2018 ... What’s Ahead

Sal Inserra
Agenda

• CECL Implementation Considerations

• Changing Standards …. Changing Landscapes

• SEC Focus Items

• From the PCAOB
CECL Implementation Considerations
What to consider when implementing a CECL methodology?

<table>
<thead>
<tr>
<th>Category</th>
<th>Description</th>
</tr>
</thead>
<tbody>
<tr>
<td>Historical Loss Information</td>
<td>Includes both relevant internal and external information or combination of both. Pooling or segmentation is based on identification of common risk characteristics.</td>
</tr>
<tr>
<td>+ Current Conditions</td>
<td>Adjustments to adequately fit historic information to current conditions, i.e. current asset specific risk characteristics. This may be through qualitative or quantitative factors.</td>
</tr>
<tr>
<td>+ Reasonable and Supportable Forecasts</td>
<td>Adjustments to adequately reflect an entity's forecast of economic impact on the asset in the future. These may be qualitative or quantitative in nature. Additionally, these adjustments may be made at the input level or as part of model adjustments.</td>
</tr>
<tr>
<td>+ Reversion to History</td>
<td>Entities are to revert to historical loss information when unable to make reasonable and supportable forecasts. This may be done at the input level or in aggregate. Reversion should follow a rational systematic approach.</td>
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<tr>
<td>= Expected Credit Loss</td>
<td>The end result should represent the expected credit loss over the remaining contractual term of the financial asset or group of financial assets.</td>
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</table>

The first two steps are similar to what we do today – just different math to get to lifetime loss and more moving parts.

Forecasting is interesting, but **history** is at the foundation.
Making the CECL Transition

Risk Identification
Understanding portfolio characteristics and key drivers of portfolio performance, including lending attributes, loan structures, prepayment risks, and changes in the macroeconomic environment. This component will enable the bank to appropriately segment and model the portfolios based on common drivers of risk.

Governance and Oversight
Understanding risk management practices surrounding the development, execution, and maintenance of the CECL model. This includes established roles and responsibilities of the board and senior management, as well as policies and procedures in place to articulate the expectations of the CECL model and ongoing execution of the model.

Enabling Technology
Understanding the existing systems, including the capabilities and limitations of those systems that may support the execution of the CECL model. This includes source systems, data warehouses, modeling systems, financial statement spreading software, and vendor technology specially designed for CECL.

Data Inventory
Understanding the availability and limitations of data required to develop and maintain an effective CECL model. This includes the reliability and accuracy of data elements in addition to the historical time horizon of data availability.

Resource Capabilities
Understanding the capabilities and limitations of the human resources identified to develop and execute on the CECL model.
Where to begin?

Risk drives the data needed

Data available drives the models and enhances models in the future

Models drive the current condition and forecasting application

Policies, processes, and documentation
Risk Identification/Data Inventory (not all inclusive!)

• Four categories of data to consider (example):

<table>
<thead>
<tr>
<th>Loan Attributes</th>
<th>Credit Characteristics</th>
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<tr>
<td>• Financial asset type</td>
<td>• Risk rating</td>
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<td>• Size</td>
<td>• Credit score</td>
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<td>• Effective interest rate</td>
<td>• Policy exceptions</td>
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<td>• Acquired or originated</td>
<td>• LTV</td>
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<td>• DSCR or DTI</td>
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<td></td>
<td>• Historical credit loss patterns</td>
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<td>• Loss History Needed</td>
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</table>

<table>
<thead>
<tr>
<th>Structure</th>
<th>Economic and Geographical</th>
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<tr>
<td>• Payment Type</td>
<td>• Collateral type</td>
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<tr>
<td>• Vintage</td>
<td>• Economic sector</td>
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<tr>
<td>• Term</td>
<td>• Industry of the borrower</td>
</tr>
<tr>
<td>• Rate structure</td>
<td>• Geographical information</td>
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<td>• Prepayments</td>
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</table>

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What is data governance?

• There can be many definitions and perceptions of what data governance includes, but a key principle of data governance is its objective of treating data as a business-critical organizational asset.

• The result of effective data governance practices is trusted data.

Data should be trusted without thought, much like an organizational “utility.”
Goal is to have a core data that can be relied upon to drive many models (if not all)
What are Bankers doing? What does a Roadmap look like?

