In depth IFRS 9 impairment: significant increase in credit risk

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Foreword

The introduction of the expected credit loss ('ECL') impairment requirements in IFRS 9 Financial Instruments represents a significant change from the incurred loss requirements of IAS 39. With this change comes additional complexity, both in interpreting the technical requirements and in applying them. For banks, as well as some other financial institutions, the change may be as significant, if not more so, than the initial adoption of IFRS.

A critical and highly judgemental area in the calculation of the ECL is the assessment of whether there has been a 'significant increase in credit risk' since initial recognition. If such an increase has occurred, an entity is required to recognise lifetime expected credit losses rather than just 12-month expected credit losses.

To help you navigate this complex area this publication brings together our latest thinking in key 'Frequently Asked Questions'. In addition, as good disclosures will be crucial for readers of the financial statements to understand the complexities and judgements in this area, we have included selected extracts from our publication 'IFRS 9 for banks – Illustrative disclosures'. The full suite of our Frequently Asked Questions on IFRS 9 and the complete 'IFRS 9 for banks – Illustrative disclosures' can be found at inform.pwc.com.

We hope accountants, modellers and others involved in IFRS 9 implementation projects find this publication both practical and useful. If you have any questions on the publication, or on other matters related to IFRS 9, then please speak to your usual PwC contact, to the IFRS 9 lead contact in your territory listed at the end of this publication, or with either of us.



Mark Randall
E: mark.b.randall@pwc.com



Sandra Thompson
E: sandra.j.thompson@pwc.com

PwC Global Banking Industry IFRS co-leads

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Frequently asked questions

1. Factors to take into account in determining a significant increase in credit risk

Question

If credit risk has not increased significantly since initial recognition, a 12 month ECL (Stage 1) is recognised (unless the financial asset is purchased or originated credit-impaired). If credit risk has increased significantly since initial recognition, a lifetime ECL (Stage 2) is recognised which may be significantly higher than a 12 month ECL. The assessment of what is considered to be a significant increase in credit risk therefore may have a significant impact on the loss allowance recognised.

What factors should an entity consider in determining what is a significant increase in credit risk?

Solution

What is a 'significant' increase in credit risk is not defined in IFRS 9. It is a highly judgmental area with no bright line. An entity will need to identify relevant factors that indicate a significant increase in credit risk based on facts and circumstances specific to the financial asset and how the entity manages credit risk. Typically, the assessment is made up of three elements:

- Quantitative element;
- · Qualitative element; and
- The 30 days past due 'backstop' indictor in IFRS 9 paragraph 5.5.11.

Factors an entity should consider in determining what is a significant increase in credit risk include the following (please note this is not an exhaustive list):

- 12 month vs. lifetime PD ('probability of default'): If a PD model is used, generally a lifetime PD should be used. As a practical expedient, a 12-month PD can be used if changes in the 12-month PD are a reasonable approximation to changes in the lifetime PD. This might be the case for instruments for which default patterns are not concentrated at a specific point in time and where circumstances do not indicate that a lifetime assessment is necessary. (See FAQ 9 on 'Assessing and re-assessing if changes in 12-month risk of default occurring can be used as a reasonable approximation to changes in lifetime risk of default occurring' on page 11 and IFRS 9 paragraph B5.5.13)
- *Risk of default rather than a change in expected losses:* IFRS 9 requires the assessment of significant increase in credit risk to be based on the change in risk of default occurring over the expected life of the instrument, rather than a change in expected losses. If a PD model is used, the PD measure is used and not the LGD ('loss given default'). For example, a fully collateralised loan can still be assessed as having a significant increase in credit risk even though the collateral may reduce the LGD such that the ECL is small. (See FAQ 10 'Assessing significant increases in credit risk for collateralised loans' on page 13 and IFRS 9 paragraph B5.5.12)
- Relative assessment: IFRS 9 requires an entity to compare the risk of default occurring over the expected life of the instrument at the reporting date with the risk of default at the date of initial recognition. This is a relative assessment. An absolute assessment that compares the PD at the reporting date with an absolute 'threshold' PD is not appropriate, unless it results in an outcome that is consistent with a relative approach. (See FAQ 5 'When can a significant increase in credit risk be assessed on an absolute, rather than relative, basis?' on page 7 and IFRS 9, Example 6)
- Residual life of instrument: The change in lifetime PD is considered by comparing the:
 - Remaining lifetime PD at reporting date; with

- Remaining lifetime PD for this point in time that was expected at initial recognition.

The comparison should not be to the lifetime PD at initial recognition as this may fail to identify a significant increase in credit risk when, as is usually the case, the PD is expected to reduce over time. So for example if the lifetime PD at initial recognition was 10% and the remaining lifetime PD at reporting date is also 10%, but the lifetime PD for this point in time that was expected at initial recognised is less than 10%, this might constitute a significant increase in credit risk. (IFRS 9 paragraph B5.5.11)

