

IFRS 17 update

IFRS 17 Update



ONE DOES NOT SIMPLY

**SAY THANK YOU WITHOUT A
MEME**





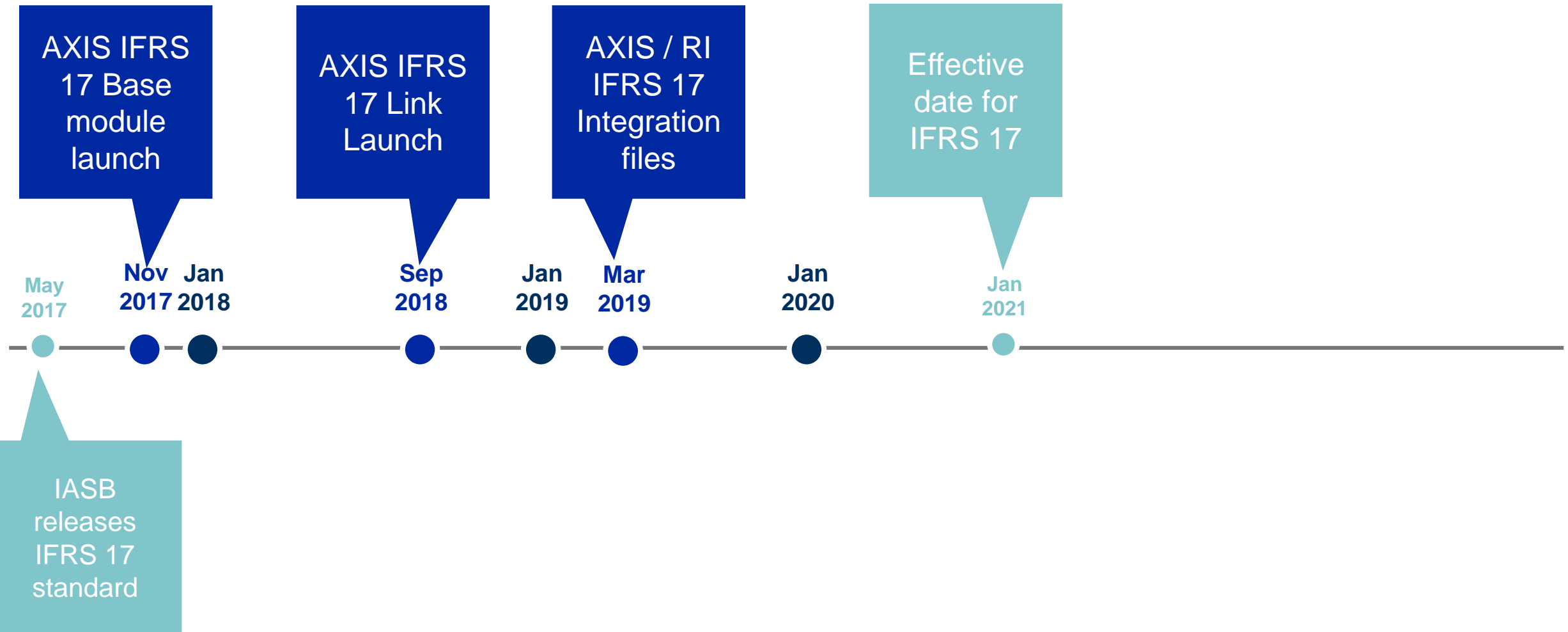
Let's go back to 1955...

