ISDA Safe, Efficient Markets

Industry Feedback on Relevant Topics in the Application of the BCB FRTB Framework

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Executive Summary

The industry fully supports Banco Central do Brazil's (BCB) objective of implementing a robust, conservative, risk-sensitive and internationally consistent version of the Fundamental Review of the Trading Book (FRTB). Strengthening market risk capital requirements and enhancing supervisory comparability are fully aligned with international prudential goals.

However, certain aspects of the final rules implementing the FRTB Standardised Approach (SA) in Brazil introduce jurisdiction-specific requirements that materially increase operational and technological complexity – particularly for internationally active banking groups operating across multiple jurisdictions and maintaining globally integrated risk management, data, and capital calculation frameworks – without delivering a commensurate improvement in prudential soundness or supervisory insight.

This paper focuses on **four implementation** areas where targeted, proportionate adjustments could significantly enhance international consistency, operational resilience, and alignment between regulatory capital and effective risk management, while fully preserving supervisory control:

1. **Lack of optionality to use alternative sensitivities for regulatory capital purposes**, requiring banks to maintain parallel sensitivity calculation frameworks that are disconnected from internal risk management and governance practices
2. **Mandatory calculation of curvature risk for all instruments subject to delta risk**, including instruments that are linear by construction and do not embed optionality, resulting in significant computational and operational burdens with negligible risk insight.
3. **Jurisdiction specific methodological choices**, such as calendar conventions (BUS/252) and tenor definitions, that deviate from Basel standards and other major FRTB jurisdictions, increasing fragmentation and long-term maintenance costs for internationally active banks.
4. **Mandatory use of the BRL as the reference for FX shocks**, rather than allowing banks to use a common base currency, which diverges from international practice. This requirement necessitates parallel FX shock methodologies and duplicative system builds, particularly for internationally active banks, without changing the underlying economic risk captured by FX delta or curvature charges.
5. **Other implementation topics**, explained in detail in the body of this letter.

The industry believes that the recommendations set out in this paper are consistent with the spirit of the Basel framework and with practices adopted in other major jurisdictions, and would significantly improve the effectiveness, resilience, and international consistency of the Brazilian FRTB implementation.

In particular, the industry notes that the combined effect of several jurisdiction-specific deviations materially amplifies operational complexity and implementation risk. While each deviation may appear limited in scope in isolation, their combined impact necessitates the build and maintenance of parallel calculation frameworks, reduces economies of scale, and increases operational risk, without delivering commensurate prudential benefits.

These challenges are further compounded by expectations around high-frequency reporting, which significantly increase execution risk and resource strain compared with implementation approaches adopted in other jurisdictions[1].

The refinements proposed in this paper would preserve supervisory control, reduce unnecessary operational burden, and mitigate implementation risk, while ensuring that regulatory capital remains meaningfully aligned with how market risk is identified, measured, and managed in practice.

[1] Bank of England: *Permissions (CRR firms)*, https://www.bankofengland.co.uk/prudential-regulation/authorisations/capital-requirements-regulation-permissions

1. FRTB Standardised Approach (RWA_{SENS})

1.1. Industry Proposals Under the FRTB Standardised Approach (RWA_{SENS})

1.1.1. Use of Alternative Sensitivities

Under the current Brazilian FRTB framework, the use of alternative sensitivities is not explicitly mentioned and is therefore understood to be disallowed. As a result, institutions are required to calculate market risk sensitivities strictly in accordance with the regulatory formulas prescribed by BCB. The use of alternative sensitivities – namely, sensitivities produced by internal risk management systems and used for daily risk monitoring, limits, and governance – is not permitted for regulatory capital purposes.

This requirement represents a deviation from the Basel framework, which allows banks the option to use alternative sensitivities. Importantly, all major jurisdictions – including the EU, UK, and US[2] – have permitted the use of alternative sensitivities, and most internationally active banks have adopted this approach[3]. For example, the ECB has clarified through public consultation that alternative definitions for delta and vega sensitivities may be used for selected risk classes, instrument classes, or instruments, alongside the regulatory definitions[4]. The EBA consultation also confirmed that minor methodological divergences are not considered fundamentally material, provided they are well-justified and constitute reasonable first-order risk approximations of risk.

In the absence of optionality to use alternative sensitivities in Brazil, banks would be required to maintain two parallel sensitivity calculation frameworks:

(i) a group-wide management sensitivity framework comprising of risk sensitivities calculated using pricing models and methodological formulations implemented by independent risk control units. These sensitivities are used for risk measurement and management, internal governance, and global capital calculations; and
(ii) a BCB-specific regulatory framework developed solely to meet local capital requirements.

