a TONA TSR benchmark (for instance, other sources of data)?

A fallback rate for JPY LIBOR TSR

5. Are there any reasons for preferring Option 1 rather than Option 2?

6. Are there any additional factors that Refinitiv should consider before selecting an option?

Publication of rates and cessation of JPY LIBOR TSR

7. Should Refinitiv continue to publish JPY LIBOR TSR up to 31 December 2021 (subject to the ongoing availability of input data from panel banks) to avoid a gap between the availability of JPY LIBOR TSR and the date from which the JPY LIBOR TSR fallback rates are intended for use (the intended use being from immediately after 31 December 2021 onwards)?

8. The JPY LIBOR TSR fallbacks will be published on dedicated pages, tiles and RICs. Immediately following any cessation of JPY LIBOR TSR, should the fallback rates also be published on the JPY LIBOR TSR Refinitiv Eikon page <17143>, tiles and RICs, or should the fallbacks be published on dedicated pages, tiles and RICs only?

9. What other factors relating to the cessation of JPY LIBOR TSR and the publication of the related fallbacks should Refinitiv consider?
Refinitiv, an LSEG (London Stock Exchange Group) business, is one of the world’s largest providers of financial markets data and infrastructure. With $6.25 billion in revenue, over 40,000 customers and 400,000 end users across 190 countries, Refinitiv is powering participants across the global financial marketplace. We provide information, insights and technology that enable customers to execute critical investing, trading and risk decisions with confidence. By combining a unique open platform with best-in-class data and expertise, we connect people to choice and opportunity – driving performance, innovation and growth for our customers and partners.