Uh... no

2017

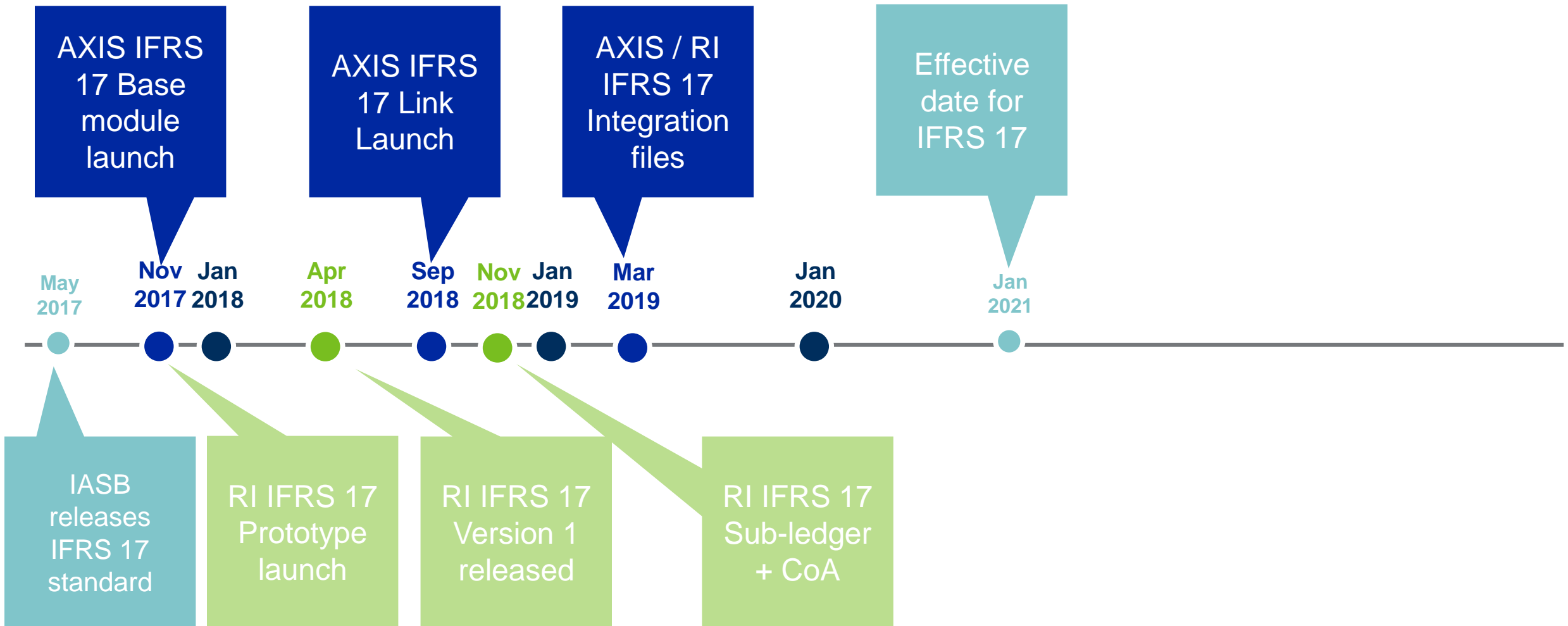
IFRS 17 Key Milestones

The launch of AXIS IFRS 17 modules



IFRS 17 Key Milestones

The birth of RiskIntegrity for IFRS 17



RiskIntegrity for IFRS 17 – Version 1

RiskIntegrity™
IFRS17

← IFRS Group Reporting Sep 2017 / Status

Completion
 Review
 Approval

Assumptions Loaded Cashflow Projections Risk Adjustment **Today** Contractual Service Margin Analysis Of Change

3 Oct 2017 WD1 5 Oct 2017 WD3 10 Oct 2017 WD6 11 Oct 2017 WD7 12 Oct 2017 WD8 16 Oct 2017 WD10

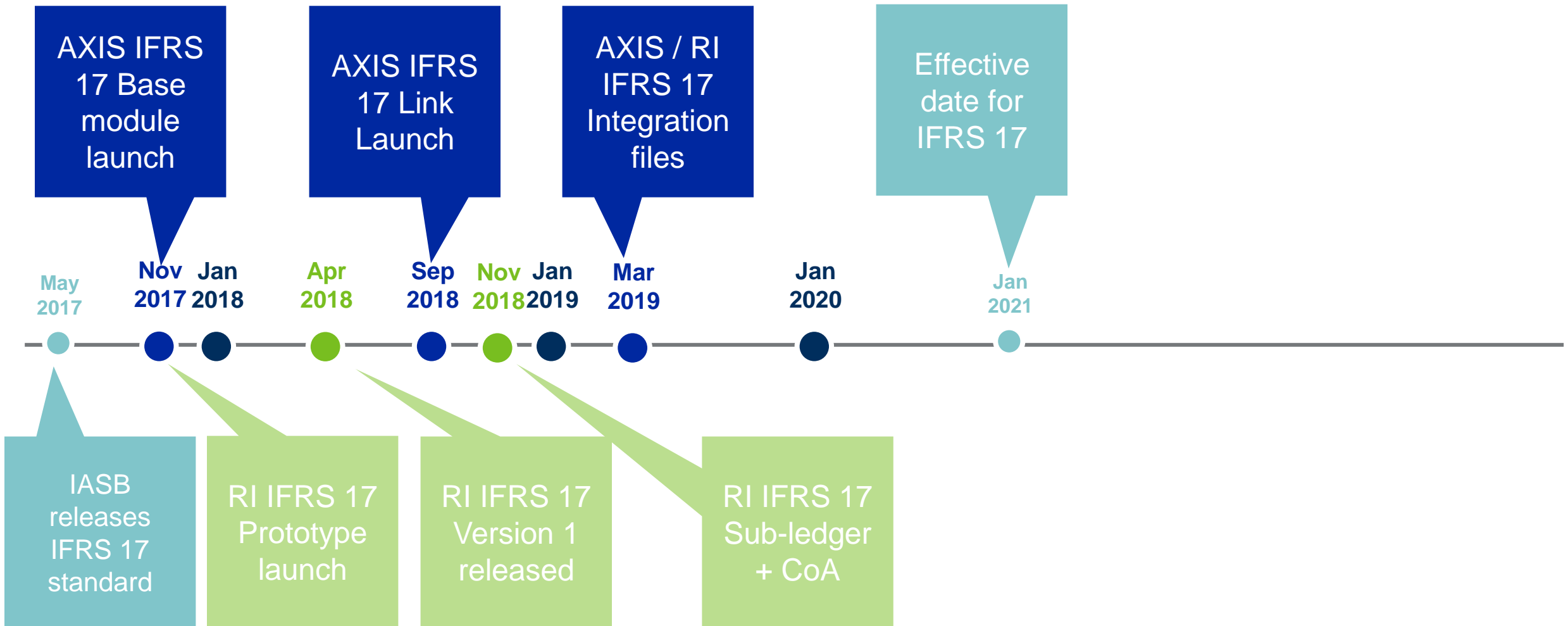
Group Hierarchy

- XYZ Group
 - XYZ Canada Life Co**
 - Non-participating Business
 - Critical illness
 - Term
 - Universal life
 - Participating Business
 - Closed blocks
 - Open blocks
 - Wealth Business
 - Annuity Payouts
 - Savings
 - XYZ UK Life Co
 - Annuities
 - Protection
 - Savings

