



Consultation papers on draft RTS on i) RRAO, ii) gross JTD amounts, and iii) advanced economies, under the alternative SA for market risk

Public Hearing

29 April 2021 | Conference call

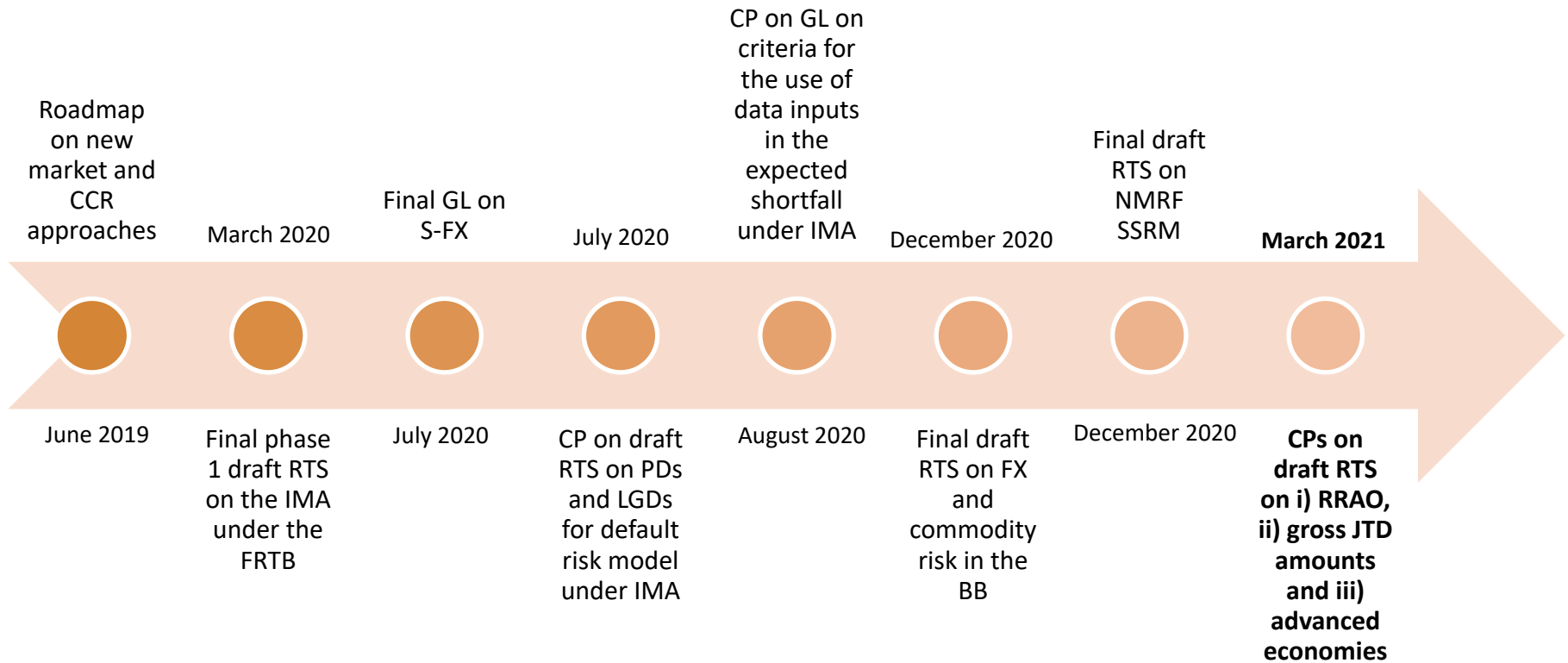
Public hearing structure

- **EBA staff to introduce:**
 - Recent cycle of EBA regulatory products in the area of market risk;
 - CP on RTS on RRAO;
 - CP on RTS on gross JTD amounts;
 - CP on RTS on advanced economies;
 - Next steps.
- **Q&A session.**

Suggestions for an efficient session

- **Should you need assistance or would like to intervene:**
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Recent cycle of EBA regulatory products in the area of market risk