- What is a significant change varies with the risk of default at initial recognition: The increase in risk of default that is considered significant varies depending on the risk at initial recognition. The same absolute change in the risk of default will be more significant for an instrument with a lower initial risk of default as compared to an instrument with a higher initial risk of default. For example if a high grade loan or bond is assessed as having a 0.1% PD at initial recognition and this subsequently changes to 0.2% PD, the risk of default has increased by 100%. In comparison if the PD at initial recognition was 1% and this increased by the same absolute amount of 0.1% to 1.1%, this is an increase of only 10%. Therefore with everything else being equal, the absolute change in default risk that is considered significant should be less for the high grade instrument than for the lower grade one. (IFRS 9, paragraph B5.5.9)
- Stage 2 is not a 'waiting room' for default: Not all instruments in Stage 2 will default in the future. Some may stay in stage 2 for their remaining life and others may revert to stage 1. Instruments in Stage 2 should be monitored to assess whether there remains a significant increase in credit risk. If there is evidence that there is no longer a significant increase in credit risk, the instrument should be transferred back to Stage 1.
- Reasonable thresholds: Judgment is applied in determining what threshold would be considered a significant increase in credit risk. The risk of recognising expected losses too late should be balanced against setting parameters which are too narrow, resulting in instruments frequently moving in and out of the different stages without this reflecting a significant change in credit risk.
- Qualitative indicators: Qualitative factors should be considered separately, to the extent, they have not already been included in the quantitative assessment. The factors included in IFRS 9, paragraph B5.5.17 should be considered and those that are relevant in the particular facts and circumstances should be included in the assessment. If multiple qualitative factors are relevant, each factor should be weighted and their combined effect should be considered. (IFRS 9 paragraph B5.5.18)
- Backstop indicator: There is a rebuttable presumption that credit risk has significantly increased if contractual payments are more than 30 days past due. This presumption can only be rebutted if there is reasonable and supportable information demonstrating that credit risk has not increased since initial recognition. (IFRS 9 paragraph B5.5.19)

IFRS 7 requires an entity to provide disclosure of how it determines there has been a significant increase in credit risk. If the factors an entity takes into account and thresholds it uses in determining if there is a significant increase in credit risk is a critical estimate, the disclosures required by IAS 1 will need to be provided.

2. Qualitative and quantitative assessments of significant increases in credit risk (SICR)

Question:

To what extent could an assessment of a significant increase in credit risk (SICR) be performed either solely on a quantitative basis or solely on a qualitative basis?

Solution:

An assessment of SICR should incorporate all relevant, reasonable and supportable information, including forward-looking information, that is available without undue cost or effort. Such information might include:

- qualitative information;
- non-statistical quantitative information; and
- information from statistical models or credit ratings processes.

For banks and other entities, all such information should be considered; although, on a case-by-case basis, more weight might be given to some types of information than to others.

Banks are expected to have information from statistical models or credit ratings processes, which will be a key part of their assessment of SICR. However, it will generally not be appropriate to look solely to such information, even though it might incorporate the qualitative judgement of an entity's credit officer. This is because there will generally be some relevant, reasonable and supportable information that is not captured in the credit ratings modelling process. There are likely to be some uncertain forward-looking events that, by their nature, cannot be incorporated into the modelling process and therefore must be considered based on qualitative and non-statistical qualitative information (for example, the possible outcome and impact of an impending independence referendum).

In other circumstances (for example, in respect of inter-company loans and for non-financial entities with less sophisticated credit risk systems), statistical models or internal credit ratings processes might not be available without undue cost or effort. In such cases, there is no requirement to do complex statistical modelling. However, other relevant information, that might include simpler modelling, should be used to make an assessment of SICR.

As noted in paragraph B5.5.18 of IFRS 9, in some cases, qualitative and non-statistical quantitative information alone might be sufficient to determine that an individual financial instrument (or a loan portfolio) has suffered a SICR. That is, the information does not always need to flow through a statistical model or credit ratings process in order to determine that there has been a SICR of the financial instrument.

This might be the case when an event relevant to the specific loan or loan portfolio being assessed is so significant or obvious at a particular point in time that, regardless of other factors, it is assessed that there has been a SICR. An example is Greek sovereign debt held when there was significant uncertainty over the future refinancing of Greek government bonds. Furthermore, once the '30 days past due' backstop has been met (and is not rebutted), there is no need for further quantitative analysis to conclude that there has been a SICR for those loans.

3. Can an entity use only behavioural indicators of credit risk when assessing significant increases in credit risk since initial recognition?

Question

Can an entity use only behavioural measures of credit risk to assess whether there is a significant increase in credit risk since initial recognition? Examples of such behavioural indicators include:

- a. A customer has made only the minimum monthly repayment for a specified number of months;
- b. A customer has failed to make a payment on a loan with a different lender; or
- c. A customer has failed to make a specified number of minimum monthly repayments.

Solution

No. Behavioural information is usually based on historical information while IFRS 9 requires a holistic analysis that includes the use of forward-looking information. In accordance with paragraph 5.5.4 of IFRS 9 entities should ensure that any assessment of whether there has been a significant increase in credit risk includes all reasonable and supportable information, including forward-looking information.

When assessing whether there has been a significant increase in credit risk, entities are required to consider a range of indicators. A significant increase in credit risk is expected to occur prior to delinquency. While behavioural indicators should not be ignored, behavioural indicators such as those listed in the question are often lagging indicators of increases in credit risk and therefore they should be considered in conjunction with other, more forward-looking information. An entity must consider how to source and incorporate forward-looking information into the assessment of significant increases in credit risk and may need to do this on a collective basis if forward-looking information is not available at an individual financial instrument level.

When considering the use of behavioural indicators, an entity should:

- a. focus on identifying pre-delinquency behavioural indicators of increases in credit risk, for example increased utilisation rates or increased cash drawings on specific products;
- b. only use indicators that are relevant to the risk of default occurring;
- c. establish a link between the behavioural indicators of credit risk and changes in the risk of default occurring since initial recognition;
- d. be mindful that while behavioural indicators are often predictive of defaults in the short term, they are often less predictive of defaults in the longer term so other information may be required to identify an increase in the risk of defaults occurring in the longer term; and
- e. consider whether the use of behavioural indicators is appropriate for the type of product being assessed—for example, if the payments on a loan are due primarily at or near the end of its life, behavioural indicators based on timeliness of payment will not be appropriate.

4. 'Top down' versus 'bottom up' approach

Bank ABC provides mortgages to finance residential real estate in three different regions. The bank sets its acceptance criteria based on credit scores, and loans with a credit score above the 'acceptance level' are approved, as these borrowers are considered to be able to meet contractual payment obligations. When new mortgage loans are originated, Bank ABC uses the credit score to determine the risk of a default occurring as at initial recognition.