	Completion	Review	Approval
Assumptions loaded	Completed	Reviewed	Approved
Cashflow projections	Completed	Reviewed	Approved
Risk adjustment	Completed	Reviewed	Approved
Contractual service margin	Due: WD6	Due: WD7	Due: WD8
Analysis of change	Due: WD8	Due: WD9	Due: WD10
Summary liability reconciliation	Due: WD10	Due: WD11	Due: WD11
Disclosures	Due: WD12	Due: WD13	Due: WD14

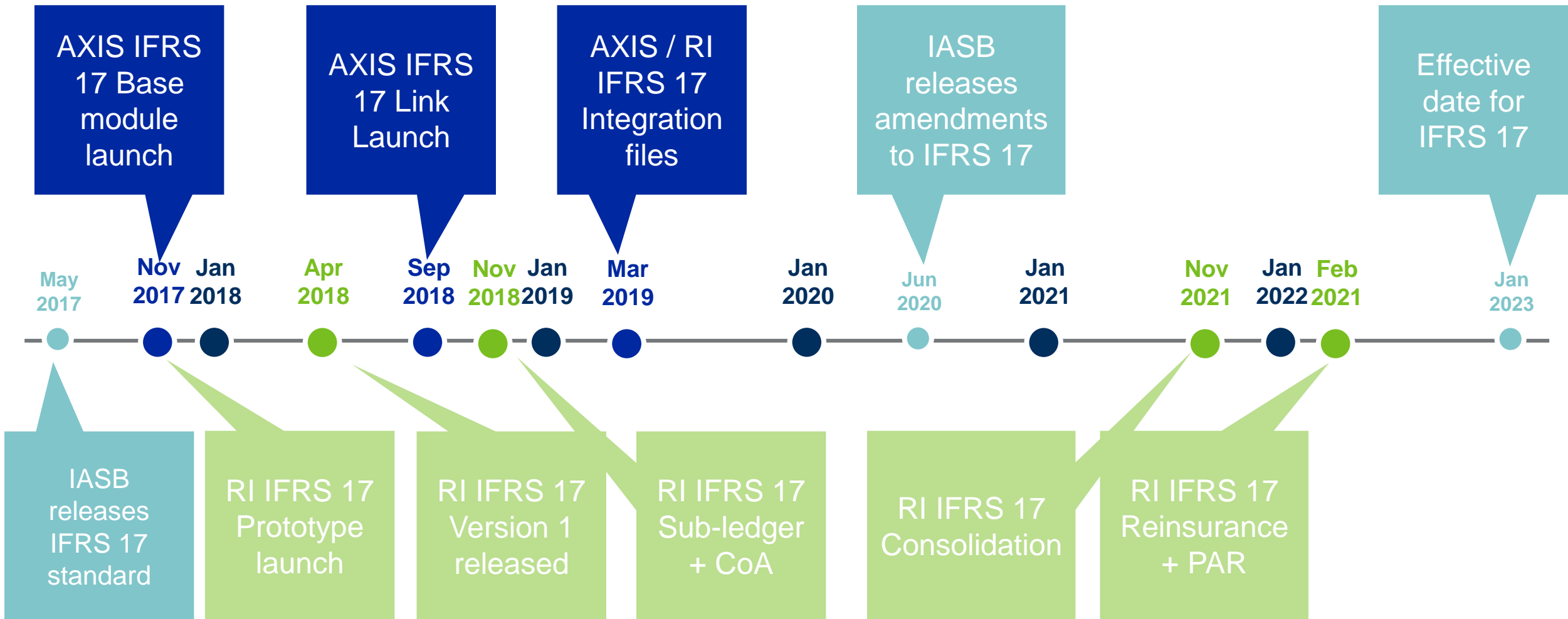
IFRS 17 Key Milestones

The birth of RiskIntegrity for IFRS 17



IFRS 17 Key Milestones

Amendments to the IFRS 17 standard

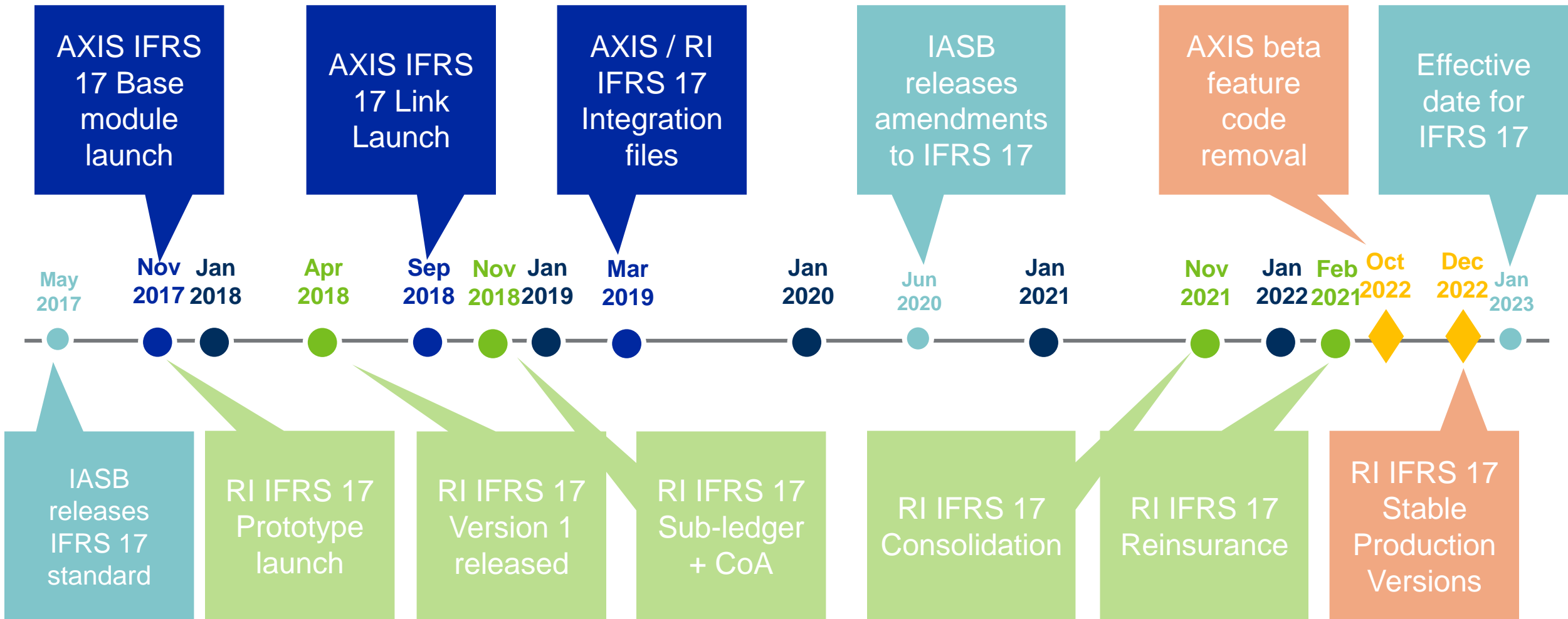


AXIS – What have we delivered

- » Core items for compliance
- » Improve efficiency
- » Optionality
- » Removal of some workarounds

IFRS 17 Key Milestones

The light at the end of the tunnel...



MA's Project statistics

AXIS

- » Number of jobs:
 - ~1600
- » Number of combined...
 - Person-hours: 150,000
 - Person-years: ~75

RiskIntegrity for IFRS 17

- » Number of versions:
 - 9 Major versions
 - 10 Minor versions
- » Number of Features:
 - ~260

Number of client meetings: 1000's

MA's End-to-End IFRS 17 Solution



AXIS Actuarial System

- » Used for valuation, pricing, projection, risk analysis, etc.
- » Will support IFRS 17
 - Current period reporting
 - All other applications
 - Using existing client models

AXIS IFRS 17 Link

- » New processes for IFRS 17 current period reporting
 - Multiple input files
 - Efficient processing
 - IFRS 17 reporting results
- » Optimal integration with RiskIntegrity IFRS 17

RiskIntegrity IFRS 17

- » Bridges actuarial models and client G/L
- » Accepts and manages accounting & actuarial data
- » Data Manipulation
- » LRC / LIC calculations by group
- » Prepares & stores journal entries
- » IFRS 17 Disclosures & analytics

Discount Rate Service



Looking ahead to 2015... uh... 2023 and beyond!

