

Secretariat of the Basel Committee on Banking Supervision
Bank for International Settlements
CH-4002 Basel, Switzerland



Japanese Bankers Association

JBA comments on the BCBS Discussion Paper: “The role of climate scenario analysis in strengthening the management and supervision of climate-related financial risk”

Dear Basel Committee members:

The Japanese Bankers Association¹ (JBA) appreciates the opportunity to provide our comments on the Basel Committee on Banking Supervision’s (BCBS) Discussion Paper: “*The role of climate scenario analysis in strengthening the management and supervision of climate-related financial risk*” (the “Discussion Paper”) released on 16 April 2024.

The JBA supports the BCBS’s efforts to incorporate climate scenario analysis into effective management and supervision of climate-related financial risks. While recognising climate change as a critical issue, we also acknowledge that there is currently no globally established methodology for assessing such risks. Additionally, the pilot exercise conducted with the Financial Services Agency of Japan and the Bank of Japan is also positioned as an attempt to continuously improve analysis methods. Considering these, we believe there are several aspects to keep in mind as discussions progress.

We hope that our comments will contribute to further discussions at the BCBS.

Question1

How does the role of CSA vary based on the objectives listed above, and are there other prudential objectives where CSA could be relevant?

- The role of CSA varies based on the objectives listed below. Given these roles, the accuracy of CSA calculation results and a certain degree of standardisation through thoughtful discussions with the banks are required in the future.

a. Risk identification

- The role involves sector-specific and regional risk assessments and their comparison.

¹ The Japanese Bankers Association is the leading trade association for banks, bank holding companies and bankers associations in Japan. As of June 1, 2024, JBA has 114 Full Members (banks), 3 Bank Holding Company Members (bank holding companies), 74 Associate Members (banks & bank holding companies), 49 Special Members (regionally-based bankers associations) and one Sub-Associate Member for a total of 241 members.

c. Internal and supervisory capital and liquidity assessments

- The role involves quantitatively assessing the likelihood of impacts based on scenarios over a short-term time horizon that assume sudden stress cases.

d. Assessment of business model resilience and business strategy building

- The role involves assessing impacts based on both a long-term outlook of business structural changes and resilience to short-term stress cases.
- Other prudential objectives where CSA could be relevant include using the scenario analysis results for external disclosure to aid investors in assessing each bank's approach to climate change and engaging with borrowers using CSA to support the decarbonisation of their portfolios.
- Each climate scenario may have a variety of different usages—a specific CSA may be motivated by one particular usage but provide insights into areas not originally envisaged. As such, CSA might be considered more “exploratory” than traditional established scenario exercises that are mature in the risk management field.

Question2

What are the key challenges in the application of CSA and how can they be overcome?

- Key challenges and potential solutions include the following points:

Key Challenges

- The elements of scenarios published by scenario builders are not comprehensive and there are variations in the disclosed information from borrowers.
- It is difficult to evaluate and verify the appropriateness of the results because there is no established common analysis method for comparison between banks.
- There is no common understanding about the potential impact of climate-related shocks on macroeconomic/sectoral variables and credit risk, making it difficult to create scenarios that can be compared across banks and applicable to the conventional risk management framework.

Measures

- Further research and intense communication among banks' internal stakeholders would be effective to prepare in-house scenarios.
- Additionally, comprehensive publication of scenario elements by scenario builders would contribute to effective preparations.
- We expect regulators to continuously take the lead in providing policy support to enhance data availability and sharing, accumulating knowledge and experience among research institutions, regulators, and relevant international frameworks to leverage them for improving the validity of scenarios and methodologies.
- In the future, it is desirable for the BCBS to establish standard methods for processing and developing scenarios in the form of guidance, as well as standardising analysis methods in CSA. It would also be

desirable to publish benchmarks that allow comparison with other banks (quantitative statistics such as the median EBITDA decline rate for each sector) to assess financial impacts and finetune internal simulation models by recognising the relative leniency and severity from simulations of other banks. However, given that evaluation models and tools are still in development, hasty standardisation should be avoided. It is essential to carefully continue discussions with the banks.

Question 3

What are the key areas where CSA methodologies and capabilities need to be further developed to be useful and relevant for the different objectives listed in this paper?