Individual assessment

In Region One, Bank ABC assesses each of its mortgage loans on a monthly basis by means of an automated behavioural scoring process that is based on current and historical past-due statuses, indebtedness, loan-to-value ('LTV') measures, customer behaviour on other financial instruments with Bank ABC, the loan size and the time since the origination of the loan. Bank ABC updates LTV measures on a regular basis through an automated process that re-estimates property values using recent sales. Historical data indicates a strong correlation between the value of residential property and default rates for mortgages, which is factored into the behavioural score. Bank ABC is able to identify significant increases in credit risk since initial recognition on individual customers before a mortgage becomes past due if there has been deterioration in the behavioural score.

When the increase in credit risk has been significant, a loss allowance at an amount equal to lifetime ECL is recognised; otherwise, a loss allowance at an amount equal to 12-month ECL continues to be recognised. The loss allowance is measured using LTV measures to estimate the severity of the loss. If Bank ABC is unable to update behavioural scores (for example, to reflect the expected decline in property prices), it uses reasonable and supportable information that is available without undue cost or effort to undertake a portfolio assessment, to determine the loans on which there has been a significant increase in credit risk since initial recognition and recognise lifetime ECL for those loans.

Portfolio assessment

In Regions Two and Three, Bank ABC does not have an automated scoring capability. Instead, for credit risk management purposes, Bank ABC tracks the risk of a default occurring by means of past-due statuses. It recognises a loss allowance at an amount equal to lifetime ECL for all loans that have a past-due status of more than 30 days past due. Although Bank ABC uses past-due status information as the only borrower-specific information, it also considers other reasonable and supportable forward-looking information that is available without undue cost or effort to assess whether lifetime ECL should be recognised on loans that are not more than 30 days past due. This is necessary in order to meet the objective (in paragraph 5.5.4 of IFRS 9) of recognising lifetime ECL for all significant increases in credit risk.

Region Two includes a mining community that is largely dependent on the export of coal and related products. Bank ABC becomes aware of a significant decline in coal exports and anticipates the closure of several coal mines. Because of the expected increase in the unemployment rate, the risk of a default occurring on mortgage loans to borrowers in this area who rely on the coal mines is determined to have increased significantly, even if those customers are not past due at the reporting date. Bank ABC segments its mortgage portfolio, by the industry within which customers are employed, to identify customers that rely on coal mining as the dominant source of employment (that is, the 'bottom up' approach). For such groups of mortgages, Bank ABC recognises a loss allowance at an amount equal to lifetime ECL, while it continues to recognise a loss allowance at an amount equal to 12-month ECL for all other mortgages in Region Two. Newly originated loans to borrowers who rely on the coal mines in this community would, however, have a loss allowance at an amount equal to 12-month ECL, as they would not have experienced a significant increase in credit risk since initial recognition.

In Region Three, Bank ABC anticipates the risk of a default occurring, and thus an increase in credit risk, as a result of an expected increase in interest rates during the expected life of the mortgages. Historically, an increase in interest rates has been a lead indicator of future defaults on mortgages in Region Three, especially when customers do not have a fixed interest-rate mortgage. Bank ABC determines that the variable interest-rate portfolio of mortgages in Region Three is homogeneous and that, unlike for Region Two, it is not possible to identify particular sub-portfolios on the basis of shared risk characteristics that represent customers whose credit risk is expected to have increased significantly. However, as a result of the homogeneous nature of the mortgages in Region Three, Bank ABC determines that an assessment can be made of a proportion of the overall portfolio that has significantly increased in credit risk since initial recognition (that is, a 'top down' approach can be used). Based on historical information, Bank ABC estimates that an increase in interest rates of 200 basis points will cause a significant increase in credit risk on 20% of the variable interest-rate portfolio.

Therefore, as a result of the anticipated increase in interest rates, Bank ABC determines that the credit risk on 20% of mortgages in Region Three has increased significantly since initial recognition. Accordingly, it recognises lifetime ECL on 20% of the variable rate mortgage portfolio, and a loss allowance at an amount equal to 12-month ECL for the remainder of the portfolio.

Analysis

In this case, where the individual assessment only takes into account past due information, the bank is required to complete an assessment of changes in credit risk at a portfolio level using more forward-looking information. To complete this assessment, the bank has used both the 'bottom up' and the 'top down' approach, based on the information available for each portfolio. Both approaches are acceptable according to the standard.

In addition, an entity should subdivide a portfolio if it identifies that there has been a significant increase in credit risk that applies only to a portion of a given portfolio. This might indicate that the risk characteristics have become different and therefore it is necessary to subdivide the portfolio.

5. When can a significant increase in credit risk be assessed on an absolute, rather than relative, basis?

Question

In order to determine whether there has been a significant increase in credit risk, an entity compares the risk of a default occurring over the expected life of the financial instrument as at the reporting date with the risk of default as at the date of initial recognition. This is a relative assessment.

When can an absolute (or threshold) measure of credit risk at the reporting date be used to determine whether there has been a significant increase in credit risk?

Solution

IFRS 9 is clear that the assessment of significant increase in credit risk is a relative one. It is only appropriate to use an absolute measure when doing so results in a consistent outcome as under a relative approach.

Paragraph 5.5.9 of IFRS 9 requires an assessment of relative increases in credit risk since initial recognition, rather than the identification of a specific level of credit risk at the reporting date. Further, paragraph BC5.161 of IFRS 9 notes that an absolute approach to determining significant increases in credit risk was explicitly considered and rejected by the IASB. This was reinforced by the Transition Resource Group for Impairment of Financial Instruments (ITG) at its September 2015 meeting: the ITG noted that IFRS 9's impairment model is based on an assessment of changes in credit risk since initial recognition, rather than the identification of a specific level of credit risk at the reporting date.

