

IFRS 9 Implementation by EU institutions

Summary of EBA's second monitoring report

General overview

SICR assessment approaches

Expected Credit Loss Models

IFRS 9 PD variability and robustness

Incorporation of forward-looking information

Backtesting

Abbreviations

1 | General overview

General Aspects

The EBA has published the second monitoring report on the implementation of IFRS 9 by EU institutions with the aim to promote further improvements in their ECL model practices



Context

- Since 2016, the European Banking Authority (EBA) has been monitoring the effective implementation of the International Financial Reporting Standard (IFRS) 9 among European Union (EU) institutions. Guidelines and a benchmarking exercise have been developed **to assess the consistency on accounting for expected credit losses (ECL)**. The aim is to provide transparency on expectations of sound credit risk management practices associated with the implementation and ongoing application of the accounting for ECLs. The EBA published the first IFRS 9 monitoring report in November 2021, and its main observations were that the EBA had to continue working on the integration of High Default Portfolios (HDPs) in the benchmarking exercise and on its extension to institutions applying the standardised approach for credit risk.
- In this context, the EBA has published its **second monitoring report on the implementation of IFRS 9**. This report focuses on HDPs and aims to promote further improvements in **ECL model practices, ensuring transparency** on the main areas of concern.



Next Steps

Supervisors will continue to **ensure the consistence in the application of IFRS 9**, and follow-up on key findings highlighted in previous reports by the EBA. The benchmarking exercise will continue to foster a consistent implementation of the standard.



Main findings and observations

1 SICR

- Continued lack of use of collective Significant Increase in Credit Risk (SICR) assessment as required by IFRS 9

2 ECL

- In ECL models, institutions continue to make extensive use of overlays

3 IFRS 9 PD variability and robustness

- The variability of IFRS 9 Probability of Default (PD) estimates observed calls for heightened supervisory scrutiny on a case-by-case basis

4 FLI

- The impact of forward-looking information (FLI) and the non-linearity effect is generally confirmed to be modest, but divergent practices might explain the varying levels of sensitivity observed across institutions

5 Backtesting

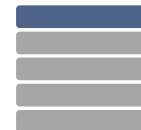
- Backtesting results should be effectively used for the periodic review and improvement of the IFRS 9 models



[Access to Document](#)

2 Significant Increase in Credit Risk assessment approaches

Main updates and collective assessments



Staging approaches that are not well designed and implemented by institutions may result in a delayed recognition of SICR thus, not ensuring the measurement of ECLs with the appropriate time horizon

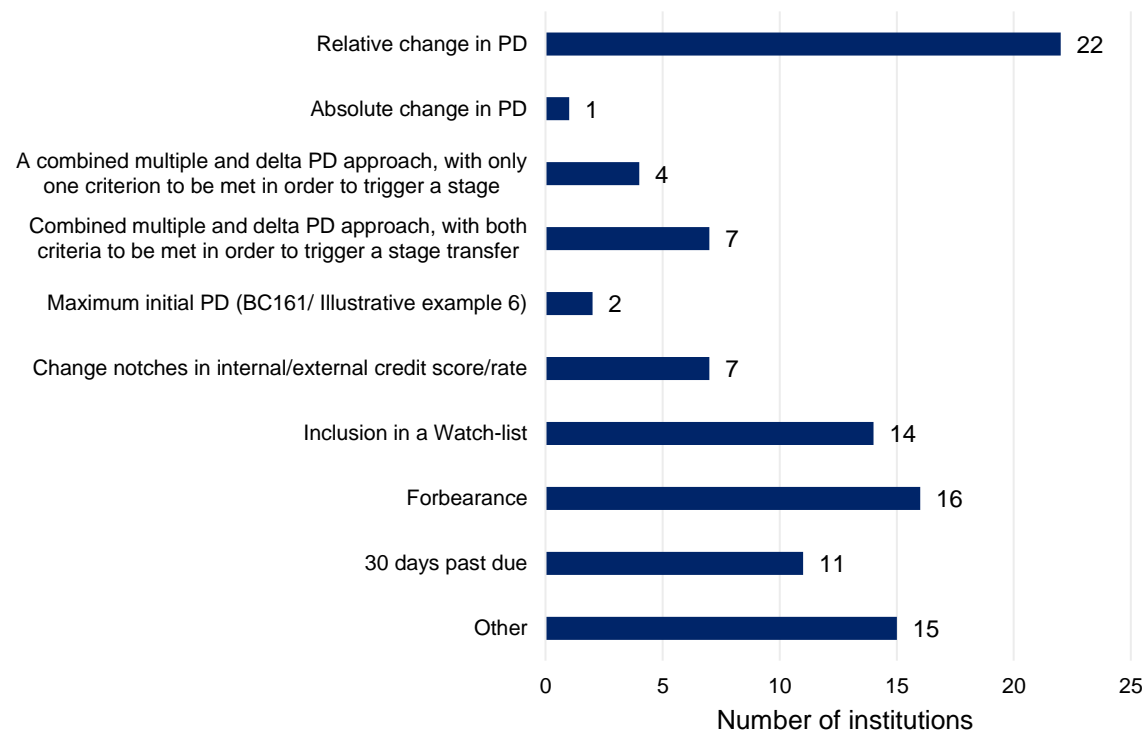
Main changes to the SICR assessment approach