- The key areas where CSA methodologies and capabilities need to be further developed are as follows:
 - Develop the CSA methodology for short-term scenarios that can be used to internally evaluate capital adequacy. For example, it is necessary to develop a method related to how to avoid duplicative assessment of existing credit risks (other than climate change) and how to capture the probability of the occurrence of climate scenarios.
 - Understand the transmission channel of climate-related variables to macroeconomic/sectoral variables.
 - Study the change in the sensitivity of credit risk to macroeconomic/sectoral variables after considering climate-related risks.
 - Establish a consistent evaluation method for the impact of transition risk and physical risk.
 - Ensure the validity of the CSA exercise by adjusting it to a scenario that takes into account important policies of national governments, such as energy policies, which are not necessarily reflected in the current scenario.
 - Develop a financial simulation model that takes into account the impact of the company's supply chain.

Question 4

Are the key features listed above appropriately calibrated for a range of CSA exercises, and should other features be considered?

- We recognise some banks implement CSA taking into account the features mentioned in the paper.
- Regarding other features, comparisons between banks cannot be made due to the absence of established analysis methodology. Therefore, “comparability” should also be taken into consideration.

Question 5

How does the design of CSA exercises vary depending on the objectives? Please elaborate on the main usage-specific considerations for each of the different objectives.

- For the “risk identification,” flexible scenario designs (e.g., time horizon, severity of scenarios) with several simplified assumptions to adjust according to purposes of the CSA could be useful for identifying risk drivers and understanding highly uncertain climate-related risks. Using a long-term time horizon scenario is preferable for capturing sectoral and regional structural changes. In this context, it is anticipated that scenario builders will further expand their published scenarios to establish specific scenarios for each sector and region.

- For the “risk management processes,” “internal and supervisory capital and liquidity assessments,” and “assessment of business model resilience and business strategy building,” an analysis based on firm-agreed scenarios to reflect climate risks could be effective in integrating climate risks into the conventional risk management framework. At the same time, scenario analysis based on several narratives could be effective in understanding the impact of different levels of climate risk mitigation measures.
- Additionally, for the “assessment of business model resilience and business strategy building,” the aim is to assess sudden stress scenarios; thus, the implementation of rigorous scenario settings over a short-term timeframe is necessary.
- Other considerations on the “main usage-specific considerations” are as follows:

Time horizons

- Compared to short-term analysis, long-term analysis has even higher uncertainty. At present, long-term scenarios may be utilised more for strategic planning and risk management of banks rather than for quantifying potential losses.
- For short-term scenarios, consideration of occurrence probability is necessary to make the relationship with the internal capital adequacy assessment (ICAAP) consistent; for medium to long-term scenarios, in terms of consideration of strategy, certain standards on how to reflect changes in the balance sheet (portfolio) are necessary. The frequency of updating analysis should also be considered from the perspective of strategy continuity.

Granularity

- In financial impact simulations based on rating transitions, model risk increases due to small sample sizes and differences in smoothing methods for transition rates. Therefore, focusing on model governance is essential.

Balance sheet assumptions

- For utilising scenario analysis in strategy formulation, the analysis should be based on changes in exposure by sector; however, it is difficult to ensure and evaluate the feasibility of such changes. Therefore, it is necessary to use different balance sheets for different purposes, such as a dynamic balance sheet for internal management and a static balance sheet for disclosure.

Question 6

What additional usage-specific considerations are relevant for each of the different objectives of CSA listed in this paper and why?

- Attention should be paid to the complexity of the analysis. Depending on the purpose of the analysis, models may become more complex; however, the more complex the analysis, the greater the burden of implementation, and the more likely it is to encounter challenges in model risk related to persuasiveness and stability. Therefore, it is necessary to consider the complexity appropriate to the purpose.

Question 7:

Which scenario and scenario features are used for the different objectives listed (ie internally developed, those from scenario builders or a combination of the two)?

- Examples of two Japanese banks are as follows:

Bank A

- NGFS scenarios are mainly used and are complemented by some parameters from IEA scenarios. The purpose of their CSA is to assess business resilience or identify risks.