However, the ITG also noted that the assessment of significant increases in credit risk may be made using a form of absolute approach, but only provided that such an approach is consistent with the requirement to identify significant increases in credit risk since initial recognition. Illustrative example 6 of IFRS 9 illustrates how such an approach could be applied to a portfolio of automobile loans. Accordingly, an absolute threshold approach may be appropriate in certain narrow circumstances when:

- the entity can identify groups of loans whose credit risk on initial recognition falls within a narrow band regardless of the date of initial recognition of the individual loans within that group:
- the entity can demonstrate that increases in credit risk within this narrow band do not represent a significant increase in credit risk since initial recognition, but increases in credit risk beyond this narrow band do represent a significant increase in credit risk since initial recognition; and
- the assessment of whether the credit risk of an individual loan remains within the narrow band takes
 into consideration a wide range factors. These factors include internal and external indicators of credit
 risk, changes to contractual terms, actual and expected performance and behaviours and forecasts of
 future conditions.

Paragraph 5.5.10 of IFRS 9 provides a form of absolute threshold, allowing entities to assume that credit risk has not increased significantly since initial recognition if the financial instrument has low credit risk at reporting date – essentially, a practical expedient for financial assets with low credit risk. Even where an instrument is considered to no longer have low credit risk at reporting date, an entity must still determine whether the increase in credit risk since initial recognition is significant, and therefore, if the instrument must move to stage 2.

6. Use of external ratings when assessing for significant increases in credit risk

Question:

To what extent can an external rating of a financial instrument, or the external rating of the issuer of the instrument, be taken into account when the holder of the instrument is making an assessment of a significant increase in credit risk (SICR) since initial recognition?

Solution:

The assessment of SICR should meet the objective of IFRS 9, which is to consider reasonable and supportable information that is relevant to the instrument being assessed, including forward-looking information, and that is available without undue cost or effort. Such information includes external ratings for both the issuer and for the instrument, if available.

An instrument's external rating might solely reflect the risk of default of the instrument, in which case the external rating on its own might be sufficient to determine whether there has been a SICR. However, all of the factors that impact external ratings (that is, for both the instrument's rating and the issuer's rating) should be considered. This is because ratings might incorporate information that is not relevant to determining SICR, for example, if the instrument is guaranteed and the guarantor's rating is reflected in the instrument's rating.

This is because, as noted in FAQ 11, cash flows expected from guarantees and other credit enhancements should not be included in the assessment of SICR. If external ratings of the instrument include expected cash flows from the guarantee (for example, the credit rating of the guarantor), this should be adjusted for IFRS 9 purposes; or, if it is not practicable to do so, the rating might be given less weight or disregarded in the assessment of SICR.

It might be necessary to consider whether other relevant information that is not reflected in the external rating should also be incorporated into the assessment of SICR. For example, ratings that primarily reflect lagging indicators might need to be supplemented with more forward-looking qualitative information. Furthermore, an issuer's rating might need to be supplemented with more instrument-specific information.

7. Counterparty assessment of significant increase in credit risk

Question

Bank ABC grants a loan to Entity A when the internal credit rating of Entity A is 4. A year later, Entity A loses a contract with a major customer. Bank ABC changes its internal credit rating for Entity A to 5. Some time later when Entity A's credit rating is still 5, Bank ABC grants a new loan to Entity A at a market rate of interest. For credit risk management purposes Bank ABC assesses credit risk on a counterparty level for credit risk management purposes rather than an individual loan balance.

Bank ABC assess the increase in the internal credit rating from 4 to 5 to be a significant increase in credit risk.

Should lifetime ECL be recognised on both the old and new loan advanced to Entity A, given the significant increase in credit risk at reporting date?

Solution

No. The unit of account for impairment purposes is the individual loan balance and not the counterparty. Hence Bank ABC must assess whether there has been a significant increase in credit risk for each loan individually. A counterparty assessment would not reflect that:

- the second loan issued when the internal rating was already 5, has not suffered a significant increase in credit risk and so only a 12 month ECL should be recognised on this loan.
- the first loan, issued when Entity A's internal credit rating was 4, has suffered a significant increase in credit risk and so a lifetime ECL should be recognised.

There may be instances in which a counterparty assessment could achieve the same result (i.e. timing of moving from stage 1 to stages 2 or 3) as assessing the change in credit risk for each loan individually. (See IFRS 9 Illustrative Example 7) For example if Entity A's internal credit rating had changed from 4 to 5 after both loans were advanced, the counterparty assessment in this case would achieve the same result as assessing the change in credit risk for each loan individually because credit risk on each loan increased significantly since its initial recognition.

8. Assessing significant increase in credit risk for financial assets with a maturity of less than 12 months

Question

Should financial assets with a maturity of less than 12 months be assessed for significant increase in credit risk?

Solution

Yes, IFRS 9 requires an entity to assess whether there has been a significant increase in credit risk for all financial assets (unless a more specific exception applies). This includes financial assets with a maturity of 12 months or less. Even though the 12 month ECL is the same as lifetime ECL for these financial assets, the distinction is required for disclosure purposes since IFRS 7 paragraphs 35H, 35I and 35M requires entities to disclose separately financial instruments for which the loss allowance is equal to 12 months ECL or lifetime ECL. This FAQ is consistent with the decision reached by the ITG in its December 2015 meeting.

The only exception is where the simplified approach of always measuring the loss allowance at lifetime expected credit losses is used. This simplified approach is required for trade receivables and contract assets without a significant financing component and may be elected for lease receivables and trade receivables with a significant financing component and contract assets. Where the simplified approach is used the disclosures referred to above are not required and so there is no need to assess whether there has been a significant increase in credit risk for those assets.