<table>
<thead>
<tr>
<th>Risk Identification</th>
<th>Data Inventory</th>
<th>Resources</th>
<th>Enabling Tech</th>
<th>Gov &amp; Oversight</th>
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<tbody>
<tr>
<td>Determine Risk Profile</td>
<td>Evaluate What Drives Credit Losses</td>
<td>Historical Data Collection</td>
<td>Create Teams</td>
<td>Develop Roadmap</td>
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<td>Risk Factor Reassessment</td>
<td>Scenario Modeling</td>
<td>Create Supplemental Data</td>
<td>Identify Shortfalls</td>
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<td>Data Analysis</td>
<td>Data Collection</td>
<td>Data Analysis</td>
<td>Develop Plan to Fill Shortfalls</td>
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<td>Risk Factor Reassessment</td>
<td>Scenario Modeling</td>
<td>Data Collection (Years 2 and 3)</td>
<td>Resource Capability Continuous Assessment</td>
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<td>Model Development and Calibration</td>
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<td>Testing of ICoFR</td>
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<td>Develop and Finalize Policies</td>
<td>Develop and Finalize Policies</td>
<td>Develop FS Disclosures</td>
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Changing Standards…
Changing Landscapes
# Major Standards: Effective Dates

## Beginning of fiscal year:

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<th>2018</th>
<th>2019</th>
<th>2020</th>
<th>2021</th>
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<td><strong>Revenue Recognition / Financial Instruments: Recognition and Measurement</strong></td>
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<td>PBE (Annual and Interim)</td>
<td>Non-PBE (Annual Periods Only)</td>
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<td>PBE that are not SEC Filers (Annual and Interim)</td>
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</table>

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Definition of a Public Business Entity (PBE)

• FASB ASU 2013-12, “Definition of a Public Business Entity”
  • Issued Dec. 23, 2013
  • Defines “public” for financial reporting purposes, not legal purposes
  • Implications for effective dates, disclosure, recognition and measurement (e.g., PCC alternatives)

• In broad terms, a PBE is an entity that meets any of the following:
  a) Files with the U.S. Securities and Exchange Commission (SEC)
  b) Required to file under the ‘34 Act with a regulator other than the SEC
  c) Required to provide financial statements with a regulator for purposes of issuing securities
  d) Securities are traded, listed, or quoted on an exchange or an over-the-counter market
  e) Required by law or regulation to file financial statements and make them publicly available (and the securities do not have a contractual restriction)

• Clarifications
  • ABA PBE Discussion Paper
  • AICPA Technical Question and Answers (TQA)
AICPA Technical Questions & Answers (TQA): Common Questions for Financial Institutions

Question 8: How evaluated in a tiered organizational structure?
Perform the evaluation on an entity by entity basis.

Question 11: Do banks subject to FDICIA meet the definition of a PBE?
Use entity by entity approach to evaluate the institution’s capital structure.

Question 12: Do mutual entities meet the definition of a PBE?
Evaluate sub-debt / secondary capital under (d).

Question 13: How do brokered CDs impact a PBE analysis?
Determine whether CDs are traded or quoted under (d).

Other topics include types of contractual restrictions and OTC markets.
OCC BAAS

- Office of the Comptroller of the Currency (OCC) Bank Accounting Advisory Series (BAAS)
  - Released on Aug. 15, 2017
  - OCC’s interpretations of GAAP and regulatory guidance based on facts and circumstances presented for national banks and federal savings associations.
  - Includes revisions to topics related to new accounting standards issued by the FASB on recognition and measurement of financial instruments, leases, and revenue recognition as well as other updates.
- Message from the Chief Accountant:
  - Includes a list of the topics which have been updated.
  - Describes the revised approach to include standards not yet effective which either must be adopted by public business entities (PBEs) in 2018 or can be early adopted.

Color coded by PBE/non-PBE for ease of reference both pre and post-adoption of various standards.
Revenue Recognition
Revenue Recognition

- **ASU 2014-09, “Revenue from Contracts with Customers (Topic 606):**
  - Issued May 2014
  - Effective Dates:
    - PBEs: fiscal years (and interim periods) beginning after Dec. 15, 2017
    - Non-PBEs: fiscal years beginning after Dec. 15, 2018, and interim periods within fiscal years beginning after Dec. 15, 2019; early adoption is permitted

- **Landscape**
  - Comments from the SEC, including disclosures
  - Industry discussions
  - AICPA discussions

- **Challenges for financial institutions**
  - Scoping – what is in? what is out?