This duplication significantly increases implementation and maintenance costs, systems complexity, reconciliation effort, and operational risk. It also fragments data, models, and control frameworks across jurisdictions, reducing efficiency, scalability, and operational resilience over time.

From a prudential perspective, prohibiting the use of management sensitivities weakens the intended linkage between regulatory capital and the way market risk is identified, measured, and controlled within

[2] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.
[3] International Swaps and Derivatives Association (ISDA). *ISDA Response to the PRA Consultation on Basel 3.1 Implementation (CP 16/22)*. ISDA, n.d., https://www.isda.org/a/hvJgE/ISDA-Responds-to-PRA-Consultation-on-Basel-3.1-Implementation.pdf.
[4] ECB Guide on options and discretions available in Union law, https://www.bankingsupervision.europa.eu/ecb/pub/pdf/ssm.supervisory_guides202507_ond.en.pdf

institutions. As set out in FAQ1 of MAR21.17[5], banks may use alternative formulations of sensitivities based on pricing models employed by independent risk control units to report market risk or actual profit and loss to senior management, subject to demonstrating to supervisors that such formulations produce results closely aligned to the prescribed methodologies. In practice, market risk is actively managed using management sensitivities embedded in limits, escalation processes, and senior management oversight. When regulatory capital is driven by a separate and disconnected set of metrics, capital signals become less intuitive and less directly aligned with effective risk governance. Furthermore, the prudential governance framework surrounding alternative sensitivities is rigorous and comprehensive, encompassing the identification of appropriate alternative measures, documentation and validation processes, impact assessments, and data quality controls. These requirements ensure that the use of alternative sensitivities remains subject to strong supervisory oversight and internal governance standards.

The introduction of regulatory prescribed risk sensitivities would disrupt established internal quality controls and firm-level risk aggregation processes. Institutions have invested significantly in developing high-quality, stable sensitivity measures, and preserving these measures is critical for ensuring consistent and reliable risk assessment.

In addition, alignment between regulatory and internal sensitivities promotes operational efficiency. Recalculating sensitivities solely to satisfy regulatory requirements – when high-quality risk management sensitivities already exist – would introduce unnecessary operational burdens and increase complexity without offering commensurate prudential benefits.

Industry Recommendation:

BCB should allow the use of alternative sensitivities for regulatory capital purposes, subject to clearly defined supervisory safeguards and internal validation requirements.

Supervisory control could be preserved through ad-hoc or periodic benchmarking exercises defined at BCB's discretion. For example, BCB could specify a hypothetical reference portfolio and require institutions to calculate sensitivities using both the prescribed regulatory formulas and their management sensitivity frameworks. The resulting outputs could be reconciled and assessed against predefined tolerance thresholds.

Alternatively, the industry is willing to demonstrate, on a periodic basis and using real portfolios, that level there is no material difference in risk between prescribed and alternative sensitivities. Where supervisory resources are constrained, institutions would also be willing to utilise independent third-party auditors to review this analysis.

[5] Basel Committee on Banking Supervision. *Basel Framework: MAR 21 (Market Risk)*. Bank for International Settlements, 5 July 2024, https://www.bis.org/basel_framework/chapter/MAR/21.htm?inforce=20230101&published=20240705.

This approach would maintain transparency and comparability, materially reduce unnecessary technological duplication, and strengthen alignment between regulatory capital requirements and effective market risk management.

1.1.2. Scope and Operationalisation of Curvature Risk

The Brazilian FRTB implementation requires institutions, classified as Segments 1 and 2, to calculate curvature risk for all instruments subject to delta risk, without allowing institutions to assess whether curvature is economically relevant for instruments that do not embed optionality.

Within the Basel FRTB framework, curvature risk is designed to capture non-linear price responses under large market moves. For instruments that are linear by construction – such as many cash instruments and plain-vanilla linear derivatives – curvature is theoretically zero or economically immaterial. Requiring curvature calculations for such instruments obliges institutions to invest substantial technological and computational resources to generate metrics that are known ex-ante to have negligible informational value.

This burden is particularly relevant for equity (EQ), foreign exchange (FX), and commodity (CM) risk classes, where large volumes of linear positions would need to be processed solely to confirm the absence of curvature, resulting in higher computational costs in BAU processes.