9. Assessing and re-assessing if changes in 12-month risk of default occurring can be used as a reasonable approximation to changes in lifetime risk of default occurring

Paragraph B5.5.13 of IFRS 9 acknowledges that for instruments for which default patterns are not concentrated at a specific point during their expected life, changes in the risk of a default occurring over the next 12 months may be a reasonable approximation of the changes in lifetime risk of a default occurring. In such cases, an entity may use changes in the risk of default occurring over the next 12 months to determine whether credit risk has increased significantly since initial recognition, unless circumstances indicate that a lifetime assessment is necessary.

Question 1:

What level of initial analysis is required when an entity assesses whether to use such an approximation?

Solution 1:

If an entity considers using changes in the risk of default occurring over the next 12 months (such as changes in the 12-month PD) as a reasonable approximation to changes in lifetime risk of default occurring (for example, changes in lifetime PD), it needs to complete a robust analysis before first use of the approximation, to support that conclusion. The level of initial analysis required would depend on the specific type of financial instrument being considered. Consequently, in some cases a qualitative analysis would suffice, whereas in other cases a quantitative analysis may be necessary. It may be appropriate to segregate portfolios (for example by maturity) in order to facilitate the analysis for groups of similar financial instruments.

As indicated in paragraph B5.5.14 of IFRS 9, in some circumstances changes in the 12-month risk of a default occurring may not be an appropriate proxy for a lifetime assessment, for example when:

- a. the financial instrument only has significant payment obligations beyond the next 12 months;
- b. changes in relevant macroeconomic or other credit-related factors occur that are not adequately reflected in the risk of a default occurring in the next 12 months; or
- c. changes in credit-related factors only have an impact on the credit risk of the financial instrument (or have a more pronounced effect) beyond 12 months.

Question 2:

How should an entity re-assess whether it is appropriate to continue to use such an approximation at subsequent reporting dates?

Solution 2:

An entity needs to be satisfied on an ongoing basis that the use of changes in the 12-month risk of a default occurring continues to be a reasonable approximation for changes in the lifetime risk of a default occurring. This need not be a full analysis, such as that undertaken on initial use of the approximation for a particular financial instrument or portfolio. For example, a quantitative review would not necessarily be required, but this would depend on the specific facts and circumstances. However, at each reporting date the entity would need to consider whether a change in circumstances indicate that a lifetime assessment is necessary. One way of approaching an ongoing review, as suggested by the ITG at its meeting in September 2015, would be as follows:

- a. identify the key factors that would affect the appropriateness of using changes in the 12-month risk of a default occurring as an approximation of changes in the lifetime risk of default occurring;
- b. monitor these factors on an ongoing basis as part of a qualitative review of circumstances; and
- c. consider whether any changes in those factors indicate that changes in the 12-month risk of a default occurring is no longer an appropriate proxy for changes in a lifetime risk of default occurring.

If it was determined that changes in the 12-month risk of a default occurring were no longer a reasonable approximation for the assessment of changes in the lifetime risk of a default occurring, an entity would be required to determine an appropriate approach to assess significant increases in credit risk that captures changes in the lifetime risk of a default occurring.

Question 3:

What else should an entity consider when using changes in 12-month risk of default occurring as an approximation to changes in lifetime risk of default occurring?

Solution 3:

Entities are required to disclose how they make the assessment of significant increases in credit risk in accordance with paragraph 35G of IFRS 7.

10. Assessing significant increases in credit risk for collateralised loans

Company H owns real estate assets which are financed by a five-year amortising loan from Bank Z, with a PD of 0.5% over the next 12 months; Bank Z has assessed that, for this particular instrument, changes in the 12-month ECL are considered a reasonable approximation to changes in lifetime ECL. The loan is secured with first-ranking security over the real estate assets.

Subsequent to initial recognition, the revenues and operating profits of Company H have decreased because of an economic recession. Furthermore, expected increases in regulation have the potential to negatively affect revenue and operating profit further. These negative effects on Company H's operations could be significant and ongoing.

As a result of these recent events and expected adverse economic conditions, Company H's free cash flow is expected to be reduced to the point that the coverage of scheduled loan payments could be tight. Bank Z estimates that a further deterioration in cash flows might result in Company H missing a contractual payment on the loan and becoming past due.

As a consequence of these facts, the PD has increased by 15% to 15.5%.

At the reporting date, the loan to Company H is not considered to have low credit risk. Bank Z, therefore, needs to assess whether there has been a significant increase in credit risk since initial recognition, irrespective of the value of the collateral that it holds. It notes that the loan is subject to considerable credit risk at the reporting date, because even a slight deterioration in cash flows could result in Company H missing a contractual payment on the loan. As a result, Bank Z determines that the credit risk (that is, the risk of a default occurring) has increased significantly since initial recognition. Consequently, it recognises lifetime ECL on the loan to Company H.

Although lifetime ECL should be recognised, the amount of the ECL will reflect the recovery expected from the collateral on the property value and might result in the expected credit loss being very small.

In this case, the bank considered both PD and other information (such as macroeconomic and client-specific information) in order to determine whether a significant increase in credit risk occurred. When making this assessment, the entity did not take into account the fact that the loan was collateralised. An assessment based on LGD information only would not have identified that credit risk had increased significantly for the asset. Nevertheless, when calculating ECL the bank should factor in the expected recovery from collateral.

11. Assessing significant increase in credit risk for guaranteed debt instruments

Question

Should a financial guarantee holder consider the ability to recover cash flows from the financial guarantee when assessing whether there has been a significant increase in the credit risk of the guaranteed debt instrument?

Solution

This issue was discussed by the IFRS Transition Resource Group for Impairment of Financial Instruments ('ITG') in its April 2015 meeting. The ITG members generally agreed that IFRS 9 is clear that collateral is not taken into account when assessing significant changes in credit risk. They reiterated the example in the standard, that the ability to reduce cash shortfalls through the enforcement of collateral does not reduce the risk of default occurring on the financial instrument.