- For HDPs, institutions have generally reported **limited changes to the SICR assessment approaches** compared to the previous investigations:
 - the revision of the existing **quantitative SICR thresholds** or to consider nonlinearity in the SICR assessment;
 - introducing a **threefold increase in lifetime PD** as an additional backstop indicator to prevent delays in transfers to Stage 2;
 - using **collective assessment** and other **sectoral** approaches (related to COVID-19 factors such as vulnerable sectors, moratoria or state-guaranteed loans);
 - adding the **watchlist** to the set of SICR qualitative indicators;
 - introducing a **Stage 2 probation period** under established conditions.

Limited use of SICR collective assessment

- One of the most notable findings of the exercise has been the **continued limited use of collective SICR assessments**. Institutions are expected to make **use of collective assessments to complement individual assessments**, above all in those circumstances where information is not available at the individual level without undue cost or effort.
- Collective SICR assessment approaches** are expected to be used by institutions **on a regular basis and not only in situations of uncertainties** in the evolution of the current macroeconomic outlook and emerging novel risks in the financial landscape (i.e., inflation, interest rates, geopolitical risks).

Indicators used by institutions to assess SICR¹



2 Significant Increase in Credit Risk assessment approaches

Alignment between DoD and IFRS 9 exposures, LCRE and PD thresholds



The use of LCRE should be limited and always well justified and documented. In addition, some differences have been noted in terms of the levels of PD used to define the scope of LCRE

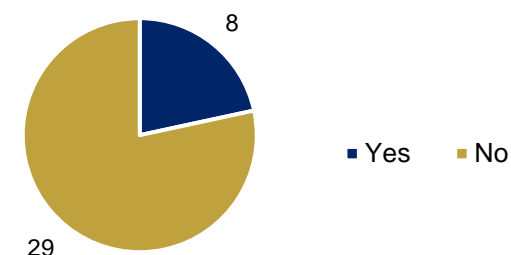
Alignment between the definition of default (DoD) and IFRS 9 exposures in Stage 3

- Despite the differences between the concepts of non-performing exposures, the prudential DoD and credit-impaired financial assets (i.e., Stage 3 under IFRS 9), in practice, it is observed that **institutions** tend to **converge** full **alignment among the three definitions**.
- The **most common rationales provided** for observed deviations were: i) the different definition of cure periods used for Stage 3 and defaulted exposures; and ii) the different materiality thresholds applied.

Low Credit Risk Exemption (LCRE)

- Nearly a quarter of the institutions make use of the LCRE. Material divergences have been observed in terms of **PD thresholds** used to define the **scope of the LCRE**. This evidence raises some prudential concerns for the following reasons:
 - The use of the LCRE, especially for HDPs, should be limited. This is because an excessive application of LCRE will result in delays in transfers to Stage 2.
 - The determination of LCRE should be consistent with the globally understood definition of low credit risk.
- Institutions making usage of LCRE for HDPs are therefore expected to **review their approaches accounting** for the regulatory and supervisory expectations that were already set on this matter in the EBA Final Guidelines (GLs) on accounting for ECL.

Application of the LCRE by institutions in the sample¹



PD Thresholds

- Institutions made use of **quantitative indicators** to assess SICR, which generally correspond, for entities using statistical IFRS 9 models, to a predetermined level of the relative increase in the lifetime PD since origination. The main issue is identifying the specific level of increase in PD to be considered significant according to IFRS 9 and which justifies the transfer of the exposure to Stage 2.
- **Qualitative indicators**, relate to relevant non-statistical information, were also generally used by institutions and led to relevant impact in terms of higher level of transfers to Stage 2.
- In addition, the analyses on SICR practices have also confirmed that some institutions continue relying on the use of **absolute thresholds** only or on a **combination of absolute and relative thresholds**. SICR triggers, defined only in absolute terms, are generally not consistent with the requirements of IFRS 9.



Overlays adjust the ECL outputs to reflect the relevant emerging risks not captured by ECL models, but their use relies on a high degree of judgment and therefore, divergence across institutions

Types of ECL models

- Most institutions have implemented PD*LGD*EAD approaches for determining ECL, but some of them did **not develop designated IFRS 9 models to estimate the ECL amount of specific portfolios**. They instead linked coverage levels of these portfolios to other reference portfolios where IFRS 9 models were applied. This raises **prudential concerns** for material portfolios.
- Institutions are encouraged to **review their approaches** and address any limitations ensuring consistent ECL outputs for portfolios under IFRS 9 impairment model.