- **Other**
  - Internal control over financial reporting
  - Disclosures

1Q18 for 12/31 year-ends
12/31/19 for 12/31 year-ends
## Revenue Recognition: Scoping for Financial Institutions

<table>
<thead>
<tr>
<th>Out of Scope</th>
<th>In Scope</th>
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<tbody>
<tr>
<td>Interest Income</td>
<td>Service Charges on Deposit Accounts</td>
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<tr>
<td>Trading Revenue</td>
<td>Asset Management Fees</td>
</tr>
<tr>
<td>Loan Servicing Fees</td>
<td>Gains or Losses on Other Real Estate Owned</td>
</tr>
<tr>
<td>Credit Card Fees</td>
<td>Interchange Fees</td>
</tr>
<tr>
<td>Guarantee Fees</td>
<td></td>
</tr>
</tbody>
</table>

- **FASB Revenue Recognition Transition Resource Group (TRG)**
- **July 13, 2015 meeting**
  - Memo No. 36, Credit Cards
  - Memo No. 44, July 2015 Meeting—Summary of Issues Discussed and Next Steps
- **April 18, 2016 meeting**
  - Memo No. 52, Scoping Considerations for Financial Institutions
  - Memo No. 55, April 2016 Meeting—Summary of Issues Discussed and Next Steps

Recognizing Revenue and Related Disclosures

Step 1: Identify the Contract

Step 2: Identify the Performance Obligation(s)

Step 3: Determine the Transaction Price

Step 4: Allocate the Consideration to the Separate Performance Obligation(s)

Step 5: Recognize Revenue When (or as) Performance Obligations are Satisfied

Note: Impact directly on your bank’s financial statements may not be material but there may be a significant impact on the revenue recognition of your borrowers … impacts current debt service coverage calculations.
Revenue Recognition: Disclosures

• Objective: To understand nature, timing, and uncertainty (606-10-50-1)
  • Allowed to consider level of detail necessary to satisfy objective and how much emphasis to place on each disclosure requirement (606-10-50-2)

• Disclosures include:
  • Information about contracts with customers (606-10-50-4 through 50-16)
  • Significant judgments and changes in those judgments (606-10-50-17 through 50-21)
  • Assets recognized related to cost to obtain or fulfill a contract (340-40-50-1 through 50-6)

• Deposit Fees Example - Excerpts from FASB TRG Memo 52 regarding Deposit Fees
  • Typical depository arrangement is considered a short term day-to-day contract with ongoing renewals and optional purchases
  • Potential disclosure impacts from the FASB staff
    • Contract balances and remaining performance obligations related to the depository arrangements might not exist, so the disclosures in paragraphs 606-10-50-8 through 50-11, and paragraphs 606-10-50-13 through 50-16 might not apply
    • An entity generally would not need to make many judgments that would significantly affect the amount and timing of such deposit fee revenue, there might not be much to disclose about judgments (paragraphs 606-10-50-17 through 50-20).
Financial Instruments: Recognition & Measurement
Recognition & Measurement

  • Equity Investments
    • Eliminates of the available-for-sale (AFS) category – all will be carried at fair value with changes in earnings (trading)
    • Provides a practical expedient for equities without a readily determinable FV to be recorded at amortized cost, less impairment, adjusted for observable price changes
  
  • Valuation allowance for deferred-tax assets (DTA) on an AFS debt security
    • Assess in combination with other DTAs
  
  • Financial liabilities measured at fair value under the FVO election
    • Fair value change attributed to instrument-specific credit risk presented in OCI rather than net income
Recognition & Measurement con’t

• Disclosures
  • Assets and liabilities
    • On the balance sheet or in the footnotes, disclose all financial assets and financial liabilities grouped by measurement category and form (for example, securities or loans and receivables) of financial assets.
  • Fair value of financial instruments measured at amortized cost (formerly FAS 107)
    • PBEs - measure based an exit price, rather than the commonly used entrance pricing
    • Non-PBEs – have the option to remove this disclosure

• Effective Date
  • PBEs
    • Fiscal years (and interim periods) beginning after Dec. 15, 2017
  • Non-PBEs
    • Fiscal years beginning after Dec. 15, 2018, and interim periods within fiscal years beginning after Dec. 15, 2019
    • Early adoption is permitted

1Q18 for 12/31 year-ends

12/31/19 for 12/31 year-ends

Significant change!
Financial Instruments: Hedging
Derivatives and Hedging

- ASU 2017-12 “Derivatives and Hedging (Topic 815): Targeted Improvements to Accounting for Hedging Activities”
  - Issued Aug. 28, 2017
  - Goals: Improve transparency, understandability, and reduce complexity

- Some elements considered during the deliberations were not changed
  - Highly effective threshold (80-125%)
  - Benchmark interest rate concept for fair value hedges of fixed rate financial instruments
  - Voluntary hedge redesignations
  - Timing of qualitative hedge documentation

- Other aspects not changed
  - Need for detailed and specific hedge documentation
  - While complexity has been reduced, hedge accounting is not without its challenges
Cash Flow Hedges

- Can now directly hedge prime interest rate
- Hedging prime will no longer require pooling like spreads or running complex models for mixed spreads to determine which loans paid first