Banks might look to argue that the ability to recover cash flows from the guarantor also affects the assessment of whether there has been a significant increase in credit risk, particularly in instances where the collateral is likely to be used as the primary source of payment in default situations. However, IFRS 9 would not generally allow exceptions to the requirement that, when assessing significant increases in credit risk, the ability to recover such cash flows should not be considered.

12. How should modified loans, such as loans subject to 'forbearance', be classified within the IFRS 9 impairment model?

Question

When a borrower is in financial difficulty, to maximise recovery of the contractual cash flows of the loan a bank may offer to modify the contractual terms. For example, the borrower may be offered a payment holiday. This is done with the objective of helping the borrower during their period of financial difficulty but still maximising recovery by the bank of the loan's contractual cash flows. For loans such as retail mortgages, this also helps avoid the need to repossess the borrower's home. Such modifications are sometimes referred to as 'forbearance', though definitions of this term may differ between banks, between different regulatory regimes and over time if definitions evolve.

When a bank grants a modification to a borrower due to their financial difficulty and this does not result in derecognition, in which 'stage' of the IFRS 9 ECL impairment model (i.e. stage 1 'performing', stage 2 'underperforming' or stage 3 'credit impaired') should the loan be classified i) at the time of modification and ii) subsequently? The loan was not purchased or originated credit impaired.

Solution

i) At the time of modification

The appropriate classification of the loan will depend on the specific facts and circumstances of the modification granted to the customer. The definition of a 'Credit-impaired financial asset' (i.e. stage 3) in Appendix A of IFRS 9 states that:

"A financial asset is credit-impaired when one or more events that have a detrimental impact on the estimated future cash flows of that financial asset have occurred. Evidence that a financial asset is credit-impaired include observable data about the following events: ...

(c) the lender(s) of the borrower, for economic or contractual reasons relating to the borrower's financial difficulty, having granted to the borrower a concession(s) that the lender(s) would not otherwise consider; ..."

Considering each of the three possible stages:

- Stage 3 In many cases the loan will meet the definition of Credit Impaired ('stage 3') as the forbearance concession has only been granted due to the borrower's financial difficulty, the lender would not otherwise grant such a concession and the concession has a detrimental effect on the estimated future cash flows, for example as a portion of the interest or principal payments are waived.
- Stage 2 Where the loan does not meet the definition of Credit Impaired, then it should be classified in stage 2. This may be the case, for example, when a customer is not in significant financial difficulty and:
 - a short term payment holiday is granted where payments are only deferred (rather than waived) and interest accrues on the unpaid deferred amounts, with the result that there is not a detrimental impact on the estimated future cash flows of the loan.
 - a loan covenant is amended or waived, which is not considered to have a detrimental impact on the estimated cash flows.
- Stage 1 At the time of granting a modification to a borrower that is a concession due to their financial difficulty, it would not be appropriate to classify the loan in 'stage 1'.

As well as considering the ECL implications of the modification, paragraph 5.4.3 of IFRS 9 requires the gross carrying amount of the loan to be recalculated and a corresponding modification gain / loss to be recognised in profit or loss when the contractual cash flows of a loan asset are renegotiated or otherwise modified and this does not result in derecognition of the loan.

ii) Subsequent classification

As described in paragraph B5.5.27 of IFRS 9, following such a modification, a loan is not automatically considered to have lower credit risk. Typically a borrower would need to demonstrate consistently good payment behaviour over a period of time before the credit risk is considered to have decreased and the loan moves from stage 3 to stage 2, or from stage 2 to stage 1. A history of missed or incomplete payments would not typically be erased by simply making one payment on time.

The stage classification under IFRS 9 is a separate matter from whether or not a loan still meets a definition of 'forbearance', as the latter could reflect a regulatory definition which requires a different 'probation' period. That is, it should not be assumed that a regulatory 'probation' period can be used as the period of good payment behaviour needed to move an asset from stage 2 or from stage 2 and stage 1 for IFRS 9 purposes.

Disclosure

Appropriate disclosure should also be given in accordance with IFRS that describe how an entity determines whether:

- the credit risk of financial instruments has increased significantly since initial recognition (paragraph 35F (a));
- financial assets are credit-impaired (paragraph 35F (a & d)); and
- modified financial asset moves from stage 3 to 2, and stage 2 to 1 (paragraph 35F (f)).

13. How should the IFRS 9 impairment model be applied when interest rate is re-set in response to a deterioration in the borrower's credit risk (ratchet loans)?

Some wholesale loans (in particular syndicated loans) include price ratcheting clauses. Under these clauses the contractual interest rate is re-set in accordance with a scale of pre-defined rates on the occurrence of one or more pre-defined events that are linked to a deterioration in the borrower's credit risk (such as a specified gearing ratio of the borrower, interest cover or profit before tax of the borrower). These clauses are included to avoid the need to renegotiate the loan with all syndicate parties when the credit risk of the borrower changes.

Question

How should the IFRS 9 impairment model be applied to ratchet loans?

Solution

Significant increase in credit risk

IFRS 9 has no specific guidance on significant increase in credit risk for ratchet loans. Hence the IFRS 9 guidance on significant increase in credit risk should be applied to ratchet loans in the same way as for non-ratchet loans. A loan should be transferred to stage 2 (and a lifetime expected credit loss recognised) as required by paragraph 5.5.3 of IFRS 9 when there is a significant increase in credit risk since initial recognition, regardless of whether that coincides with the rate on the loan being reset. The reset of the rate per se does not preclude the ratchet loan from moving from stage 1 to stage 2. However, the effect of the rate reset should be taken into consideration when determining the risk of default for inclusion in the assessment of a significant increase in credit risk since initial recognition, for example if the increased cash payments increase the probability of default.