Model limitations and use of overlays

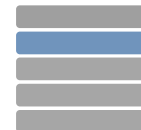
- ECL models are not always able to capture all **relevant emerging credit risk factor** and ensure that the **aggregate amount of allowance is adequate**. For this reason, most institutions implement **overlays**. Approximately half of the sample mentioned using overlays and, in most cases, they reported they had a significant impact on the IFRS 9 12-month PD.
- Overlays adjust the ECL outputs to reflect the relevant emerging risks not captured by ECL models, but their use relies on a **high degree of judgment** and therefore, divergence across institutions.
- In most cases, overlays have been applied at the **level of the final ECL outputs**, with some institutions applying model adjustments at **risk parameter level**. The latter is considered more risk sensitive and consistent with the need to incorporate the additional source of risks.
- EBA expects a further **improvement in the process on the calibration of overlays**, reflecting a more granular manner at single risk parameter level.
- Institutions should complement the quantification of overlays at ECL Level with the collective SICR assessment envisaged by IFRS 9.

Other risks

- Effects from the **Russian/Ukrainian conflict** have been identified as a material risk and have been reflected by updating macroeconomic variables and using ECL overlays.
- Few institutions have taken **Environmental, Social and Corporate Governance (ESG) factors** into account in their ECL models. EBA welcomes ongoing work to adequately adjust ECL models to account for these novel risk factors and expects institutions to carefully assess the need for their inclusion in ECL estimates.

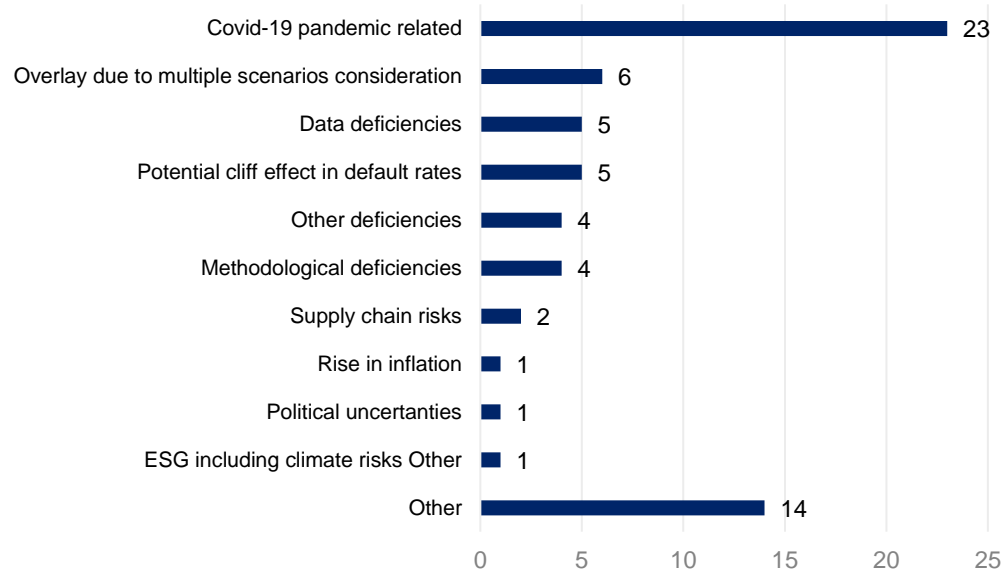
3 Expected Credit Loss Models

Types and impact of overlays



Most institutions implement overlays, approximately half of the sample mentioned using overlays and, in most cases, they reported they had a significant impact on the IFRS 9 12-month PD

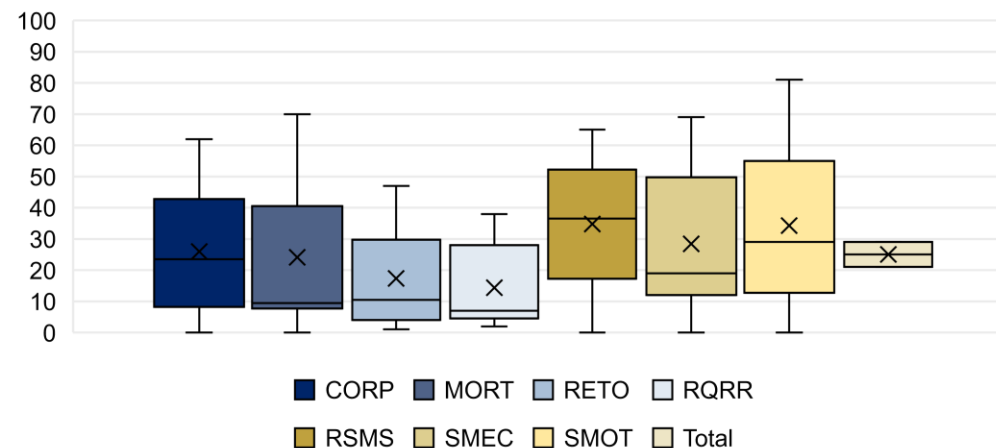
Types of overlays used by institutions in the sample¹



Share of ECLs associated with the use of ECL overlays by type of portfolio²

Portfolio	Number of institutions	Average impact	Median impact
CORP - Corporates which are not SMEs	16	26,3%	24,9%
MORT - Retail mortgages which are not SMEs	14	24,9%	13,3%
RETO - Retail other	12	17,8%	11,1%
RQRR -Retail Qualified Revolving	5	14,5%	7,4%
RSMS - Retail SME exposures secured by real estate	12	38,1%	37,4%
SMEC - Corporate which are SMEs	15	29,6%	23,0%
SMOT - Other retail SME exposures	13	37,1%	30,8%