Consultation paper on draft RTS on RRAO

Mandates and scope of the draft RTS

- The EBA is mandated, in Article 325u(5) of the CRR, to develop draft RTS to specify what an exotic underlying is and which instruments are instruments bearing residual risks for the purposes of Article 325u(2).
- When developing those draft RTS, the EBA shall examine whether longevity risk, weather, natural disasters and future realised volatility should be considered as exotic underlyings.
- The EBA shall submit those draft regulatory technical standards to the Commission by 28 June 2021.
- In terms of scope, the draft RTS are intended to cover instruments exposed to residual risks, which, according to Article 325u(2)(a) and (b), are:
 - instruments referencing an exotic underlying (i.e. trading book instrument referencing an underlying exposure not in the scope of the delta, vega or curvature risk treatments under the SbM or the OFRs for the default risk)
 - instruments bearing other residual risks (i.e. either i) instruments subject to the OFRs for vega and curvature risk under the SbM and that generate pay-offs that cannot be replicated as a finite linear combination of plain-vanilla options with a single underlying, or ii) instruments that are positions included in the ACTP)

Consultation paper on draft RTS on RRAO (2)



Specification of exotic underlyings

- The provisions laid down in point (a) of Article 325u(2) provide clear guidance for identifying instruments that reference exotic underlyings (see feedback from DP).
- Thus, the draft RTS do not further specify any of the elements of the provision in Article 325u(2)(a).
- After having examined the characteristics of longevity risk, weather, natural disasters and future realised volatility, the draft RTS confirm that all those underlyings should be considered as exotic underlyings.

Questions to stakeholders:

- **Q1.** Do you think that any of the elements constituting the conditions in Article 325u(2)(a) require additional clarification? If yes, which elements should be clarified?
- **Q2.** Do you think that the list of exotic underlyings should be extended beyond the ones mentioned in the CRR mandate (i.e. longevity risk, weather, natural disasters and future realised volatility)? If yes, which other exotic underlyings should be included?

Consultation paper on draft RTS on RRAO (3)



Specification of instruments bearing residual risks

- The provisions laid down in point (b) of Article 325u(2) provide clear guidance for identifying instruments bearing other residual risks (see feedback from DP).
- Thus, the draft RTS do not further specify any of the elements of the provision in Article 325u(2)(b).
- To complement the provision in Article 325u(2)(b) and to ensure harmonisation, the RTS additionally specify a non-exhaustive list of instruments bearing residual risks.
- The non-exhaustive list of instruments bearing residual risks included in the RTS should facilitate an immediate identification of a number of instruments exposed to residual risks.

Questions to stakeholders:

- **Q3.** Do you think that any of the elements constituting the conditions in Article 325u(2)(b) require additional clarification? If yes, which elements should be clarified?

Consultation paper on draft RTS on RRAO (4)

Non-exhaustive list of instruments bearing residual risks

1. Path-dependent options;
2. Options that start at a predefined date in the future;
3. Options whose underlying is another option (*Compound*);
4. Options with discontinuous pay-offs;
5. Options allowing the holder to modify the strike or other terms before maturity;
6. Options that can be exercised on a finite set of predetermined dates (*Bermudan*);
7. *Quanto* options;
8. Multi-underlying options (excluding the ones in points (c) and (d) of Article 3 RTS);
9. Options subject to behavioural risk (and meeting specific conditions).

Questions to stakeholders:

- **Q4.** Do you think that the terminology used in the non-exhaustive list of instruments bearing residual risks is clear? If not, please provide your views, including rationale and alternative terminology that it would be preferable to use.
- **Q5/Q6.** Do you think that the non-exhaustive list of instruments bearing residual risks should be extended (Q5) / reduced (Q6)? If yes, which other instruments should be included (Q5) / excluded (Q6)?

