Solvency II overview

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C-18: Solvency Regulation in the US and Abroad

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Solvency II
Contents

- What is Solvency II?
- How does it work?
- What is the current state of play in the market?
- Equivalence issues – impact on US

Solvency II
Overview

- Solvency II is the proposed new Europe-wide framework for prudential supervision of insurance
- Due to come in force at the start of 2013
  - Quarterly reporting on Solvency II basis throughout 2013
  - Annual reporting for first time at year end 2013
- A fundamental change to Solvency requirements:
  - Market consistent approach for valuing liabilities (links to IFRS)
  - Capital requirements linked to risk profile
    - Convergence of economic capital and regulatory capital
  - Consistent supervision for international groups
  - Capital add-ons for deficiencies

Solvency II

3 Pillar approach

Solvency II is based on the '3 Pillar' Basel II model from the banking industry, with more focus on enhanced risk management standards:

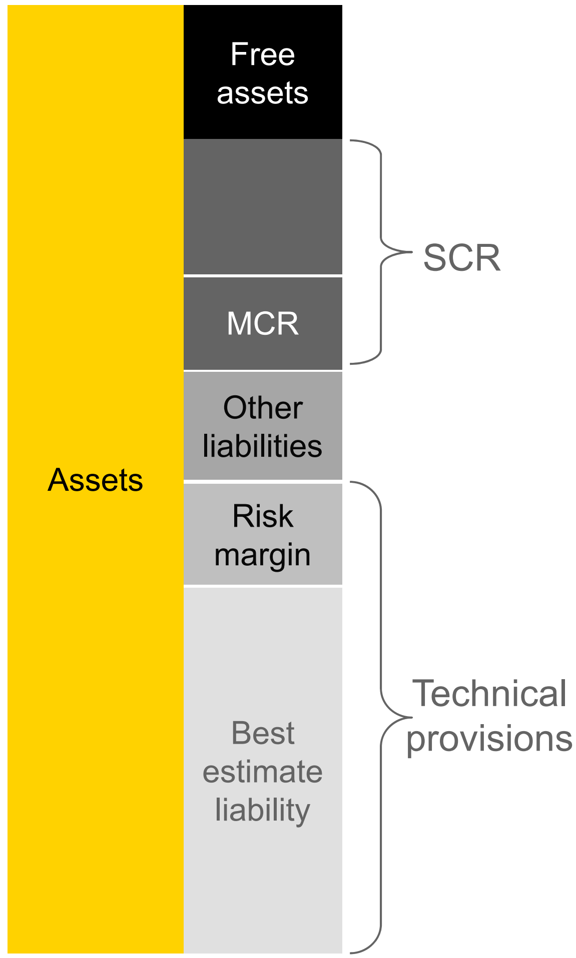
Pillar 1	Pillar 2	Pillar 3
Valuation principles **Capital requirement** SCR[1] MCR[2] Standard Formula Internal Model *Internal model approval process*	**Must allow for all risks,** including those not captured in the SCR **ORSA** Own risk and solvency assessment **Reviewed by supervisor** may impose capital add-ons	**Public disclosure** Solvency and financial condition report **Report to supervisor** *"Transparency"* *"Market discipline"*

1. *Solvency Capital Requirement*
2. *Minimum Capital Requirement*

Pillar 1
Market consistent balance sheet

Assets

- ***Investment assets:*** valued at market value
- ***Property:*** recognised at fair value, not cost
- ***Investment in group undertakings:*** shown at Net Asset Value rather than cost
- ***Deferred tax asset:*** need to establish relating to adjustments, especially the additional insurance technical provisions
- ***Intangible assets:*** adjustment to remove intangible assets eg DAC and Goodwill



Capital requirements

- **SCR =** first regulatory intervention point
- **MCR =** final regulatory intervention point

Technical provisions

Three building blocks, similar to IFRS:

- **Best estimate** of all future cash flows
- **Discounted** at a risk-free interest rate
- **Risk margin** to capture uncertainty