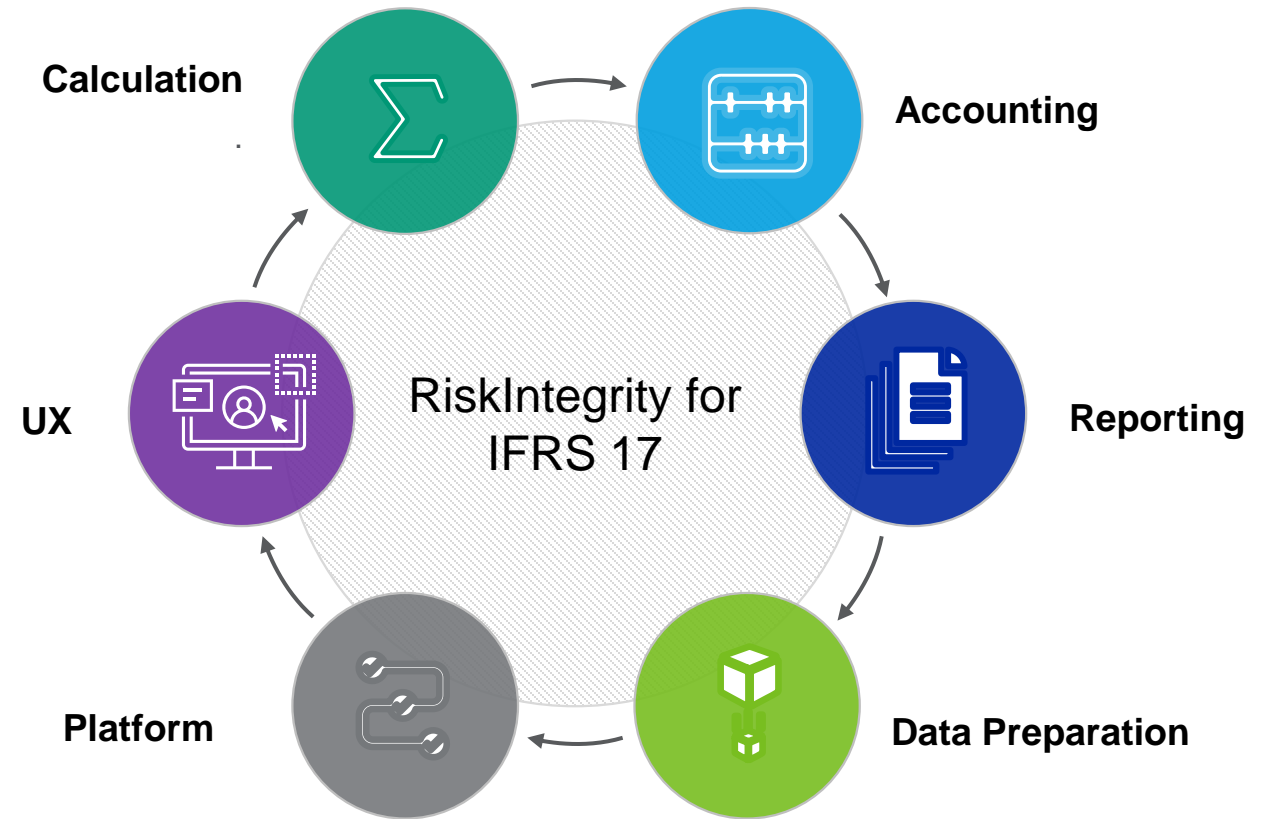
AXIS – What's next

- » Current period reporting
 - Functionality still needed e.g., PFAD analysis for the Annuity module
 - Breakdown of results through more runs
 - Sensitivities

- » Projections
 - Functionality
 - Runtime

RiskIntegrity for IFRS 17 – What's next

- » High priority fine-tuning of result estimation techniques and methodology
- » Improve auditability and platform features
- » Continue enhancements to performance and usability.



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Discount Rate Service

Clients Who Benefit From Our Service



- » First client: Zurich
- » Used globally
- » Over 200 Scenario Generation Clients Globally
- » Over 80 Scenario Generation and IFRS 17 Clients across Europe & Africa...



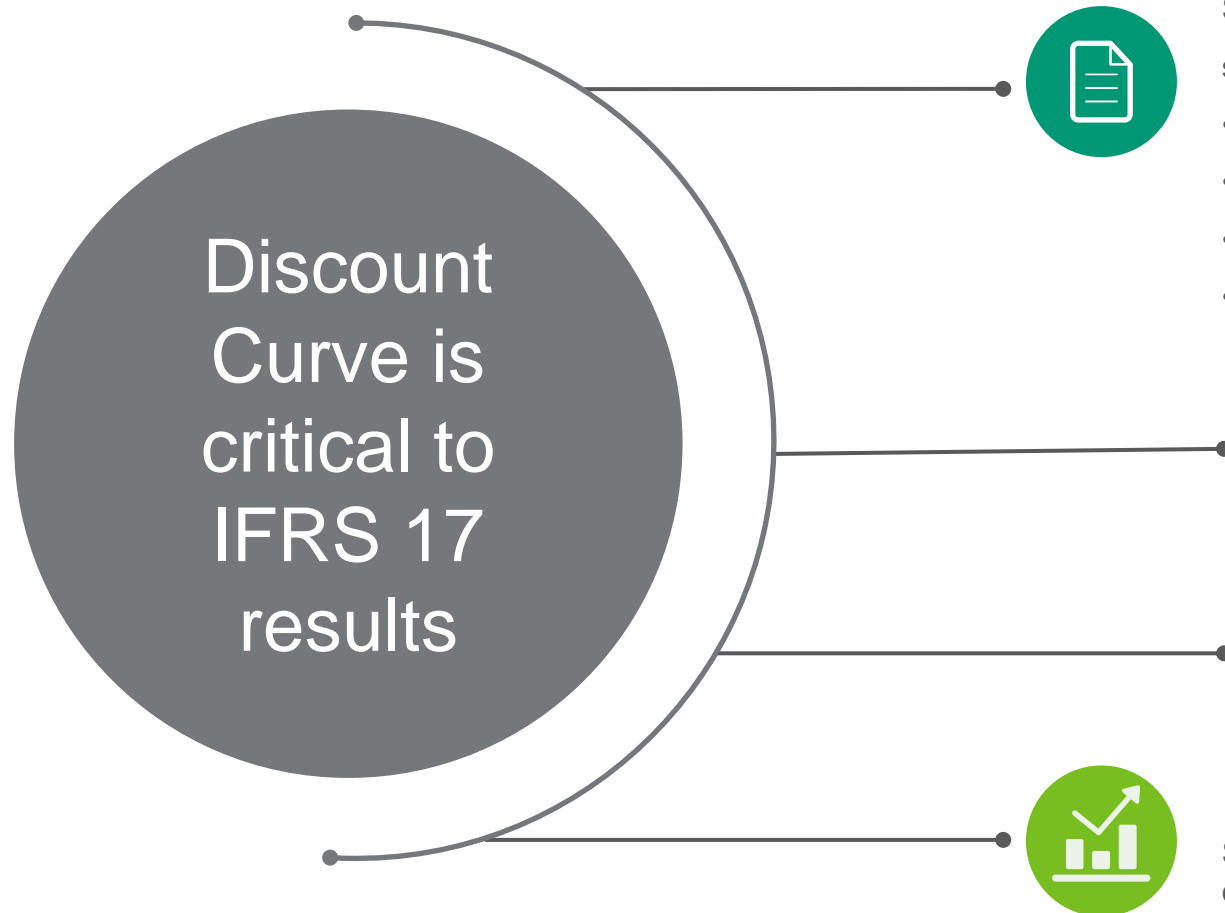
Large existing client base in Europe & Africa



Wide geographical coverage

Discount Curve for IFRS 17

Challenges facing Insurers



Select appropriate Methodology

Select methodology that aligns with IFRS17 principles and provides stable, robust valuations of insurer's liabilities. Key challenges include:

- How can an insurer estimate the illiquidity premium?
- What reference portfolio should be used?
- How much of the illiquidity premium should be applied to the liabilities?
- How do I extrapolate beyond observable market data?