Industry Recommendation:

BCB should make the calculation of curvature risk optional for instruments subject to delta risk. While some banks may prefer to calculate curvature risk for all instruments subject to delta risk, the Basel framework and implementations in other major jurisdictions require curvature only where it is consistent with the economic presence of optionality.

Specifically, the industry recommends that BCB adopt the following internationally consistent approach:

Require the calculation of curvature risk only for instruments that embed optionality or exhibit non-linear price behaviour, in line with the economic intent of the Basel FRTB framework and other major FRTB jurisdictions (i.e., EU, US[6], and UK). Linear instruments would be included if institutions elect to include them within the curvature risk calculation, subject to supervisory approval.

This optionality-based approach would ensure consistency with international practice, preserve risk sensitivity, and avoid the need to implement complex and resource-intensive curvature calculations for instruments where curvature is known ex-ante to be zero or immaterial.

[6] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.

1.1.3. Calendar Conventions

The Brazilian FRTB framework introduces jurisdiction-specific calendar conventions, including the use of a 252-day (business-day) basis instead of the calendar-day conventions commonly adopted in other jurisdictions.

For internationally active institutions, this jurisdiction-specific divergence requires the maintenance of parallel sensitivity allocation and tenor interpolation methodologies: one aligned with global group standards and other regulatory jurisdictions, and another specific to Brazil. While the use of a 252-day (business-day) basis versus calendar-day conventions is functionally equivalent from a risk measurement perspective – and has a negligible impact on risk metrics, aggregate capital, or RWA outcomes – the requirement to implement and operate a Brazil-specific framework materially increases system complexity, reconciliation effort, and long-term maintenance costs.

BCB initially considered tenor definitions without specific reference to calendar or business days, consistent with the BCBS approach. The subsequent introduction of a prescriptive calendar convention following the Public Consultation Notice nº 102/2024[7], represents a change that has limited prudential capital impact but significant implementation and operational implications. Therefore, the industry requests that the current tenor structure remain unchanged, allowing institutions to perform interpolation using either calendar day (i.e., 360- or 365-day basis) or business day (252-day basis) conventions, at each bank's discretion.

Industry Recommendation:

BCB should consider aligning tenor structures and calendar conventions with internationally adopted practices where feasible. BCB should consider allowing institutions to choose between a 252-day basis and a 360-/365-day basis.

1.1.4. Use of base currency as the reference currency for FX Shocks

The Brazilian regulation currently requires FX shocks to be defined relative to the local currency rather than allowing the use of a common reference or base currency such as the U.S. dollar (USD).

From an implementation standpoint, the use of the bank's base currency is an option that is proposed by many other jurisdictions. Mandating a Brazil-specific reference currency introduces additional complexity, particularly for foreign institutions and Brazilian banks with international operations, as it necessitates parallel FX shock frameworks and duplicative system builds.

[7] Banco Central do Brasil. *Sistema de Consultas Públicas e Outras Formas de Participação Social*. Banco Central do Brasil, n.d., https://www3.bcb.gov.br/audpub/HomePage?7.

Under a base-currency model, translation risk in currency pairs such as USD/BRL, as well as FX delta risk for all other currency pairs relative to the reporting currency, is properly identified and measured. This approach ensures that FX delta capital requirements reflect the underlying economic exposures without under- or over-stating risk. The same holds for the FX curvature component: non-linear P&L is generally computed in bank's base currency within their global systems and monitored against curvature metrics derived in the reporting currency. Allowing the use of a base currency such as USD ensures consistent measurement across delta and curvature risk, while maintaining alignment with established global practices.

Importantly, the choice of reference currency does not alter the underlying economic risk captured by the FX capital charge, provided the shocks are applied consistently. Allowing a base currency would therefore reduce implementation and compliance costs without undermining the prudential integrity of the framework.

Industry Recommendation:

Allow the option to use of a base currency other than BRL for FX shock calculations, subject to supervisory approval. This would significantly reduce implementation and compliance costs for both domestic and foreign institutions, without compromising the prudential objectives of the FX risk charge. This will also align the Brazil rules with Basel and all other major jurisdictions.

1.1.5. Other Relevant Topics

In addition to the major structural challenges already discussed, the industry has identified a number of further technical and interpretive issues arising from the Brazilian implementation of FRTB. While individually more limited in scope, these topics collectively present challenges from an implementation perspective and result in deviations from the Basel framework and other major FRTB jurisdictions that do not appear to deliver commensurate prudential benefits. These issues are outlined below.