Should include loading for low frequency, high severity **“Binary Events”**

No **Unearned Premium Reserve** - premium fully earned in full on day one

Pillar 1

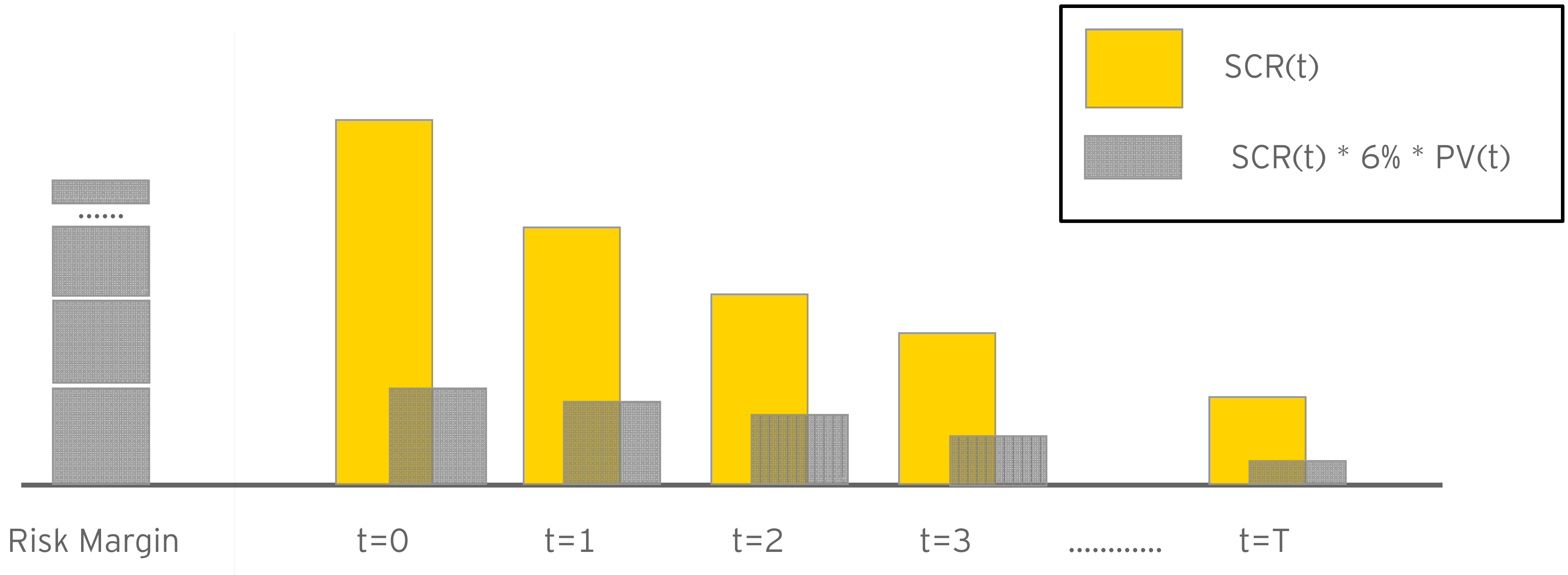
Risk Margin – Steps to calculate (Cost of Capital)

Step 1. Calculate the SCR at the end of each future year *(excl Market & Non-RI Credit Risk)*

Step 2. Multiply each of the SCR's by the Cost-of-Capital rate *(6% under Solvency II)*