Risks that do not constitute by themselves residual risks

- Having in the RTS a list of risks that by themselves do not constitute residual risks helps to provide greater legal certainty and transparency around the scope of the RRAO.
- The draft RTS specify that the risks that by themselves do not imply an instrument to fall within the criteria set out in Article 325u(2)(a) and (b), are:
 1. Risk from a *cheapest-to-deliver* option;
 2. *Smile* risk;
 3. Correlation risk arising from index options or options in CIUs (and meeting specific conditions);
 4. Dividend risk (arising from instruments whose underlying does not consist solely of dividend payments);

Questions to stakeholders:

- **Q7.** Do you agree with the proposed approach for the treatment of correlation risk? If not, please provide your views, including rationale motivating your preference for an alternative treatment.
- **Q8.** Do you think that there are other products, not currently covered in these RTS (e.g. CMS derivatives), which are potential candidates for being covered in one of the parts of these RTS? Please provide your views, including rationale motivating the needs for such inclusions

Consultation paper on draft RTS on gross JTD amounts

Mandates and scope of the draft RTS

- The EBA is mandated, in Article 325w(8) of the CRR, to develop draft RTS to specify:
 - (a) how institutions are to determine the components $P\&L_{long}$, $P\&L_{short}$, $Adjustment_{long}$ and $Adjustment_{short}$ when calculating the JTD amounts for different types of instruments in accordance with this Article;
 - (b) which alternative methodologies institutions are to use for the purposes of the estimation of gross JTD amounts referred to in paragraph 7.
 - (c) the notional amounts of instruments other than the ones referred to in points (a) and (b) of paragraph 4.

EBA shall submit those draft regulatory technical standards to the Commission by 28 June 2021.
- In terms of scope, the draft RTS are intended to cover exposures included in the DRC for non-securitisations, as the mandate is specified in the Subsection 1 of Section 5 referring to the DRC rules for non-securitisations. On the contrary Subsection 2 and 3 specify respectively how to determine own funds requirements for the default risk for securitisations not included in the alternative correlation trading portfolio (ACTP), and own funds requirements for the default risk for securitisations included in the ACTP.

The Basel and CRR formulae for calculating gross JTD amounts

- The Basel formulae for calculating gross JTD amounts are:

$$JTD_{\text{long}} = \max(\text{LGD} \cdot N + \text{P\&L}, 0)$$

$$JTD_{\text{short}} = \min(\text{LGD} \cdot N + \text{P\&L}, 0)$$

- The CRR formulae for calculating gross JTD amounts are:

$$JTD_{\text{long}} = \max(\text{LGD} \cdot V_{\text{notional}} + \text{P\&L}_{\text{long}} + \text{Adjustment}_{\text{long}}, 0)$$

$$JTD_{\text{short}} = \min(\text{LGD} \cdot V_{\text{notional}} + \text{P\&L}_{\text{short}} + \text{Adjustment}_{\text{short}}, 0)$$

- The CRR formulae for the calculation of gross JTD amounts under the CRR are different from those employed under the Basel standards. Notably, the CRR formulae introduce the additional terms $\text{Adjustment}_{\text{long}}$ and $\text{Adjustment}_{\text{short}}$ which are not present in the Basel formulae for the calculation of gross JTD amounts as specified in MAR22.11.
- Nevertheless, regardless of the different formulae for gross JTD amounts under the CRR and the FRTB, their output for equivalent exposures should be equal to ensure alignment with international standards. In this regard, the draft RTS set out in the consultation paper propose a specification for the determination of gross JTD amounts under the CRR that is intended to result in outcomes equivalent to those under the Basel standards for equivalent positions.

Representation for gross JTD amounts in accordance with the draft RTS

- In accordance with the draft RTS, the formulae for the calculation of gross JTD amounts can be written in accordance with this representation:

$$\text{JTD}_{\text{long}} = \max(V_A - V_D, 0)$$

$$\text{JTD}_{\text{short}} = \min(V_A - V_D, 0)$$

- Under this representation, the gross JTD amount of an exposure to a debt or equity instrument is the difference between the market value of the instrument from which the exposure arises for the institution at the time of the calculation, and the market value of the instrument from which the exposure arises calculated under the assumption that, at the time of the calculation, the equity instrument experienced a full loss in value, or the debt instrument defaulted and experienced a prefixed (regulatory) recovery rate calculated with respect to the face value of the debt instrument.
- This representation is consistent with the definition of gross JTD amount in Article 325v(1)(c) of the CRR as “the estimated size of the loss or gain that the default of the obligor would produce for a specific exposure”.
- The specifications in the draft RTS for the determination of the components of the CRR formulae in accordance with the mandates are to consider the specifications in the CRR for the components V_{notional} , $\text{P\&L}_{\text{long/short}}$ and $\text{Adjustment}_{\text{long/short}}$.