Achieve Auditor sign off

Demonstrate that the discount curve approach is suitable for the business profile to gain sign off from internal and external auditors.

Meet Reporting timelines

Be able to produce discount curves and necessary documentation to meet IFRS 17 reporting timelines

Support Disclosure Activities

Support production of stress curves and assumption to support disclosure reporting

Moody's Analytics Recurring Service

Moody's Analytics Discount Curve Service for IFRS 17

Economy Coverage

20+ currencies (including CAD)
with ability to expand to additional
currencies

Granularity

Illiquidity premium estimates
quoted for:

- Full term structure
- Range of credit classes
- Range of maturity and
rating buckets
- Single value based on a
weighted average



Delivery

Quarterly or Monthly delivery by
Working Day 1
Fully documented
Sensitivity analysis

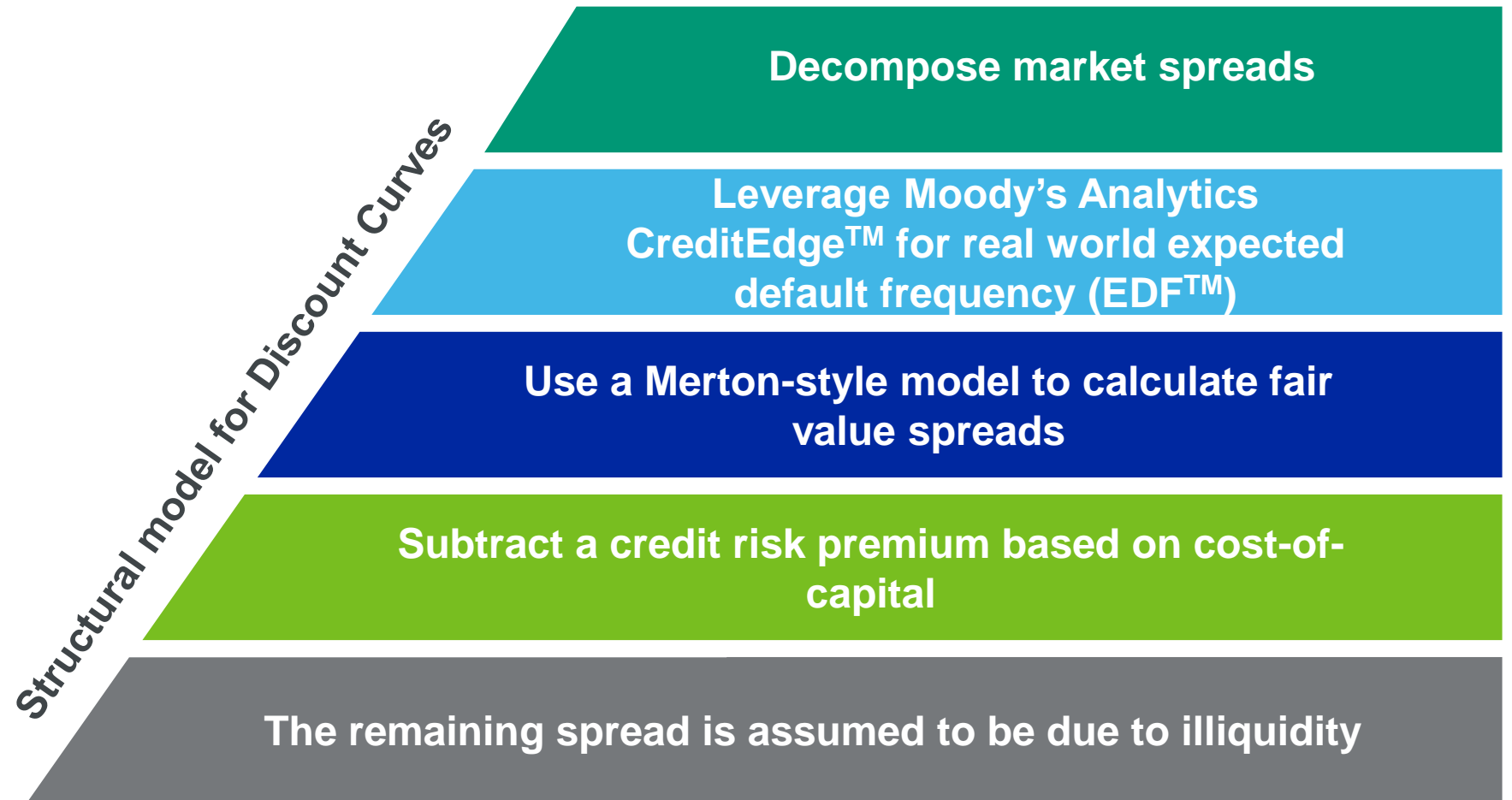
Additional Curves

Choice of Swap (e.g. IBOR,
OIS) and Government rates
Range of Credit Spread curves

Moody's Analytics Illiquidity Premium Approach

Moody's Analytics Discount Curve Service for IFRS 17

*Service offers **easy-to-use, flexible** content for an insurer's reporting teams to meet the new accounting standard.*