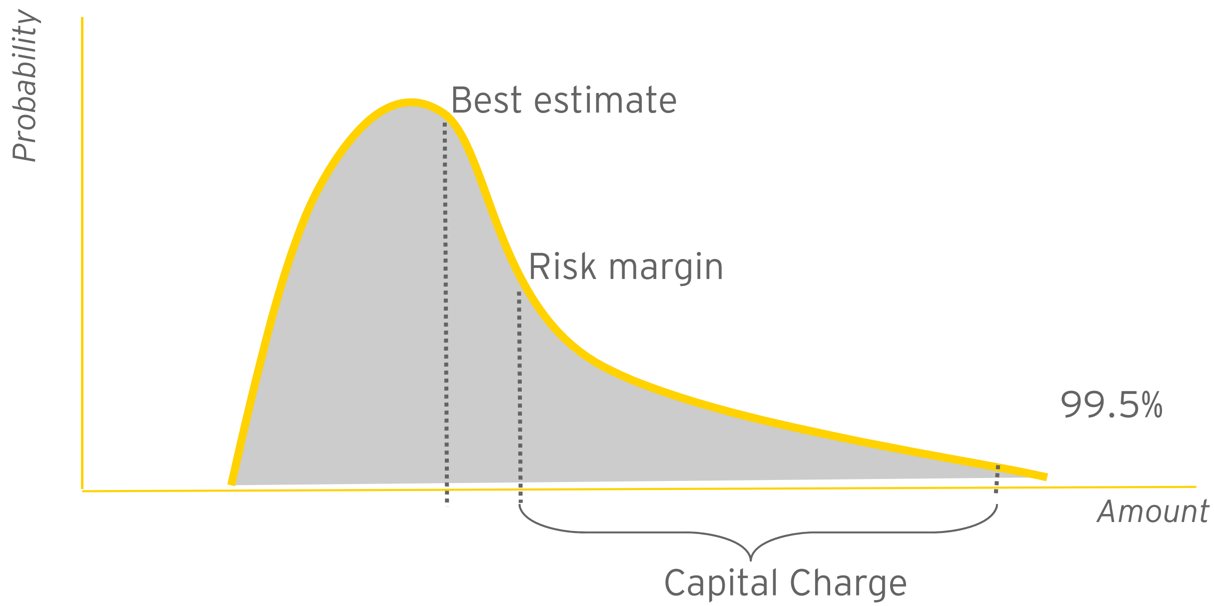
Step 3. Discount the amounts calculated in Step 2 using *(Risk Free yield curve)*

Step 4. Risk margin is sum of these future discounted amounts



Pillar 1
Solvency capital requirement

- Solvency capital requirement (SCR) is calibrated to achieve **99.5%** probability of survival (**value-at-risk**) over **one year time period.**



- There are *two alternative* approaches for calculating the SCR:
  - Standard formula
  - Internal model

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Pillar 1
Standard Formula

- Combination of stress and scenario tests and factor-based calculations.
- Performed in a modular approach – each factor and formula explicitly laid out, including correlation coefficients.
- Companies can use undertaking specific data as parameters in certain instances.
- Same rules for all companies in industry – “one size fits all” model means it likely fits no one!

QIS Exercises

- Standard Formula developed in quantitative impact studies (QIS) — “dry runs” to understand and test the implications of Solvency II
- “QIS5” exercise completed in November 2010 — EC report published in April

Pillar 1
QIS5 Highlights

Comparison of results for total industry (both life + non-life companies):

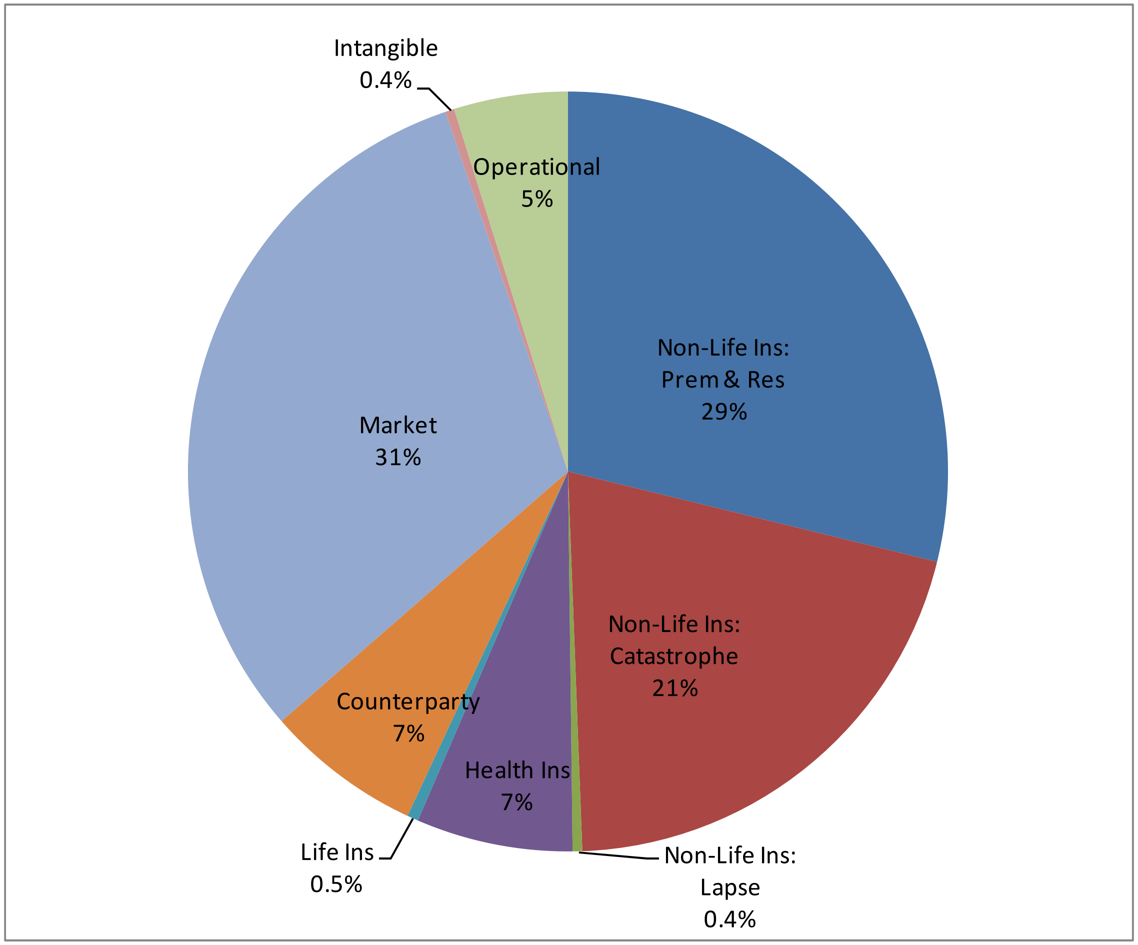
	Current Basis	QIS5
Solo Entities	*% of total assets*	
Capital Requirement	3.1%	7.4%
Available Capital	10.0%	12.9%
Surplus Capital	**6.9%**	**5.3% ↓**
Group Entities		
Capital Requirement	4.0%	5.0%
Available Capital	5.8%	8.1%
Surplus Capital	**1.8%**	**3.1% ↑**