Mandate in point (a) of Article 325w(8) of the CRR

- The draft RTS propose to determine the components $P\&L_{long}$, $P\&L_{short}$, $Adjustment_{long}$ and $Adjustment_{short}$ as follows:

$$P\&L_{long} = V_A - V_{notional}$$

$$P\&L_{short} = V_A - V_{notional}$$

$$Adjustment_{long} = -V_F$$

$$Adjustment_{short} = -V_F$$

Where:

- V_A is the market value of the instrument from which the exposure arises for the institution at the time of the calculation.
- V_F is the market value of the instrument from which the exposure arises for the institution calculated under the assumption that, at the time of the calculation, the equity instrument experienced a full loss in value, or the debt instrument defaulted and experienced a zero recovery rate (i.e. a full loss in value).
- $V_{notional}$ is equal to this same term in the CRR formula.

Mandate in point (c) of Article 325w(8) of the CRR

- The draft RTS propose to determine the component V_{notional} as follows:
 - For exposures to debt instruments classified as senior debt instruments, or covered bonds, V_{notional} shall be:

$$V_{\text{notional}} = \frac{V_D - V_F}{1 - \text{LGD}}$$

Where:

- V_D is the market value of the instrument from which the exposure arises for the institution, calculated under the assumption that, at the time of the calculation, the debt instrument defaulted and experienced a prefixed (regulatory) recovery rate, calculated with respect to the face value of the debt instrument, set to be 25% for senior debt instruments, and to 75% for covered bonds.
- V_F is the market value of the instrument from which the exposure arises for the institution calculated under the assumption that, at the time of the calculation, the debt instrument defaulted and experienced a zero recovery rate (i.e. a full loss in value).
- LGD is LGD as assigned to the debt instrument in accordance with Article 325w(3) of the CRR.
- For exposures to debt instruments classified as non-senior debt instruments, and for exposures to equity instruments, V_{notional} shall be zero.
- In accordance with Article 325w of the CRR the component V_{notional} shall be the notional amount of the instrument for a long exposure, and the notional amount of the instrument taken with a negative sign for a short exposure. The above formula should thus be taken with a negative sign for determining the notional amount of an instrument that constitutes a short exposure.

Mandate in point (b) of Article 325w(8) of the CRR

- The mandate in point (b) of Article 325w(8) of the CRR requires to specify which alternative methodologies institutions are to use for the purposes of estimating gross JTD amounts of those exposures mentioned in Article 325w(7) of the CRR, i.e. exposures to default risk arising from derivative instruments whose pay-offs in the event of default of the obligor are not related to the notional amount of a specific instrument issued by that obligor or to the LGD of the obligor or an instrument issued by that obligor.
- To ensure that those alternative methodologies are based on the same approach for calculating gross JTD amounts as for other exposures, the draft RTS set out in the consultation paper propose that the alternative methodologies should consist in estimating the gross JTD amount of an exposure as the difference between the market value of the instrument from which the exposure arises for the institution at the time of the calculation, and the market value of the instrument from which the exposure arises calculated under the assumption that the obligor defaulted at that time.
- If the obligor was already defaulted at the time of the calculation, and the market value of the instrument from which the exposure arises for the institution at that time already reflects the gain or loss resulting from the default of the obligor, an institution should set a value of zero to the gross JTD amount of the exposure, as the instrument would no longer be considered to constitute an exposure.