Box-diagrams³



4 | IFRS 9 Probability of Default variability and robustness

Variability and differences (1/2)

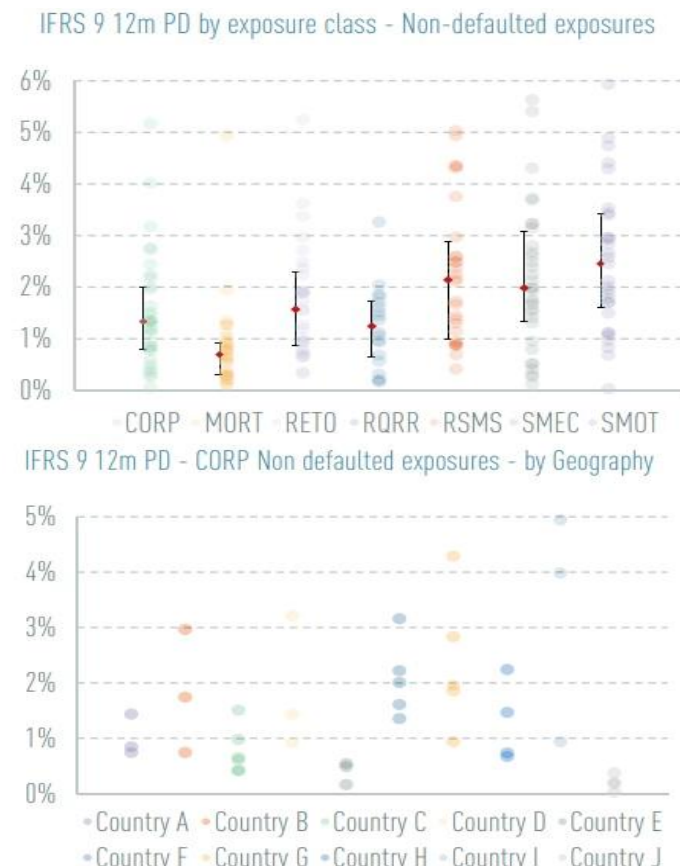


Benchmarking data indicates some variability in IFRS 9 12-month PDs across institutions. In addition, there are some differences in the use of IRB models for IFRS 9 estimates, specifically in the DoD, in the risk differentiation and in the risk quantification

Variability in the IFRS 9 PD

- Small and medium enterprises (SME) exposures classes have shown high default probabilities, while lower IFRS 9 PDs have been reported for retail mortgage portfolios. At the reference date of analysis, variability in IFRS 9 12-month PD estimates was nonetheless observed across institutions of the sample. Benchmarking analysis at geography level on the non-SME corporate exposures indicated **different IFRS 9 PD levels within a certain jurisdiction**. While it is acknowledged that this variability may also be explained by the **different credit standards** and **inherent riskiness of the respective portfolios**, other differences driven by the application of divergent methodological approaches observed among institutions will require further supervisory scrutiny on a case-by-case basis.
- For the vast majority of the institutions in the sample, **IFRS 9 12-month PDs assigned to HDPs** have been significantly **higher** than the correspondent **default rates observed in 2021**. This needs to be read together with the extraordinary circumstances presented in 2020/2021 and with the support measures provided to cope with the COVID-19 crisis, which contributed to maintain default rates at one of the lowest levels of the last 10 year.
- On the contrary, **IFRS 9 12-month PDs** have been generally lower than the **respective internal rating based (IRB) PDs values** due to the more point-in-time (PiT) and forward-looking nature of the accounting estimates as well as the positive macroeconomic outlook embedded in the model at year-end 2021.

Variability in IFRS 9 12-month PD by exposure class and geographical area in December 2021¹



On the graph below, the analysis was limited to institutions with more than 10% of their total CORP exposures in that geography.

4 | IFRS 9 Probability of Default variability and robustness

Variability and differences (2/2)



Benchmarking data indicates some variability in IFRS 9 12-month PDs across institutions. In addition, there are some differences in the use of IRB models for IFRS 9 estimates, specifically in the DoD, in the risk differentiation and in the risk quantification

Differences in the use of IRB models for IFRS 9 estimates

Differences in the DoD

- IFRS 9 does not prescribe the use of a specific approach for determining the ECLs. EBA's DoD GL was used by institutions, with a **partial degree of compliance**. Other institutions reported modelling other events, such as the credit-loss event.
- Differences were also observed in the **implementation of risk parameters** for institutions applying the regulatory DoD.