Non-Life Companies

- Generally small reductions in technical provisions, since discounting > risk margins
- Risk margins typically around 10% of technical provisions
- Standard formula comes out around **25% higher** than internal models

Pillar 1
QIS5 Highlights

Breakdown of risks for “average” Non-Life insurer



Pillar 1
Internal Models

- Developed by the firm and needs approval from regulator, demonstrating compliance with a number of tests
- Partial internal model approach is allowed:
  - Can model only specific risks that are not handled effectively by standard formula SCR
- Internal model approach is likely to be preferred where similar internal models are already in use and for complex organizations *(Standard formula can be penal)*
- In order to attain internal model approval, companies must satisfy 7 tests:
  1. Use test - *Model must be embedded and used in the business*
  2. Statistical quality standards - *Accuracy of data, methodology and assumptions*
  3. Calibration standards - *Must be consistent with SCR framework (99.5% over 1 yr)*
  4. Profit and loss attribution
  5. Validation test
  6. Documentation standards
  7. External models and data

Pillar 1
Internal Models Approval Process

- Onerous process to get approval. Pre-application template has over 80 sections to complete simply laying out what will be in the submission (!!)
- 14 separate items will need to be submitted, thousands of pages
  - A. Cover Letter
  - B. Written declaration from the Board of the firm
  - C. Copy of the Application Approval from the Board of the firm
  - D. Results of the latest ORSA and details of the firm's business and risk strategies
  - E. Scope of application for full and partial internal models and model
  - F. Risk management process and risk profile
  - G. Self-assessment
  - H. Technical characteristics of the internal model
  - I. External models and data
  - J. Model governance, systems and controls incl. copy of organisational charts
  - K. Independent review/validation report
  - L. Policy for changing the full / partial internal model and other policies for internal model governance
  - M. Plan for future model improvement
  - N. Capital requirement

Pillar 2
Governance

Firms must have a system of governance to *"provide for sound and prudent management of the business."*

System of governance shall at least include:

- Adequate transparent organizational structure
- Clear allocation and appropriate segregation of responsibilities
- Effective system for ensuring the transmission of information

Six key "aspects" which firms must have in place:

Policies

- Fitness and propriety
- Outsourcing
- Internal control

Functions

- Risk management function
- Internal audit function
- Actuarial function

Pillar 2
Own Risk and Solvency Assessment (ORSA)