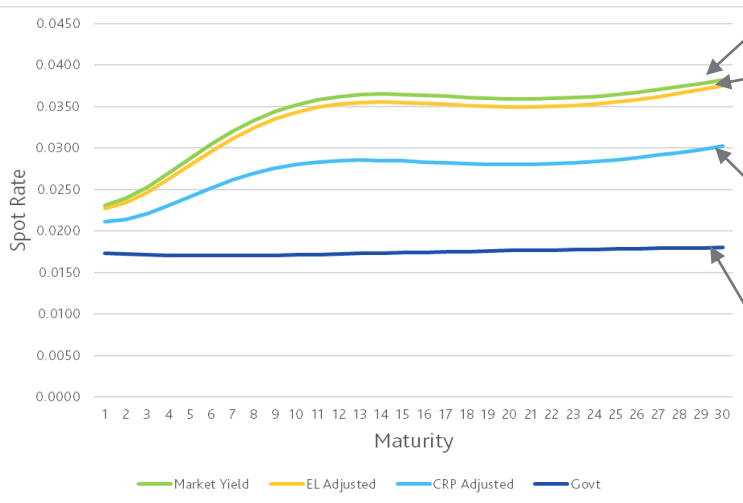
Grounded in Economic Principles

Overview of Moody's Analytics Discount Curve Solution

We use a Merton-style structural model of credit risk to calculate fair value spreads and a weighted cost-of-capital adjustment for credit risk premium

Our method allows user to choose risk free rate to define the discount curve

CAD End Dec 2019 Credit Risk Adjusted Yield Curves



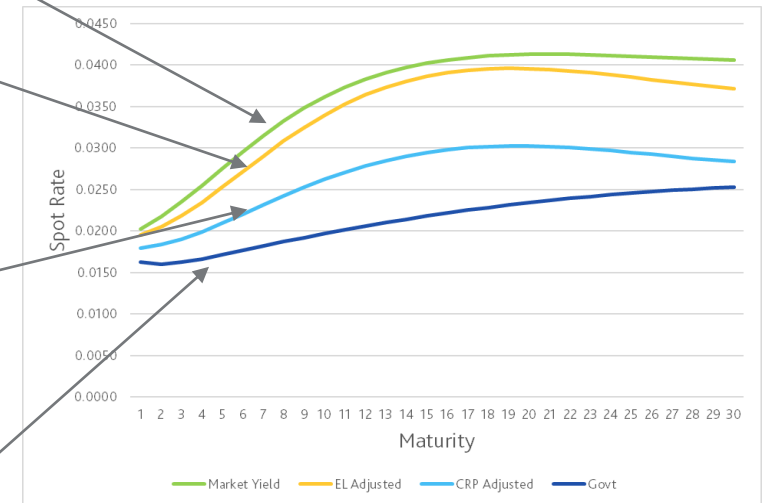
Market Price: This is our starting curve based on bond yields (market data).

Expected Loss Adjusted: This is the curve produced by discounting for the real world default probability.

IFRS 17 Curve: This is the curve produced by further removing the credit risk premia and hence is the illiquidity discount curve that can be used as part of IFRS 17.

Risk Free Curve: This is the Govt curve here for reference, could alternatively plot over swaps.

USD End Dec 2019 Credit Risk Adjusted Yield Curves



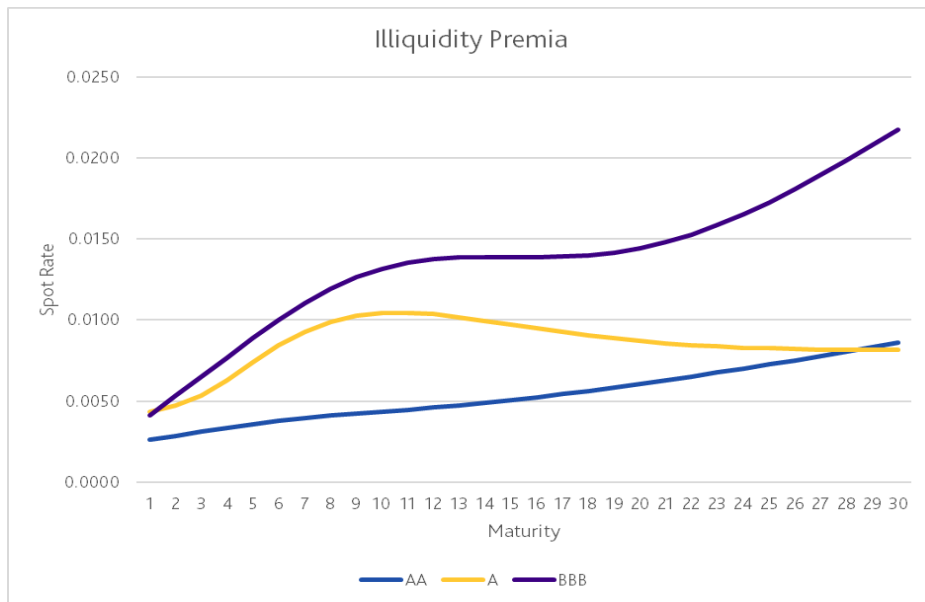
Granular and flexible Outputs

Overview of Moody's Analytics Discount Curve Solution

Discount curves can be tailored to match liquidity, duration and currency of an insurer's liabilities