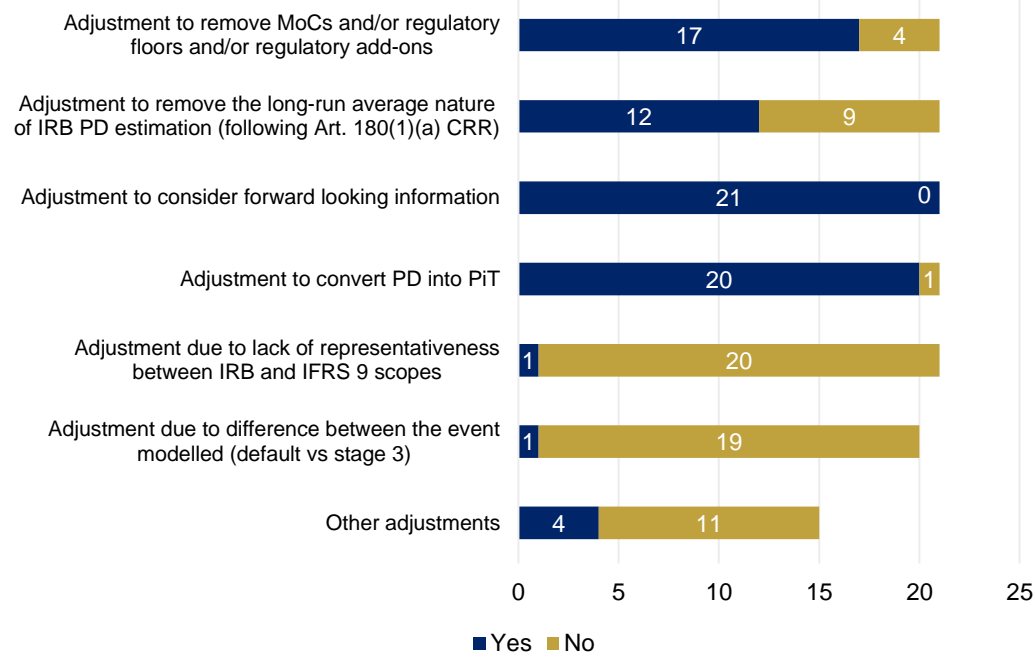
Differences in risk differentiation

- Most institutions leveraged IRB portfolios segmentation for IFRS 9 **modelling**. In other instances, differences were observed in the **degree of alignment**. Institutions suggested that such differences sought to better reflect specific IFRS 9 modelling practices, (i.e., to reflect a higher degree of geographical sensitivity in IFRS 9, different assignment choices of portfolios, and in some cases, further aggregation needs driven by specific data requirements in implemented IFRS 9 models).

Differences in risk quantification

- For institutions using IRB estimates as a starting point, main adjustments are related to the **transformation of unconditional PDs into PiT estimates among other regulatory adjustments**.
- For institutions using historical default or loss data as a starting point instead, the approaches used to estimate the IFRS 9 PD are based on **regression analysis, parametric or nonparametric statistical approaches and/or transitional matrices**.

Adjustments performed to the IRB PD for the purposes of the calculation of IFRS 9 PD¹



(1) Figure 26: IFRS 9 implementation by EU institutions (EBA, 2023)

5

Incorporation of Forward-Looking Information

Macroeconomic scenarios and variability of methodological approach



Relevant areas of variability have been observed in the definition of the relevant macroeconomic scenarios or the methodological approach used to incorporate the FLI and the reflection of non-linearity

Macroeconomic scenarios

- Scenarios were updated **optimistically consistent** with the forecast at the end of 2021 and the expectations of a rebound of the economy after the COVID-19 crisis.
- The reliance on internal projections has caused **variability across institutions** in the **forecasted macroeconomic variables figures** embedded in the ECL models, which has naturally resulted in **divergent effects of the FLI incorporation** and **final ECL model's outputs**.
- The benchmarking analysis on HDPs has unveiled dispersion of the Gross Domestic Product (GDP) values projected for the next 3 years for similar geographical areas which may question, in some cases, the soundness of the underlying assumptions behind the internal scenarios forecasted, especially, when a larger deviation among institutions is observed. This evidence reiterates the need for institutions that **use internal macroeconomic projections** to have the necessary forecasting expertise and proper internal resources, as well as to rely on sound processes for selecting the scenarios to be used in the ECL assessment.

Variability of the methodological approach for incorporation of FLI and reflection of non-linearity

- Different practices have been observed on **HDPs on the approaches** taken to **incorporate FLI into the ECL measurement**. Institutions have generally adopted multi-scenario approaches, calculating a **probability weighted ECL based on scenarios**, with an intermediate step of calculating risk parameters, for each scenario, reflecting scenario-specific macroeconomic information.
- The most common approach is to **envisage three scenarios** with few institutions reporting using a simulative approach. Others have reported the use of a **single scenario approach** but **reflecting the non-linearity** with a specific adjustment, and few institutions, continue to use a **single scenario without any adjustment**.