Expected credit loss (ECL) measurement

As required by paragraph 5.5.17 of IFRS 9 an entity shall measure ECL by evaluating a range of possible outcomes. The entity should consider in measurement of ECL any effect of the rate on the ratchet loan being reset on possible outcomes, for example, if the increased cash payments increase the likelihood that the loan will be prepaid.

IFRS 9 impairment: significant increase in credit risk

14. On transition to IFRS 9 do the historical measures of credit risk at the date of initial recognition need to be adjusted?

Question

On implementing IFRS 9, an entity makes some revisions to its methodology and models for determining the credit risk (e.g. the probability of default (PD) or internal credit ratings) of its financial assets. On transition to IFRS 9, should the entity make any adjustments to its historical measures of credit risk (e.g. PDs or internal credit ratings) at initial recognition for the purposes of assessing whether there has been a significant increase in credit risk?

Solution

The entity should make appropriate adjustments to the historical PDs, internal credit ratings or other measures of credit risk at initial recognition to the extent needed to approximate to measures of credit risk that are compliant with IFRS 9. For example, the entity should consider whether forward looking information and incorporating multiple scenarios on a weighted average basis at the date of initial recognition might materially impact the PDs or internal credit ratings at initial recognition.

This is because on transition to IFRS 9, an entity should apply the impairment requirements of IFRS 9 retrospectively. However, on transition IFRS 9 explicitly permits an entity to seek to *approximate* the credit risk on initial recognition.

An entity should use reasonable and supportable information that is available without undue cost or effort to approximate the credit risk at the date of initial recognition. However, an entity is not required to undertake an exhaustive search for information. If, at the date of initial application of IFRS 9, an entity is unable to determine whether there has been a significant increase in credit risk since initial recognition without undue cost or effort, the entity should recognise lifetime expected credit losses (unless the financial asset has low credit risk at the reporting date (see paragraph 45.19)).

Illustrative Example 6 of IFRS 9 describes a method by which an entity could assess whether there has been a significant increase in credit risk using an absolute threshold approach at the reporting date, by comparison to the maximum initial credit risk. Although Illustrative Example 6 does not explicitly refer to forward looking information and incorporating multiple scenarios, such factors should be considered when applying an absolute threshold approach on transition to IFRS 9. Accordingly, in these circumstances, similar adjustments may be needed to historical PDs or internal credit ratings when considering whether an absolute threshold approach to assessing significant increases in credit risk may be appropriate, as discussed in FAQ 5 'When can a significant increase in credit risk be assessed on an absolute, rather than relative, basis?' on page 7.

Illustrative disclosure notes extracts

The extracts below relating to 'significant increase in credit risk' are taken from our publication 'IFRS 9 for banks – illustrative disclosures' which presents the disclosures introduced or modified by IFRS 9 'Financial Instruments' for a fictional medium-sized bank. Supporting commentary is also provided. The extracts are for illustrative purposes only and should be considered in conjunction with the relevant financial reporting standards and any other reporting pronouncements and legislation applicable in specific jurisdictions.

IFRS 9 allows a variety of approaches in measuring ECL and industry thinking continues to evolve. Banks will therefore need to take account of their individual circumstances in determining the appropriate disclosures. The approach illustrated in the extracts below is just one possible way the requirements of IFRS 9 ECL may be met but is not intended to provide any view on the type of approach that should be applied.

The example disclosures may not be the only acceptable form of presenting financial statement disclosures. Alternative presentations may be acceptable if they comply with the specific disclosure requirements prescribed by IFRS. Readers may find our IFRS disclosure checklist useful to identify other disclosures that may be relevant under the circumstances but are not illustrated. Conversely, disclosures presented should not be included where they are not relevant or not material in specific circumstances.

IFRS7(35F)(a)

3.1.2.1 Significant increase in credit risk (SICR)

IFRS7(35G) (a)(ii) The Group considers a financial instrument to have experienced a significant increase in credit risk when one or more of the following quantitative, qualitative or backstop criteria have been met:

Quantitative criteria:

The remaining Lifetime PD at the reporting date has increased, compared to the residual Lifetime PD expected at the reporting date when the exposure was first recognised, so that it exceeds the relevant threshold per the table below:

Retail Mortgages

Lifetime PD band at initial recognition	Increase in Lifetime PD at reporting date which is considered significant
≤a%	[X]bps
>a% and ≤b%	[X]bps
>b% and ≤c%	[X]bps
[add additional bands as necessary]	

Other retail products:

Lifetime PD band at initial recognition	Increase in Lifetime PD at reporting date which is considered significant
≤a%	[X]bps
>a% and ≤b%	[X]bps
>b% and ≤c%	[X]bps
[add additional bands as necessary]	

Wholesale

Lifetime PD band at initial recognition	Increase in Lifetime PD at reporting date which is considered significant
≤a%	[X]bps
>a% and ≤b%	[X]bps
>b% and ≤c%	[X]bps
[add additional bands as necessary]	

To illustrate the application of these thresholds, take for example a 25-year Retail Mortgage exposure which at initial recognition five years ago had a Lifetime PD of [X]% and was expected to have a residual Lifetime PD of [Y]% five years later at the current reporting date. If at the current reporting date the lifetime PD is actually [Z]% and this exceeds the expected PD of [Y]% by more than the threshold shown above, then a significant increase in credit risk has occurred.

These thresholds have been determined separately for Retail Mortgages, Other retail products and Wholesale, by assessing how the Lifetime PD moves prior to an instrument becoming delinquent. The Lifetime PD movements on instruments which do not subsequently become delinquent have also been assessed, to identify the "natural" movement in Lifetime PD which is not considered indicative of a significant increase in credit risk.