1.1.5.1. Risk Mapping of Inflation Linked Products

A significant structural feature of the Brazilian financial market relates to the treatment of inflation risk factors, namely the existence and relevance of financial instruments – both public and private securities, as well as derivatives – whose cash flows and pricing are directly linked to the inflation coupon.

In the Brazilian market, instruments such as National Treasury Notes Series B (NTN-Bs) and related derivatives, including IPCA Coupon futures contracts (DAPs), are indexed to the IPCA inflation coupon, which represents the real interest rate. This real rate is widely recognized as a primary market risk factor and is treated as such under prevailing market conventions. Brazilian treasuries and risk control functions manage and monitor the risk of these instruments directly through sensitivities to the inflation coupon (real rate), rather than through a decomposition into nominal rates and implied inflation.

By contrast, in international markets – particularly in developed economies with historically lower and more stable inflation – the standard regulatory treatment of inflation-linked instruments, as reflected in the Basel FRTB framework and other major jurisdictions, typically decomposes risk into two distinct components:

- Implied inflation rate (inflation expectation), derived from inflation indices such as the Consumer Price Index (CPI).
- Nominal interest rate (risk-free rate), corresponding to the relevant currency.

However, the current Brazilian regulation does not provide sufficient clarity on how inflation-linked products should be mapped within the FRTB risk factor framework. While BCB has provided an illustrative example for the treatment of an inflation-linked debenture (Appendix 2), it is still unclear whether the inflation coupon (real interest rate) should be recognized as a standalone specific risk factor within General Interest Rate Risk (GIRR), or whether it should be captured within nominal interest rate sensitivities and implicit inflation components.

This lack of explicit guidance creates uncertainty regarding risk factor identification, sensitivity calculation, and bucket allocation for Brazilian inflation-linked instruments. As a result, institutions face ambiguity in the consistent and prudent application of RWA_{SENS}.

Industry Recommendation:

The industry recommends that BCB provide explicit clarification on the risk factor mapping and bucket allocation of Brazilian inflation-linked products under the FRTB framework. In this regard, the industry proposes that BCB formally recognise one of the following two approaches:

1. **Recognition of the inflation coupon (real interest rate) as the relevant risk factor (preferred approach):**
   Recognise the **inflation coupon (as inflation risk factor)**, or real interest rate, as the unique and relevant risk factor for Brazilian inflation-linked products. This approach would align regulatory capital calculations with established local market conventions and risk management practices, ensuring consistency between capital requirements and the way risk is actively managed by Brazilian financial institutions.
2. **International decomposition approach (alternative option):**
   Follow international market practice by recognising sensitivities to the **implicit inflation rate (as inflation risk factor)** and the **nominal interest rate (as risk free rate factor)**, rather than the real interest rate itself. Under this approach, the sensitivity to the real rate would be implicitly captured, as it is economically equivalent to the sensitivity to implied inflation with the opposite sign. While this option is less aligned with local risk management practices, it preserves conceptual consistency and alignment with international FRTB implementations.

1.1.5.2. Calculation of Curvature Risk per Bucket

The Brazilian regulation requires curvature risk to be calculated using the largest shock per risk class. This approach was consistent with an earlier BCBS text (2016)[8] but has since been revised in the most recent BIS-issued FRTB standards (2019)[9] and in the implementations adopted by other major jurisdictions (EU, US[10], and UK).

Under the updated Basel framework, curvature risk is calculated at the bucket level rather than by applying the largest shock across the entire risk class. This refinement was introduced to better reflect the nonlinear risk profile within each bucket and to avoid excessive conservatism resulting from shocks that may not be representative of all underlying risk factors.

In addition to this methodological divergence, the Brazilian framework departs from international practice in the calibration of curvature risk weights and in the consistency between delta and curvature treatment.

While curvature risk weights for Equity, Commodity and FX risk classes are broadly aligned with those applied in other main jurisdictions (EU, US[11] and UK), material differences arise for GIRR and Credit Spread Risk (CSR). For CSR, the Brazilian framework applies a curvature risk weight of 12%, corresponding to the highest risk weight within the risk class, regardless of the underlying credit quality. This contrasts with international implementations, where curvature calibration is more closely aligned with the corresponding delta risk weights. A similar inconsistency arises in the GIRR risk class, where the prescribed curvature risk weight of 1.7% is materially lower than the delta risk weight applied to the Brazilian currency (3.2%). These differences create a disconnect between the calibration of delta and curvature risk and weakens the internal consistency of the framework.