Single illiquidity premium estimates for range of maturity and rating buckets

CAD End Dec 2019 Illiquidity Premia term structure



CAD End Dec 2019 Illiquidity Premia Bucket Estimates

MATURITY /RATING	0-1	1-3	3-5	5-7	7-10	10-15	15+
AA	30	23	36	32	38		
A	51	34	45	88	106	92	92
BBB	41	47	63	99	112	140	135

Back-testing and Sensitivity

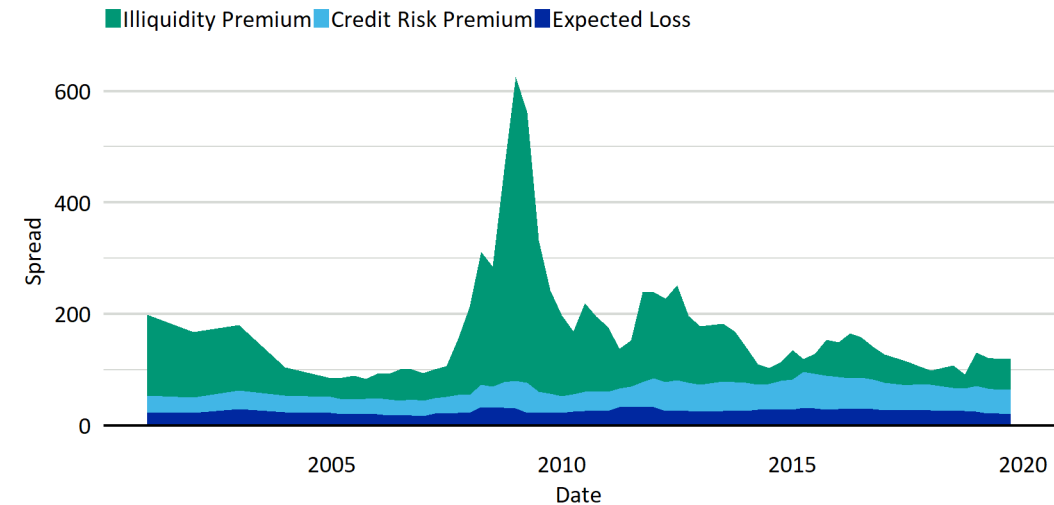
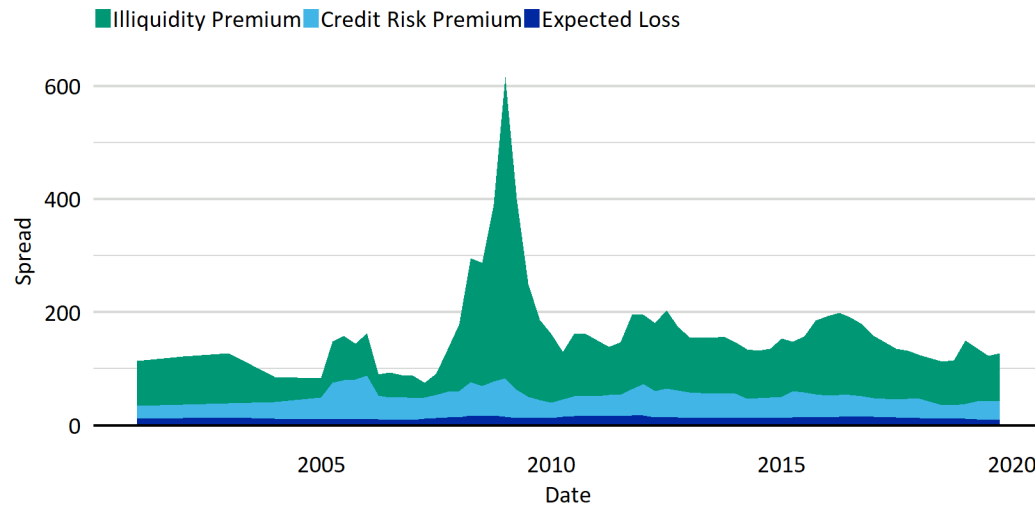
Benefits and Gains from Moody's Analytics Solution

Our Illiquidity premia model is fully back-tested to ensure stable, clear and transparent results.

In our model the Illiquidity premia responds to movements in market spreads and credit risk is dynamic.

CAD Historical Decomposition of Credit Spreads

USD Historical Decomposition of Credit Spreads



Supporting Insurers to Meet IFRS 17 Standard

Benefits and Gains from Moody's Analytics Solution



Reliability

Leveraging our unique calibration infrastructure and methodology grounded in economic principles ensures stable and robust discount curves can be delivered within reporting timelines.



Fully documented

Delivery of comprehensive calibration and methodology documentation will support insurers when communicating suitability of the methodology with internal and external stakeholders.



Flexibility

Full term structure and rating split allows insurers to easily tailor the illiquidity premium estimates to meet the needs of their portfolios and products avoiding challenges associated with using single value estimates.



Back-testing & Benchmarking capability

Moody's Analytics solution can provide historical content to support back-testing of chosen methodology and benchmark to other approaches (VA, negative CDS, covered bonds).



Cost Effective

Moody's Analytics Solution removes the need for insurers to invest in expensive production infrastructure to meet demands and avoids expense arising from key person risk typically associated with this type of modelling exercise.

IFRS 17 Thought Leadership



Discount Rate
Curves



A Cost of Capital
approach to estimating
Credit Risk Premia



Illiquidity and Credit
Premia for IFRS 17



Implementing
IFRS 17 Discount
Curves



Profit Emergence
under IFRS 9 and
IFRS 17

moodysanalytics.com/ifrs17

David Fihrer
david.fihrer@moodys.com

Khalid Mahomed
khalid.mahomed@moodys.com

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