Replaced benchmark rate concept with contractually specified rate
Fair Value Hedging

• Retained benchmark rate concept, but added SIFMA Muni Swap Rate
• No longer requires change in fair value of hedged item to be measured using cash flows from the coupon of the hedged item, now permitted to use the benchmark rate component of the coupon; this will significantly reduce ineffectiveness
• **Permits partial term hedging** (e.g. hedge first 2 years of 10-year instrument, without causing ineffectiveness)
  • Allowed to assume the hedged instrument “matures” at the end of the hedge
• Fair value hedges impact carrying amounts of the hedged item, and for assets, will therefore impact credit impairment analyses
Leases
Leases

• ASU 2016-02, “Leases” (Topic 842)
  • Issued in Feb. 2016
  • Effective Dates:
    • PBEs (and employee benefit plans that file with the SEC) - fiscal years (and interim periods) beginning after Dec. 15, 2018
    • Non-PBEs - fiscal years beginning after Dec. 15 2019 and interim periods after Dec. 15, 2020

• Recognize all leases with a term more than 12 months
  • Operating leases would no longer be off-balance sheet items for lessees
  • Recognize a right-of-use (ROU) asset and a lease liability on the balance sheet
    • A “finance lease” (expense is front-loaded; ROU amortization + interest expense)
    • An “operating lease” (straight-line; rent expense)
Leases con’t

• Preparing for implementation
  • Inventory of leases (including embedded leases)
  • Analysis of impact on debt covenants if applicable
  • Analysis of impact on capital requirements
  • Evaluate premises & equipment requirements for statutory or regulatory purposes

• Regulatory capital treatment [http://www.bis.org/press/p170406a.htm]
  • Basel Committee Leases FAQ
  • ROU asset not deducted from regulatory capital like an intangible asset
  • ROU asset should be included in the risk-based capital and leverage ratio denominators
  • ROU asset should be risk-weighted at 100%
    • Consistent with the risk weight applied historically to owned tangible assets and to a lessee's leased assets under leases accounted for as finance leases in accordance with existing accounting standards

• Indirect consideration – impact on borrowers’ debt covenants
SEC Focus Items
Recent SEC Speechmaking 1\textsuperscript{st} and 2\textsuperscript{nd} Quarter…

<table>
<thead>
<tr>
<th>Topic</th>
<th>SEC Chief Accountant Wesley Bricker</th>
<th>Deputy Chief Accountant</th>
<th>SEC Fellow</th>
<th>Division of Corp Fin - Chief Accountant</th>
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<tr>
<td>Implementation of revenue recognition</td>
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<td>X</td>
<td>X</td>
<td>X</td>
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<tr>
<td>Implementation of credit losses</td>
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<tr>
<td>Implementation of other standards including leases and classification and measurement</td>
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<tr>
<td>Transition (SAB 74) Disclosures</td>
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<tr>
<td>ICFR and disclosure controls and procedures</td>
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<td>Non-GAAP Measures and Operating Metrics</td>
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<td>Use of technology</td>
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<td>Foreign matters</td>
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<td>Independence of standard setting</td>
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## Recent SEC Speechmaking 3rd and 4th Quarter

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<td>Potential tax reform</td>
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From the PCAOB
Auditors Reporting Model (ARM)

  - Adopted by PCAOB on June 1, 2017
  - Approved by SEC on Oct. 23, 2017

- Categories of changes:
  - Minor improvements to the auditors opinion
    - Addressee
    - Statement on independence
    - Captions
  - Disclosure of auditor tenure
  - Critical Audit Matters (CAMs)

- Retains current Pass/Fail Model
- “Critical Audit Matters” (CAMs) included in audit report
- Disclosure on auditor tenure
- Statement about auditor independence
Auditors Reporting Model (ARM) con’t

- Critical Audit Matters (CAMs) are matters that:
  - Have been or were required to be communicated to the audit committee
  - Relate to accounts or disclosures that are material to the financial statements
  - Involve especially challenging, subjective, or complex auditor judgment

- External auditor must disclose:
  - Critical audit matters (CAMs) arising during the current period audit;
  - Considerations that led the auditor to make the CAM determination;
  - How the CAM was addressed; and
  - Reference to the relevant financial statement accounts and disclosures.

- Effective dates
  - Fiscal years ending on or after Dec. 15, 2017 for all provisions other than CAMs
  - Fiscal years ending on or after June 30, 2019 for CAMs for large accelerated filers
  - Fiscal years ending on or after Dec. 15, 2020 for CAMs for other filers

<table>
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<tr>
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<th>Large Accelerated Filers</th>
<th>Other Filers</th>
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