Treatment of exposures arising from instruments with multiple underlyings, indices and CIUs

- Section 3.4 of the consultation paper provides considerations regarding the calculation of gross JTD amounts for these exposures.
- For exposures arising from instruments with multiple underlyings (e.g. basket options), including when these are embedded in credit and equity indices (e.g. index options), a look through approach should be employed in accordance with Article 325ab(2) of the CRR.
- For exposures to CIUs, Article 325j of the CRR as introduced by Commission Delegated Regulation (EU) 2021/424 provides that:
 - Where the institution is able to look through the CIU, a look through approach should be employed.
 - Where the institution is not able to look through the CIU, it shall first take position to the maximum extent allowed under its mandate or relevant law in the exposures attracting the highest own funds requirements set out under the DRC Section and shall then continue taking positions in descending order until the maximum total loss limit is reached.
 - However, if the institution has a position in a CIU that tracks an index benchmark so that the annualised return difference between the CIU and the tracked index benchmark over the last 12 months is below 1% in absolute terms, ignoring fees and commissions, and regardless of whether the institution is able or not to look through the CIU, the institution may treat the position in the CIU as a position in the tracked index benchmark.
- Since those CRR requirements already specify how those exposures should be considered for determining gross JTD amounts, the draft RTS set out in the consultation paper do not include specific requirements for the determination of gross JTD amounts of exposures arising from instruments with multiple underlyings, indices, and CIUs.

Questions to stakeholders:

- **Q1.** Do you agree with the proposed specification for the determination of the components $P\&L_{long}$, $P\&L_{short}$, $Adjustment_{long}$ and $Adjustment_{short}$ of the CRR formulae for the calculation of gross JTD amounts? If not, please explain why and how you would determine those components for the exposures in scope of the mandate in point (a) of Article 325w(8) of the CRR, including the rationale for your proposal.
- **Q2.** Do you agree with the proposed specification for the estimation of gross JTD amounts of exposures in scope of Article 325w(7) of the CRR? If not, please explain why and how you would determine gross JTD amounts for those exposures, including the rationale for your proposal.
- **Q3.** Do you agree with the proposed specification of the notional amount of instruments for the purposes of the mandate in point (c) of Article 325w(8) of the CRR? If not, please explain why and how you would determine the notional amount of instruments falling in scope of the mandate, including the rationale for your proposal.
- **Q4.** Do you have any other comments that you wish to highlight on these draft RTS?

Consultation paper on draft RTS on advanced economies

Mandates and scope of the draft RTS

- The EBA is mandated, in Article 325ap(3) of the CRR, to develop draft RTS to specify what constitutes an emerging market and to specify what constitutes an advanced economy.
EBA shall submit those draft regulatory technical standards to the Commission by 28 June 2021.
- So called ‘advanced economies’ attract a lower risk weight for equity risk under the FRTB-SA. The distinction is not used anywhere else in the prudential framework.
- Buckets for sensitivities to equity risk in Table 8 of Article 325ap are defined based on criteria of liquidity (large vs. small market capitalisation) and volatility (taking into account the sector and the economy relevant for the equity).
- The distinction between small and large market capitalisation is common to the FRTB-SA and the FRTB-IMA and was specified in the final draft RTS on Liquidity Horizons for the IMA published on 27 March 20203.
- In contrast, the distinction between advanced economies and emerging markets is specific to the FRTB-SA. Institutions using the IMA will directly capture the real historical volatility based on historical data, without the need for any distinction between advanced economies and emerging markets.

Definition of market

- The identification of market economies to be considered as advanced or emerging is performed in accordance with the RTS on the definition of market (20 December 2013). Those RTS relate to the definition of the term 'market' to be applied for the calculation of the overall net position in equity instruments under the market risk standardised rules.
- According to those RTS:
 - the euro area constitutes a market
 - for non-euro Member States and third countries, the 'national jurisdiction' constitutes a market.

Basel list of advanced economies

- According to MAR 21.75, the advanced economies are Canada, US, Mexico, the euro area, the non-euro area western European countries (UK, Norway, Sweden, Denmark and Switzerland), Japan, Oceania (Australia and New Zealand), Singapore and Hong Kong.
- The FRTB list was published without the underlying criteria used being provided.
- The FRTB list has not been reviewed since its first version published on 14 January 2016.