Taken together, these deviations contribute to misalignment with international standards and increase implementation complexity for internationally active banks, which must maintain jurisdiction-specific methodologies. Maintaining the legacy approach risks overstating curvature capital charges, introduces inconsistencies between delta and curvature calculations, and undermines cross-jurisdictional comparability.

Industry Recommendation:

[8] Basel Committee on Banking Supervision. *Minimum Capital Requirements for Market Risk*. Bank for International Settlements, Jan. 2016, https://www.bis.org/bcbs/publ/d352.pdf.
[9] Basel Committee on Banking Supervision. *Minimum Capital Requirements for Market Risk*. Bank for International Settlements, Jan. 2019, https://www.bis.org/bcbs/publ/d457.pdf.
[10] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.
[11] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.

Update the curvature risk methodology to align with the latest Basel framework, with curvature calculated at the bucket level rather than applying the largest shock at the risk class level. This would enhance risk sensitivity and ensure consistency with international standards.
In addition, we understand that the current rule is more appropriate for locally issued bonds. However, in recognition of the implementation challenges faced by several international banks in adapting global systems, we recommend providing banks with the option to align the calibration of curvature risk weights for GIRR and CSR with the corresponding delta risk weights, consistent with the latest Basel framework and international practice.
This would improve risk sensitivity, enhance internal consistency between delta and curvature, and support greater cross-jurisdictional alignment.

1.1.5.3. Removal of a 1-Day Tenor in Delta GIRR

The inclusion of a 1-day tenor in the Delta GIRR tenor structure represents a further deviation from internationally applied FRTB standards. Globally, GIRR tenor structures are designed to capture material yield curve movements at economically meaningful horizons and typically begin at longer tenors.

The introduction of a 1-day tenor requires firms to create Brazil-specific GIRR sensitivity calculations and tenor mappings that are not used in other jurisdictions (EU, US[12], and UK). This increases operational burden, reduces economies of scale in model implementation, and introduces jurisdiction-specific fragmentation in capital calculations.

Industry Recommendation:

Give banks the option to align with internationally used GIRR tenor structures by removing the mandatory inclusion of a 1-day tenor. This would reduce unnecessary jurisdiction-specific fragmentation while maintaining robust interest rate risk coverage.

1.1.5.4. Introduction of Liquid FX pairs Risk Weight Premium and Cross-Currency

Article 15 of Public Consultation Notice No. 102/2024[13] proposed two risk weight categories for Delta FX. Category 1 – covering the most liquid currency pairs – was assigned a reduced risk weight of 15% divided by the square root of 2, while Category 2 – covering all other currency pairs – was assigned a risk weight

[12] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.
[13] Banco Central do Brasil. *Sistema de Consultas Públicas e Outras Formas de Participação Social*. Banco Central do Brasil, n.d., https://www3.bcb.gov.br/audpub/HomePage?7.

of 15%. This approach is consistent with the methodology proposed by the BCBS, has been adopted by all major jurisdictions (EU, US[14], and UK), and was also reflected in earlier versions of the Brazilian framework.

The latest version of the BCB standards has removed the reduced risk weight for the most liquid currency pairs which represents a departure from internationally established practices and reduces comparability with other FRTB jurisdictions, without a corresponding increase in risk sensitivity.

Industry Recommendation:

For greater convergence with international practices, the recommendation is to reinstate the division by the square root of 2 for the Delta FX risk weight applied to Category 1 currency pairs specified by BCB. In addition, adopt the BCBS methodology whereby FX risk is treated as a two-dimensional risk between currency pairs, without assuming transit through the local currency of the reporting jurisdiction.

1.1.5.5. Scalar for Curvature FX

Article 95 discusses incremental loss by risk factor for the curvature component. For each risk factor to which instruments subject to curvature risk are exposed, institutions are required to determine the incremental loss amount (CVR_k^+/CVR_k^-).

However, the Brazilian regulation does not incorporate the division by the scalar of 1.5 for FX curvature risk applicable to options denominated in currencies other than BRL. Under the BCBS framework, and subject to supervisory approval, banks are permitted to apply a scalar of 1.5 consistently across all FX instruments provided curvature sensitivities are calculated for all currencies. This includes sensitivities derived by shocking the reporting currency – or the base currency, where applicable – relative to all other currencies (MAR 21.98).

The absence of this treatment in the Brazilian framework represents a divergence from international practice and results in a more conservative – and potentially overstated – FX curvature capital requirement, without a corresponding increase in risk sensitivity.