The entirety of the processes and procedures employed to identify, assess, monitor, manage, and report the short and long term risks that the business faces or may face and to determine the own funds necessary to ensure that its overall solvency needs are met at all times

- It is the firm's own view of required capital, whereas Pillar I is the regulatory view
- Aim is to enhance link between internal capital needs and risks business is exposed to
- Main focus on demonstrating good:
  - Risk management framework
  - Systems of internal control
  - Corporate governance
- Will need to be fully documented and independently (externally?) assessed
- It is both…
  - an **internal assessment process** and as such should be embedded in strategic decisions
  - a **supervisory tool** for the regulatory authorities

Pillar 2
Own Risk and Solvency Assessment (ORSA)

There are five key principles underlying the ORSA, each encouraging good ERM practices:

1. **Risk Identification**
   - Encompass all material risks
2. **Risk assessment and management**
   - Based on adequate measurement and assessment processes
   - form an integral part of the management process and decision-making framework
3. **Integrated policy framework**
   - ORSA process and outcome should be appropriately evidenced and internally documented, as well as independently assessed.
4. **Integrated stress and scenario testing**
   - Should be forward-looking, taking into account the undertaking’s business plans and projections
5. **Robust management and oversight function**
   - regularly reviewed and approved by the undertaking's administrative or management body

Use test will also be key to demonstrate the ORSA process is embedded within the business

Pillar 2
Supervisory Review and Action

- Supervisors will examine entities to assess the adequacy of the capital calculations, risk management processes and governance framework
- Is the Supervisor finds deficiencies from requirements in any areas, can impose **capital add-ons** to increase the level of required capital.
- In theory capital add-ons should be a temporary measure while entities address the issues raised by the Supervisor.
- However there may be situations where it is acceptable to continue with the add-on indefinitely, eg if there is the lack of data for a particular risk.

Pillar 3
Disclosures

- Pillar 3 requires the following disclosures:

<u>Regulatory Disclosures</u>

Regular Supervisory Reporting – RSR
Qualitative information to regulator
Full report every three years

Quantitative Reporting Template – QRT
Standardised financial reporting
Annually in full / Quarterly to support MCR

