GIRO Conference and Exhibition 2012
Juggling uncertainty the actuary’s part to play

GIRO Conference and Exhibition 2012
IFRS 4 for beginners:
Everything you ever wanted to know but were afraid to ask

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Agenda

1. Introduction to IFRS 4 Phase II
   - Four key concepts for Non-Life Insurers

2. Measurement Model
   - Building Block Approach
   - Onerous Contracts Test

3. Practical Considerations
   - Pricing Optimisation

IFRS - Acronyms

• IFRS - International Financial Reporting Standards

• IASB - International Accounting Standards Board

• FASB - Financial Accounting Standards Board (the US)

• IFRS 4
  - an accounting standard focusing on Insurance Contracts
  - two-phase project.
**IFRS 4 Phase I - Summary**

- Driven by EU adoption of IFRS
- Temporary / provisional framework
- Essential to standardise reporting of insurance contracts

**IFRS 4 Phase II - Progress**

- Discussion paper issued in 2007
- Slow progress due to new IASB members, inclusion of FASB and difficulty of subject
- Exposure Draft published in 2010
- Objectives:
  - Make the accounting of insurance contracts consistent
  - Improve the transparency of financial reporting
Different conclusions from IASB and FASB

- International Accounting Standards Board ("IASB") and Financial Accounting Standards Board ("FASB") came to different conclusions in some areas

- In this presentation we are concerned with the tentative decisions made by IASB only
Scope

- Applies to insurance contracts
- Applies to reinsurance assets held by the insurer
- Applies to financial instruments with discretionary participation feature if they have been issued by the insurer

Unbundling non-insurance components

Taken from IASB website
Four Key Concepts

Building Block Approach ("BBA")
The approach for valuing insurance contracts/portfolio of insurance contracts. This consists of four blocks.

Premium Allocation Approach ("PAA")
A modified approach for some short duration insurance contracts (≤1 year)

Onerous Contracts Test ("OCT")
A test of whether a portfolio of insurance contracts is loss making

Portfolio of insurance contracts
Portfolio composition is very important – it plays a vital role in calculating diversification, the onerous contracts test rules and the risk margin.

Building Block Approach ("BBA")

- This is the measurement model that an insurer shall apply to all insurance contracts
  - except some short duration contracts for which a modified version of the model may be used
Building Block Approach - Overview

**Measurement Model**

Block 1: Expected Value of Future Cash Flows

Block 2: Time value of money

Block 3: Risk Adjustment

Block 4: Residual Margin

- Present value of fulfilment cash flows
- Cost of uncertainty
- Eliminates day one gains

Building Block 1 - Cashflows

When does the contract start?

- Premium received
- Acquisition costs
- Expenses

When does the contract end?

- Premium received
- Claim payment

What cashflows are included?
Building Block 2 - Discounting

- An insurer should discount cash flows using a discount rate that reflects the characteristics of the liability.
- Discount rate must be consistent with factors such as:
  - Currency
  - Liquidity
  - Duration
  - Consistency with market values

Building Block 3 - Risk Adjustment

- The objective of risk adjustment should be to reflect the "compensation the insurer requires for bearing the uncertainty inherent in the cash flows that arise as the insurer fulfils the insurance contract"
  - including the extent to which any diversification benefits affect the amount of compensation required
- No restriction on the range of available techniques to determine the risk adjustment
Building Block 4 - Residual Margin

• Eliminates day one profits
• Occurs when:
  \[ PV \text{ of Future Inflows} > Risk \text{ Adjustment} + PV \text{ of future outflows} \]
• Day one losses are recognised immediately

Premium Allocation Approach ("PAA") - Definition

• For short duration contracts, pre-claims obligation at initial recognition is calculated as
  – the premium, if any, received at initial recognition
  – PLUS the expected present value of future premiums, if any, that are within the boundary of the existing contract
  – LESS incremental acquisition costs
• Subsequently, the pre-claims obligation is reduced over the coverage period in a systematic way that best reflects the exposure, as follows:
  – on the basis of the passage of time
  – BUT on the basis of the expected timing of incurred claims, if that pattern differs significantly from the passage of time
Premium Allocation Approach ("PAA")

• For short duration contracts, PAA is permitted, rather than required
  – if PAA approach produces measurements that are a reasonable approximation to those that would be produced by the building block approach
• The insurer measures the liability for remaining coverage using the premium receivable at inception

Premium Allocation Approach - Eligibility

• IASB Staff tested some example contracts to see whether PAA could be used

  - Personal Automobile Insurance YES
  - Catastrophe Insurance YES
  - Workers' Compensation Insurance YES
  - Health Insurance Contract YES
  - Japanese Fire Insurance Contract (30-year) NO
Onerous Contracts Test ("OCT") - Definition