Industry Recommendation:

The industry proposes aligning Article 95 with the approach set out in the BCBS framework in order to achieve greater convergence with international practices. For FX curvature, for options that do not reference a bank's reporting currency (or base currency) as an underlying, net curvature risk charges may be divided by a scalar of 1.5. Alternatively, and subject to supervisory approval, a bank may apply the scalar of 1.5 consistently to all FX instruments, provided curvature sensitivities are calculated for all

[14] U.S. Federal Banking Agencies. *Basel III Endgame; Prudential Standards. Federal Register*, vol. 88, no. 179, 18 Sept. 2023, pp. 64028–64175, https://www.govinfo.gov/content/pkg/FR-2023-09-18/pdf/2023-19200.pdf.

currencies, including sensitivities determined by shocking the reporting currency (or base currency, where used) relative to all other currencies.

1.1.5.6. CSR Non-Securitization Risk Weights Based on Settlement Currencies

The introduction of a second annex (Article 30, Annex II-A) in the CSR Non-Securitization (Non-sec) bucket mapping represents a further instance in which the Brazilian rules differ from internationally applied FRTB standards. Annex II-A provides a modest risk weight benefit for certain local high-yield issuers but requires firms to implement Brazil-specific logic to capture the settlement currency of issuances and to remap underlying obligors accordingly.

This additional mapping requirement increases operational burden, reduces economies of scale in model implementation, and introduces jurisdiction-specific fragmentation in capital calculations. For many institutions, particularly international active banks, the costs are disproportionate to the limited capital allocation benefit delivered by the marginal risk weight adjustment.

Industry Recommendation:

We understand that the Brazilian rule has been adapted to better reflect local market conditions and to avoid penalising local issuances. However, in recognition of the implementation challenges faced by several international banks in adapting global systems, we recommend providing banks with the option to align with internationally used CSR Non-Securitization bucket mappings by removing the mandatory inclusion of Annex II-A. This would reduce unnecessary jurisdiction-specific fragmentation while retaining robust CSR risk weights.

Conclusion

The industry supports BCB's objective of implementing a robust, conservative, and risk-sensitive market risk framework under the FRTB. However, the analysis in this paper identifies a number of jurisdiction-specific methodological choices which, while not very material in isolation, collectively introduce significant operational and technological complexity for internationally active institutions, without delivering commensurate improvements in risk sensitivity or prudential outcomes.

The recommendations set out in this paper are intended as targeted and proportionate refinements that preserve supervisory control while improving international consistency, operational resilience, and alignment with established risk management practices. Introducing greater optionality where permitted under the Basel framework, avoiding mandatory jurisdiction-specific requirements and aligning with international implementation practices would materially reduce unnecessary complexity and execution

risk. The industry believes these refinements would support a more effective and sustainable implementation of the FRTB in Brazil and remains committed to constructive engagement with BCB to discuss these proposals further.

Appendix

1. Typo & Drafting Error - Sign Error in the Curvature Formula (Article 95, Resolution 470)

Article 95 of Resolution 470 specifies the curvature risk calculation formula. However, the formula as written contains an inverted sign relative to the formula set out in the Basel framework:

$$\text{I - } CVR_k^{+} = -\sum [V_i(x_k\ RW(Curv)^{+}) - V_i(x_k) - (RW_k\ Curv \times s_{ik})]$$

$$\text{II - } CVR_k^{-} = -\sum [V_i(x_k\ RW(Curv)^{-}) - V_i(x_k) - (RW_k\ Curv \times s_{ik})]$$

Industry Recommendation:

Amend Article 95 of Resolution 470 to correct the sign inversion in the curvature formula, ensuring full alignment with the Basel specification and eliminating interpretative uncertainty.

$$\text{I - } CVR_k^{+} = -\sum [V_i(x_k\ RW(Curv)^{+}) - V_i(x_k) - (RW_k\ Curv \times s_{ik})]$$
$$\text{II - } CVR_k^{-} = -\sum [V_i(x_k\ RW(Curv)^{-}) - V_i(x_k) + (RW_k\ Curv \times s_{ik})]$$

2. BACEN Example – Treatment of an Inflation-Linked Debenture

Instrument	Position	Trade details	Maturity	Observations
Debenture	20.000	IPCA + 7%	756	Semi-annual coupon 4%

Instrument	Metric	Bucket	Risk factor	Sensitivity
Debenture	Delta GIRR	BRL	Cupom IPCA / 504	-6,557,545
			Cupom IPCA / 756	-42,838,344
			IPCA	50,314,938

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