Bank B

- For risk management purposes, long-term scenario analysis for both transition and physical risks based on publicly available scenarios is conducted. Methodologies for short-term transition risk analysis based on in-house scenarios are currently designed to capture the temporal shock during the transition phase.
- For strategy-building purposes, publicly available long-term scenarios are referenced.
- For any of the objectives listed in the paper, it is not easy for each financial institution to develop appropriate scenarios. Especially, medium to long-term climate change scenario analysis requires many parameters due to the complexity of the spillover pathways and the need to update the assessment. From the perspective of ensuring comparability between banks, it is desirable to use scenarios provided by scenario builders as much as possible. However, given that the development of scenarios by these agencies is not fully advanced at this time, combining them with those developed internally is also an option.

Question 8:

What features and measures could be adopted in the future to enhance the utility of currently available scenarios (eg NGFS, IEA, IPCC)?

- To advance scenario analysis of physical risk, it is necessary to enhance corporate disclosure data, such as risk assessments based on property data owned by individual companies and their financial impacts, as well as the reflection of supply chain impacts. However, this will require a significant amount of efforts and time. A practical approach is to initially disclose scenario data that appropriately reflects physical risk and supply chain impacts by region and sector in NGFS and other scenarios, and then continuously upgrade this approach.
- For upgrading the approach and enhancing the use of scenarios, considering the following points is desirable for the BCBS, if necessary, by engaging with other relevant authorities:
 - Establish a standard method for processing and developing scenarios from specific scenario builders according to motivation.
 - Indicate the occurrence probability of each scenario from NGFS and IEA. This would enable banks to discern which purposes of risk management these scenarios can be utilised for, and allow for the adjustment of scenarios based on each bank's outlook. However, it should be noted that there is an

evolving understanding of feedback mechanisms between climate events; what appears implausible today may not be so going forward. Therefore, there is potential value in stretching beyond plausibility.

- Define the required level of investment in low-carbon technologies to achieve decarbonisation goals and clarify the impact of these technological developments on macroeconomic and sectoral variables for conducting analysis, particularly for transition risks in energy-demand sectors except energy and utilities.
- Within this context, analysing the wide-ranging impact of climate change on economic and social systems, such as economic growth, employment, and health is important for developing more practical measures and policies. Scenarios should also reflect technological advances and changes in national policies.

Question 9:

What alternative or novel approaches could supervisors consider for CSA and how might these be used for prudential purposes?

- As an alternative approach, in addition to CSA conducted by each bank, it could be proposed that the supervisors carry it out collectively. In that case, standardising the calculation methods would make it possible to compare results across banks from a prudential perspective.

Question 10:

How could the effectiveness and efficiency of supervisory exercises be improved?

- Firstly, since CSA is still in its very nascent stage, regulators should not use CSA outputs for bank supervision under the assumption that they are sufficiently accurate and reliable. CSA would need to meet several key conditions before it could be informative to quantitative capital planning, such as maturation of data and tools, improvements in knowledge on financial risk transmission channels, and inclusion of risks that could plausibly materialise in the near-term.
- To enhance the utilisation of CSA by banks, the BCBS and other relevant authorities may consider examining and addressing the following aspects without compromising motivation:
 - Develop a common database usable for all banks.
 - Disclose benchmarks (statistics) to enable objective evaluation of scenario analysis results.
 - Specify the assumptions for the CSA model, such as market and industry trends, common understanding of policies and regulations, and the level of technological advancement.
 - Clarify the transmission channels, taking into consideration inter-industry relations and the current adoption of energy-saving technologies.
 - Conduct further and careful research on the relationship between macroeconomic shocks and climate-derived shocks.
 - Reinforce standardised CSA consistency across banks by close coordination between home and host supervisors to apply CSA for all entities within the group. Since group-level committees and governance will dominate the strategic direction of the firm, with a multi-decade strategic focus on climate change, it is important that CSA is applied at the group level. The results will ultimately flow down to individual entities. This is particularly relevant for business model resilience and business strategy.

- Develop policies to enhance data availability and improve the data collection process. AI and big data may accelerate such efforts.

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We thank the BCBS again for the opportunity to comment on the Discussion Paper and hope our comments will contribute to further consideration in the BCBS.

Yours faithfully,

Japanese Bankers Association