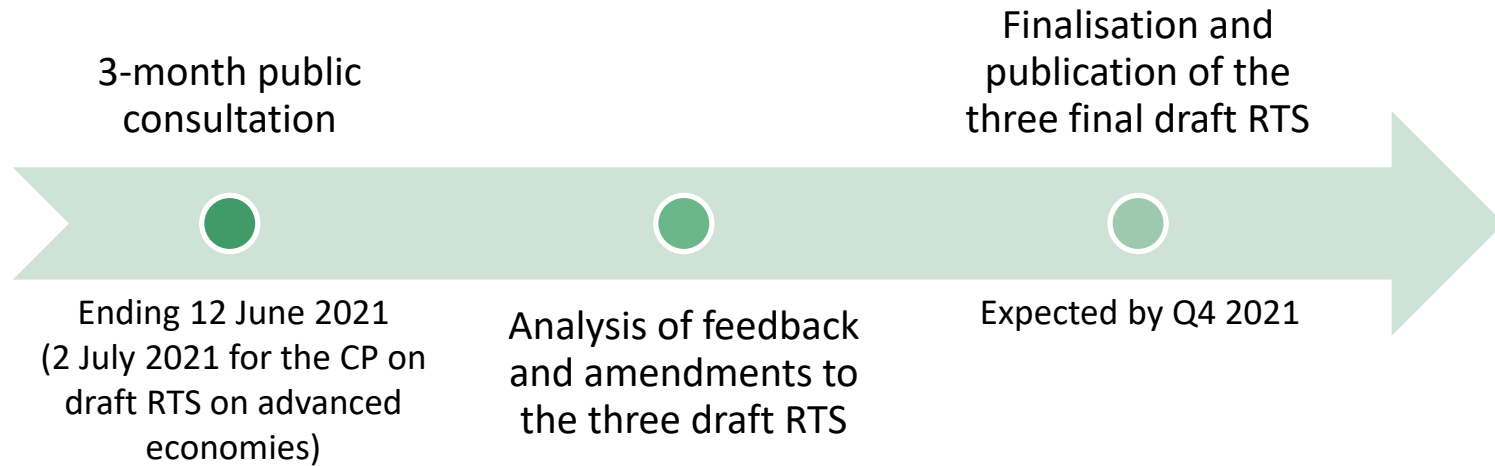
Proposed approach

- The CP replicates the FRTB list for the immediate purpose of the EU FRTB-SA reporting requirement. Although such proposal ensures alignment with international standards, the EBA considers that the list would benefit from a review before the FRTB comes into effect.
- The EBA would expect additional EU/EEA countries to qualify as advanced economies. In particular, the IMF recognises in its October 2020 IMF World Economic Outlook additional EU/EEA Member states as advanced economies. While it is expected that the criteria used in Basel should reflect prudential considerations, which are not necessarily part of the assessment conducted by other international organisations, the EBA generally considers that further EU/EEA Member states should be included as advanced economies in the Basel list.
- The CP seeks stakeholders' views on sources of data and criteria that could be used to identify advanced economies for the purpose of FRTB-SA equity risk own funds requirements, while maintaining a consistent treatment with how those own funds requirements would be calculated under the FRTB-IMA.
- The CP seeks stakeholders' views on whether being part of the Single Market, in particular in the perspective of the Capital Market Union, is an additional criteria that should be considered, when reviewing the Basel list.

Questions to stakeholders:

- **Q1.** Do you agree with the list provided in Article 1 or do you think that the EBA should propose an alternative list? In particular, do you think that there is a case for additional – or potentially all - EU/EEA countries to be added to the list? Please elaborate by providing technical evidence focusing on similarities and differences in risk across markets.
- **Q2.** What are the metrics, sources, and other criteria that should be used for potentially defining alternative criteria on which a list of advanced economies could be based? Please elaborate considering the context in which this definition this will be applied, i.e. assigning a lower/higher risk weight for equity risk.
- **Q3.** Do you think that there are markets of other countries that are characterised by a higher liquidity and lower volatility if compared to those included in Article 1, which as such should not trigger a higher risk-weight if compared to those of the countries listed in Article 1? Please elaborate providing evidence.

Next steps





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