5 | Incorporation of Forward-Looking Information

Incorporation of FLI for LGD parameter

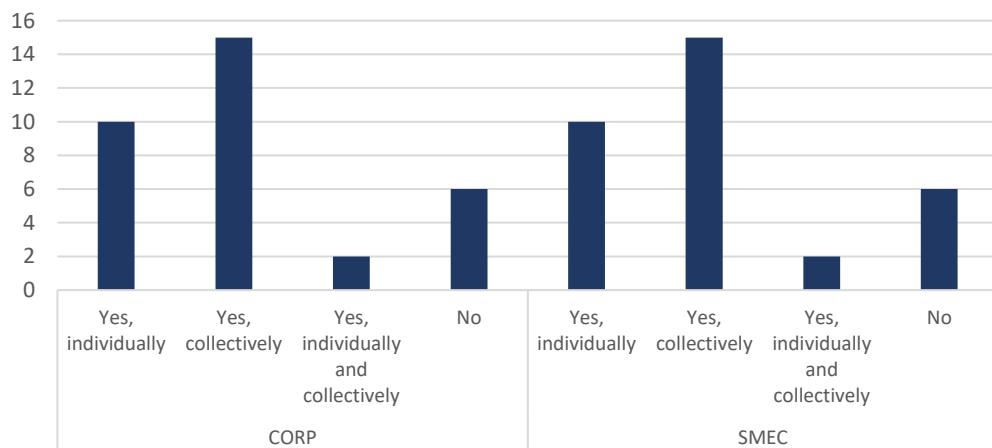


The absence of incorporating FLI in the IFRS 9 LGD parameters may result in estimates that do not align with forward-looking expectations and may therefore not meet the expectations of IFRS 9

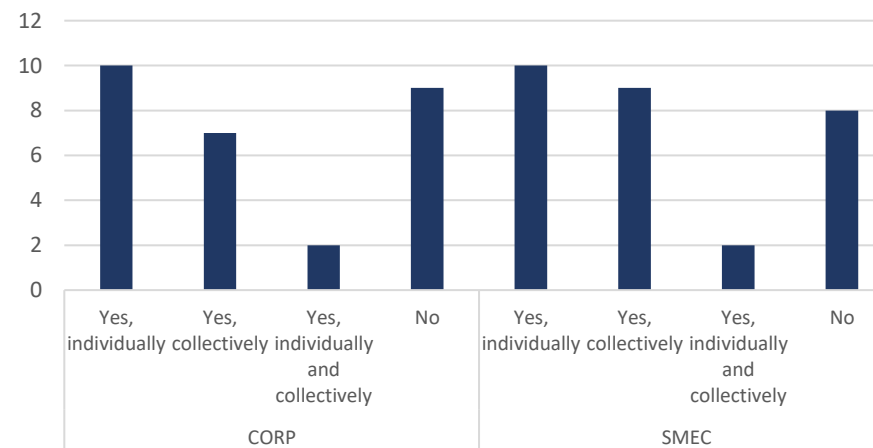
Incorporation of FLI for LGD parameter

- The absence of incorporating a forward-looking component in the LGD may introduce an additional layer of **variability in the final ECL estimates** and raises prudential concerns when it is not demonstrated (i.e., with statistical evidence) that there is a **lack of correlation between the macroeconomic variables and the risk parameter**. For instance, an institution may evaluate for collateralised portfolios the extent to which recovery values are influenced by the **evolution of specific macroeconomic indicators** such as the Housing Price Index.
- When not justified by robust evidence, the lack of consideration of FLI in IFRS 9 LGD parameters may lead to estimates **not representative of forward-looking expectations** and may therefore not meet the expectations of IFRS 9.

Incorporation of FLI for LGD parameter for exposures in Stage 1 and/or Stage 2¹



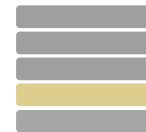
Incorporation of FLI for LGD parameter for exposures in Stage 3²



5

Incorporation of Forward-Looking Information

Variability and effect of non-linearity and probability framework



Relevant areas have been observed in different parts of the FLI incorporation process, such as variability in the impact and different sensitivities from FLI among institutions and the effect of non-linearity and the probability framework

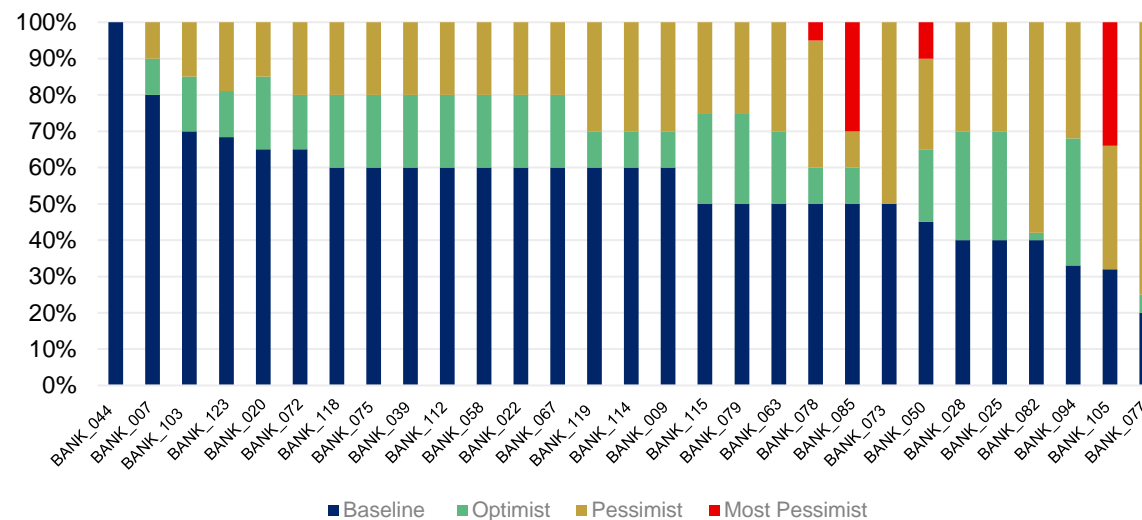
Variability in the impact and different sensitivities from FLI

- FLI impact at single ECL parameter level has been quite divergent across institutions. The effect coming from the incorporation of FLI has been **generally material**. Nonetheless, the high degree of variability of the impact and the presence of outliers may suggest the existence of additional aspects driving **differences in the sensitiveness to FLI** among institutions. These aspects might be linked to the set of data, methodologies and statistical models used to incorporate FLI at PD level.