IFRS7(35G)(a)(ii)

Qualitative criteria:

For Retail portfolios, if the borrower meets one or more of the following criteria:

- In short-term forbearance
- Direct debit cancellation
- Extension to the terms granted
- Previous arrears within the last [12] months

For Wholesale and Treasury portfolios, if the borrower is on the Watchlist and/or the instrument meets one or more of the following criteria:

- Significant increase in credit spread
- Significant adverse changes in business, financial and/or economic conditions in which the borrower operates
- Actual or expected forbearance or restructuring
- Actual or expected significant adverse change in operating results of the borrower
- Significant change in collateral value (secured facilities only) which is expected to increase risk
 of default
- Early signs of cashflow/liquidity problems such as delay in servicing of trade creditors/loans

The assessment of SICR incorporates forward-looking information (refer to note 3.1.2.4 for further information) and is performed on a quarterly basis at a portfolio level for all Retail financial instruments held by the Group. In relation to Wholesale and Treasury financial instruments, where a Watchlist is used to monitor credit risk, this assessment is performed at the counterparty level and on a periodic basis. The criteria used to identify SICR are monitored and reviewed periodically for appropriateness by the independent Credit Risk team.

PwC observation - Disclosure of SICR criteria

In the illustrative disclosure presented above, consistent criteria have been applied to each of Retail Mortgages, Other retail products and Wholesale. In practice, a significant increase in credit risk might be determined differently for different products or portfolios within such groupings, in which case the disclosures presented above should be adapted accordingly.

IFRS7(35F) (a)(ii)

Backstop

A backstop is applied and the financial instrument considered to have experienced a significant increase in credit risk if the borrower is more than 30 days past due on its contractual payments.

IFRS7(35F)(a)(i)

The Group has not used the low credit risk exemption for any financial instruments in the year ended 31 December 2018.

PwC observation – Significant increase in credit risk (SICR) and IAS 1 critical estimates disclosure

Defining SICR is likely to be a critical element within the overall ECL estimate, given the potential effect on provisions of moving financial instruments from 12-month ECL to Lifetime ECL. Appropriate disclosure should, therefore, be provided in accordance with IAS 1. The nature of the disclosure will need to take account of the specific approach(es) taken by an entity to determine SICR. Different impacts on distinct portfolio types may also warrant varying depths of disclosure. One possible way in which a disclosure could be presented is illustrated below.

The following table shows the impact on the 31 December 2018 ECL allowance of changing the PD thresholds for SICR. Increases in ECL (positive amounts) represent higher impairment allowances that would be recognised.

ECL impact of

Lifetime PD band at initial recognition	Actual threshold applied	Change in threshold	Lower threshold	Higher threshold
Retail mortgages				
≤a%	[X]bps	[-/+ X]bps	X	[X]
>a% and ≤b%	[X]bps	[-/+ X]bps	X	[X]
>b% and ≤c%	[X]bps	[-/+ X]bps	X	[X]
Other retail produ	cts			
≤a%	[X]bps	[-/+ X]bps	X	[X]
>a% and ≤b%	[X]bps	[-/+ X]bps	X	[X]
>b% and ≤c%	[X]bps	[-/+ X]bps	X	[X]
Wholesale				
≤a%	[X]bps	[-/+ X]bps	X	[X]
>a% and ≤b%	[X]bps	[-/+ X]bps	X	[X]
>b% and ≤c%	[X]bps	[-/+ X]bps	X	[X]

IFRS 9 lead contact by territory

Name	Territory	Email
Sam Hinchcliffe	Australia	sam.hinchcliffe@pwc.com
Dorotea Rebmann	Austria	dorotea.rebmann@pwc.com
Jeroen Bockaert	Belgium	jeroen.bockaert@pwc.com
Chris Wood	Canada	christopher.r.wood@pwc.com
Martin Gallovic	CEE	martin.gallovic@pwc.com
Addison L Everett	China	addison.l.everett@cn.pwc.com
Stelios Constantinou	Cyprus	stelios.constantinou@cy.pwc.com
Burkhard Eckes	Germany	burkhard.eckes@pwc.com
Nikolaos Kalogiannis	Greece	nikolaos.kalogiannis@gr.pwc.com
John McDonnell	Ireland	john.mcdonnell@ie.pwc.com
Pierfrancesco Anglani	Italy	pierfrancesco.anglani@it.pwc.com
Trevor T Tisseverasinghe	Japan	trevor.t.tisseverasinghe@pwc.com
Fabrice Goffin	Luxembourg	fabrice.goffin@lu.pwc.com
Elaine Ng	Malaysia	yee.ling.ng@my.pwc.com
Juan LaGreca	Mexico	juan.la.greca@mx.pwc.com
Gareth Davies	Netherlands	gareth.j.davies@pwc.com
Didrik Thrane-Nielsen	Norway	didrik.thrane-nielsen@pwc.com
Flavio Palaci	Poland	flavio.palaci@cz.pwc.com
Luis Filipe Barbosa	Portugal	luis.filipe.barbosa@pt.pwc.com
Natalia Mileshkina	Russia	natalia.mileshkina@ru.pwc.com
Voon Hoe Chen	Singapore	voon.hoe.chen@sg.pwc.com
Christiaan Nel	South Africa	christiaan.nel@pwc.com
Jose Arostegui	Spain	iose.arostegui@es.pwc.com
Anneli Granqvist	Sweden	anneli.granqvist@pwc.com
Michael J E Eiber	Switzerland	michael.eiber@ch.pwc.com
Sinsiri Thangsombat	Thailand	sinsiri.thangsombat@th.pwc.com
Zulfiqar Unar	UAE	zulfigar.unar@pwc.com
Mark Hannam	UK	mark.a.hannam@pwc.com
Edmund Hodgeon	USA	edmund.hodgeon@pwc.com

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