- A portfolio of insurance contracts is onerous if the expected present value of the future cash outflows from that portfolio plus the risk adjustment exceeds:
  - the expected present value of the future cash inflows from that portfolio (for the BBA)
  - the carrying amount of the liability for the remaining coverage (for the PAA)
- Put more simply, a portfolio of contracts is onerous if it is expected to be loss making
- For the PAA, onerous contracts should be measured on a basis which is consistent with the measurement of the liability for claims incurred

Onerous Contracts Test ("OCT")

- When applying PAA, an insurer shall test whether a contract is onerous if facts and circumstances indicate that the contract might be onerous

- Portfolio Level - Similar date of initial recognition of the contract and coverage periods

- Risk Margin
PAA - Pre Claims and Post Claims

For the IASB the liability for incurred claims is measured using the risk-adjusted expected present value of fulfilment cash flows.

Pre-Claims Liabilities
- Premium is amortised over time.
- Onerous Contracts Test

Post-Claims Liabilities
- Calculated using the building block approach
- No residual margin is accounted for

Onerous Contract Test - Underwriting Cycle

- OCT should reflect the current position of the underwriting cycle
- Consistent with ORSA?

Market levels off and cycle begins again
- Competition increased
- Market saturated
- Premiums low
- Profits down

Premium Income

Some years

'Catastrophe'

'Onerous'?

'Not onerous'?

'Soft' market conditions
Profits down, competition decreases, capital needed to underwrite business down

'Hard' market conditions
Underwriting standards more stringent
Definition of a portfolio of insurance contracts

IASB Staff's recommendation of portfolio of insurance contracts:

- Are subject to similar risks
- Have similar expectations of profitability
- Are managed together as a single pool

Suggested application guidance

In determining whether a group of contracts is subject to similar risks, an insurer shall consider the following factors:

- Type of risk insured
- Product line
- Geographical location
- Type of policyholder
Suggested application guidance

In determining whether a group of contracts is managed together as a single pool, an insurer shall consider:

- Manner in which contracts are acquired
- Manner in which contracts are serviced
- Business unit in which contracts are managed
- Geographical location

Personal Line Pricing Optimisation - Multi Product Holding

- A portfolio of insurance contracts shall not group together risks that are not similar or product offerings that are unrelated

**Impact on pricing optimisation**

Multi-product holding

**OCT**

Each product will be measured separately.
Personal Line Pricing Optimisation - Life Time Value

- Motor companies have typically managed portfolios of insurance contracts by acquisitions channels
- For business sourced from aggregator:
  - In the first year, these may be loss making (due to high level of competition and Aggregator fees)
  - But over three years a profit is expected to be made (higher premiums can be charged at renewal as customers are less price elastic at renewal)
- Classify as onerous?

Personal Line Pricing Optimisation - Auxiliary Incomes

- Example of fixed-fee service contract in the ED:
  - "a contract for car breakdown services in which the provider agrees, for a fixed annual fee, to provide roadside assistance or tow the car to a nearby garage"
- What about Motor Legal?
- Unbundling of service component from the insurance contract
- It is normal practice in pricing optimisation to take account of customers' propensity to buy motor add ons and adjust the insurance price accordingly. This implies some portfolio of contracts may be onerous if motor add ons are not included in OCT
### Business Impact - Corporate Structure

- **GROUP**

  ![Underwriting Entity](image1)
  Technical pricing: integrating pricing, reserving and capital modelling

  ![Broking Entity](image2)
  Pricing Optimisation and growth strategy

### Key differences between IFRS4 Phase II and Solvency II

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<th>IFRS4 Phase II</th>
<th>Solvency II</th>
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<td>Objectives</td>
<td>Make it easier for users of financial statements to analyse performance of insurers</td>
<td>Protect policy holders and improve regulation across EU insurance market</td>
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<tr>
<td>Coverage</td>
<td>Insurance contracts</td>
<td>Any EU regulated insurance company</td>
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<td>Discount Rate</td>
<td>Determined by the insurer, reflects characteristics of the liabilities</td>
<td>Determined by EIOPA</td>
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<tr>
<td>Risk Adjustment</td>
<td>Determined by the insurer, reflects characteristics of the liabilities</td>
<td>Methodology for calculation specified by EIOPA</td>
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<td>Day one profits</td>
<td>Eliminate using residual margin</td>
<td>Recognise</td>
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<tr>
<td>Timescales</td>
<td>Expect a next draft to be published H2 2012, No official effective date. Possibly, 1 January 2016?</td>
<td>Current effective date 1 January 2014</td>
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Any Questions?

Website for IFRS

http://www.ifrs.org