Effect of non-linearity and probability framework

- The effect of non-linearity on the ECL estimates has been quite limited in 2021 for HDPs. The low impact of non-linearity raises prudential concerns as this implies that the ECL figures remain mainly driven by the **assumptions underlined in the baseline scenario** and the **effects of alternative scenarios** continue to be **quite limited**. Consequently, the **final ECL figures** may not fully incorporate the **uncertainties** embedded in the **different macroeconomic forecasts** and **may not properly reflect the presence of non-linearity between macroeconomic variables and final ECL figures**.
- The weights assigned to the baseline scenario accounted for the largest share (almost 60%), while the weights assigned to the alternative scenarios were slightly higher for the downward (27%) versus the upward scenario (17%). The benchmarking analysis of these figures at the individual institution level provides more meaningful insights on institutions' practices in this area of the framework, and a quite relevant dispersion of values across institutions is observed.

Probability weights assigned to the different IFRS 9 macroeconomic scenarios¹



6

Backtesting

Focus on backtesting practices (1/3)



Backtesting ECL lifetime estimations requires not only robust methodologies, tools, policies and effective processes to be established, but also, sufficient sets of data and actual observations of realised figures

12 months PD

- The backtesting of 12-month PD is the area of the framework **more developed** at the current stage. It is performed by **comparing the 12-month PD under the baseline scenario** and the weighted average 12-month PD per economic scenario as estimated value, with the **realised 1-year default rate** as the observed value.

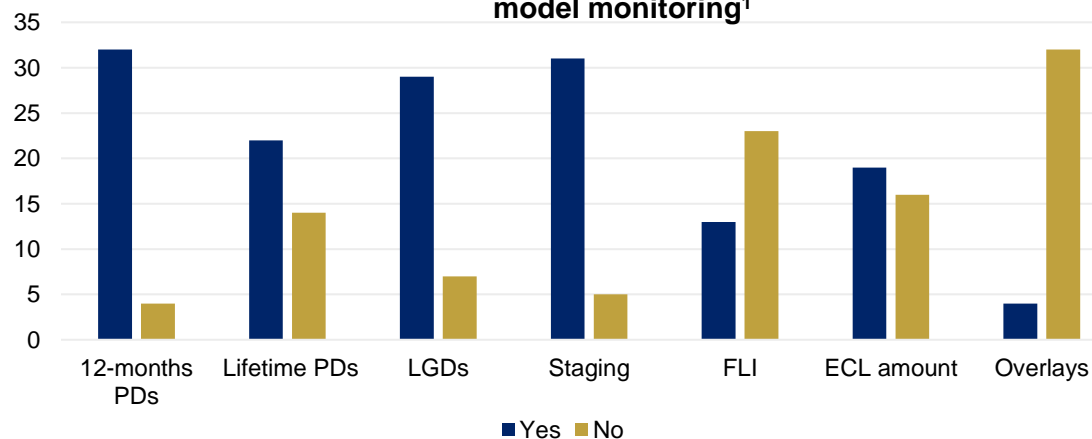
Lifetime PDs

- A majority of institutions have reported conducting backtesting at the lifetime PD level. However, among those not currently performing backtesting for lifetime PD, nearly half have no plans to implement it in the near future.
- Absence of backtesting at the lifetime PD level is not justified by institutions. The reasons are the perceived lack of usefulness and data unavailability.

IFRS 9 LGD estimates

- Institutions have reported using as **estimated value** the LGD under the **baseline scenario**, while a few banks have directly used the weighted average LGD. The choice of the observed value used has been more consistent, which generally corresponds to the **realised losses**. The same considerations already stated for ECL backtesting related to the need to ensure a homogeneous comparison between predicted and realised values are also valid for LGD.

Figure 11: Backtesting exercises performed as part of IFRS 9 ECL model monitoring¹



6

Backtesting

Focus on backtesting practices (2/3)