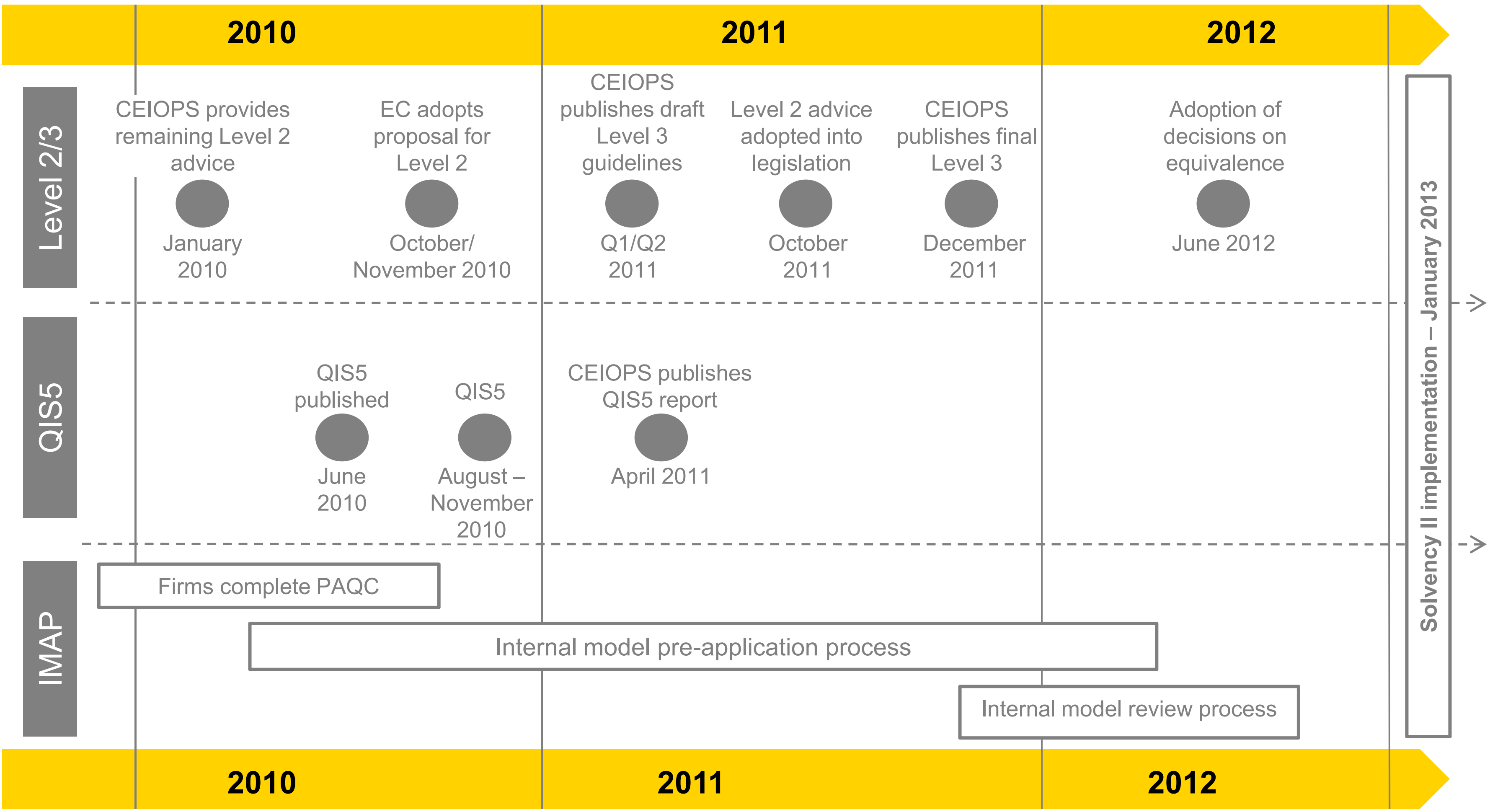
<u>Public Disclosures</u>

Solvency and financial condition report — SFCR
Public disclosures
at least annually

Extracts from Quantitative Reporting Templates

- Extensive **additional disclosures** compared with US GAAP / SEC filings.
- **External audit** may be required for some parts, no firm determination yet.
- A **written disclosure policy** needs to be approved by the management body
- Speed of reporting required will be a particular challenge…
  - Narrative RSR and SFCR reports need to be produced **within 14 weeks** of year end
  - Quantitative templates **within 6 weeks** for quarterly reporting, 16 for annual

Current state of play
Timeline



Current state of play
Developments and market activity

- *Regulatory Developments*
  - Level 2 guidance is largely finalized
  - QIS5 exercise has been completed, participation by almost all firms in scope
  - Internal Model Pre-application process in full swing
  - Countries being assessed for equivalence

- *Market activity*
  - Companies are well into building their internal models, starting validation phase
  - Preparing submissions for Internal Model Approval
  - Documentation of all risk management processes and policies
  - Developing data infrastructure to handle enhanced information requirement

Third country equivalence
Background

Solvency II equivalence is defined at three levels:

- ***Article 172:* reinsurance supervision**
  - EU member states cannot require localization of assets/collateralization relating to reinsurance contracts written in the equivalent third country.
- ***Article 227:* group solvency calculation** (affects groups with EU parent)
  - For group solvency, EU member states will take into account the capital requirement and eligible own funds as laid down by the equivalent third country (i.e., risk-based capital [RBC] for US), rather than requiring Solvency II basis calculation.
- ***Article 260:* group supervision** (affects groups with non-EU parent)
  - EU member states rely on the equivalent group supervision exercised by equivalent third country supervisory authorities.
  - If not equivalent, the regulator may require a new EU holding company to be set up, containing all EU entities. This sub-group would then be subject to group supervision under Solvency II.

Third country equivalence
United States

- **Switzerland**, **Bermuda** and **Japan** *(partially)* are being assessed for equivalence
- **United States** likely to be treated under "transitional arrangement", where decision is deferred for a few years (no decision on how long yet) to give time to prepare
- EU report identified a number of issues with assessing equivalence for United States, including:
  - The lack of a single, central regulator
  - The absence of any group supervisory framework
  - Professional secrecy, especially with NAIC as does not act as a supervisory authority
- US has launched the "Solvency Modernization Initiative" to bring its own system up to date
- In particular, NAIC has just released a Consultation Paper on US version of the ORSA

…"Solvency II" type framework coming to the US in the very near future!