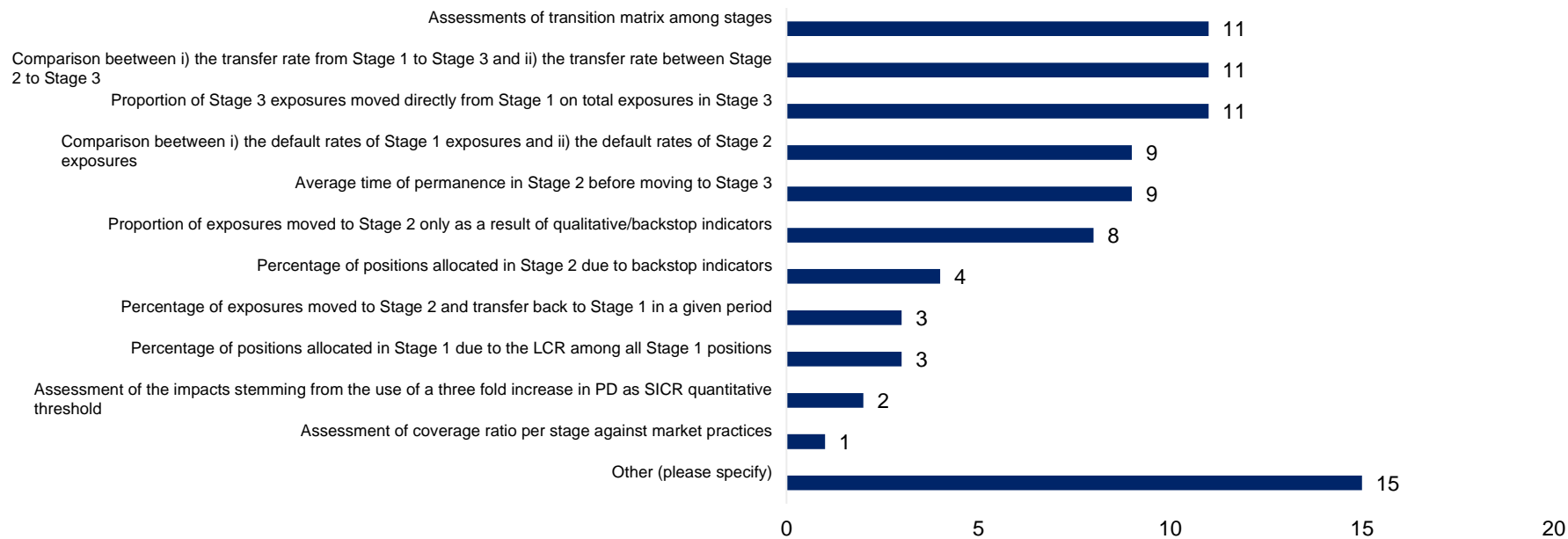


Backtesting ECL lifetime estimations requires not only robust methodologies, tools, policies and effective processes to be established, but also, sufficient sets of data and actual observations of realised figures

Staging allocation

- The **objectives** of the **test performed on the staging allocation** are related to the evaluation of the predictive power of the quantitative thresholds used for SICR assessment, the prior classification to Stage 2 before moving to Stage 3 and the stability of stage allocation over time.

Type of indicator used for the backtesting of the staging allocation¹



(1) Figure 50: IFRS 9 implementation by EU institutions (EBA, 2023)

6

Backtesting

Focus on backtesting practices (3/3)



Backtesting ECL lifetime estimations requires not only robust methodologies, tools, policies and effective processes to be established, but also, sufficient sets of data and actual observations of realised figures

FLI

- More than half of the institutions in the sample have not implemented backtesting. Main objective has been **assessing the reliability of the forecast of the macroeconomic variables** incorporated into the models.
- Backtesting analyses are expected to be periodically performed by all institutions to **evaluate the performance of the projections** of the internal macroeconomic forecasts used for ECL purposes.

ECL Measurement

- The **objectives of the backtesting of ECL** have been to evaluate whether the estimates of changes in ECL are consistent with the changes observable data.
- Institutions have generally compared the lifetime **ECL amount** with the **cumulated credit losses** incurred in a given period of time, others have compared the estimated ECL to the amount of actual losses incurred in the first year after the reporting period under consideration.

Overlays

- Overlays have often not been backtested, with the majority of institutions having no plans to implement such backtesting in the near future. In recent years, these overlays have become **an integral part of the ECL framework**. Its quantification is expected to be subject to backtesting analysis, in order to assess the **accuracy of the adjustments** introduced against realised figures
- Overlays' backtesting are considered valuable to gather **important insights** about the performance of the methodologies used for **quantifying the model adjustments**.

A | Annex

Abbreviations

CORP	Corporates which are not SMEs
EAD	Exposure At Default
EBA	European Banking Authority
ECL	Expected credit losses
ESG	Environmental, Social and Corporate Governance
EU	European Union
FLI	Forward-Looking Information
GDP	Gross Domestic Product
GLs	Final Guidelines
DoD	Definition of Default
HDP	High Default Portfolio
IFRS	International Financial Reporting Standard
IRB	Internal Ratings Based

LCRE	Low Credit Risk Exemption
LDP	Low Default Portfolio
LGD	Loss Given Default
MOC	Margin of conservatism
MORT	Retail mortgages which are not SMEs
PD	Probability of Default
PiT	Point-in-Time
RETO	Retail Order
RQRR	Retail Qualified Revolving
RSMS	Retail SME exposures secured by real estate
SICR	Significant Increase in Credit Risk
SME	Small and Medium Enterprises
SMEC	Corporate which are SMEs
SMOT	Other retail SME exposures

MSO
Management Solutions
Making things happen

International
One Firm

Multiscope
Team

Best practice
know-how

Proven
Experience

Maximum
Commitment

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