The Actuarial Profession

making financial sense of the future

Life Conference and Exhibition 2011 Tim Ford & Michael van Vuuren, Ernst & Young

International experience of internal model approval

21 November 2011

Agenda for today

- Context
- What might we have expected?
- Practice to date
- The Swiss experience
- Implications

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Context

IMAP around Europe

Ireland: large number of firms (approx 50) in the process due to Variable Annuities and groups with Irish operations (only about 10 where CBI is the lead regulator)

Belgium: Pre-application process just launched, 4 to 5 companies that we know of are entering this

Spain: around 20-25 companies have applied, mostly for Partial Internal Models

Portugal: Only two companies aiming to develop a full Internal Model

Many firms only just starting their S2 programmes, no (pre-) applications have been submitted to supervisor yet **UK:** 75 companies remain in the pre-application process (loss of around 25%)

Netherlands: Initially 15 companies applied, this is now down to 6 Poland: 16 companies (mainly international groups)

Italy: 4 domestic companies

France: 14 companies are in the first wave of the process mostly for Partial Internal Models. ACP has started reviewing some IM components

Germany: 3 largest companies currently in the process; a further 5-10 expected to initiate discussions with BaFin

Italy: 4 domestic companies currently in the process and international groups. No further companies intending to enter

Focus is on Partial Internal Models excluding operational risk

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CEIOPS' former CP 37 and CP 80

- Over March 2009 March 2010 firmed up the concept of pre-application
- ▶ Set out the sections A-N of the eventual application
- Specifically raised "consistency of outcome" through training, communication between supervisors and engagement with pre-application
- ► CEIOPS role: "...to ensure that pre-application processes do not differ considerably either in theory or practice between countries in order to ensure supervisory convergence and consistency of outcomes and to mitigate regulatory arbitrage."

CEIOPS-DOC-76/10, Pre-application process for Internal Models (former CP80), section 6.18

EIOPA's planned activity for 2011

- Medium term workplan specifically addressed the need for supervisory convergence
- Drafting of Level 3 guidelines
- Supervisory training programme
- "...to enhance supervisory convergence and consistency in the (pre-) application process –specifically for groups-, both in terms of processes and outcomes. This will substantially mitigate concerns on potential regulatory arbitrage."

EIOPA Solvency II Medium Term Workplan (2011-2014), section 3.41

So...what might we have expected?

Solo perspective

- Held to the same standard regardless of EEA jurisdiction, no "gold plating"
- Consistent timeline of activity
- Consistent process for pre-application

So...what might we have expected?

Group perspective

- Group wide activity rather than multiple local equivalents
- Co-operation and co-ordination between supervisors
- Minimal local re-work/duplication
- Single model approval process
- Single model application
- As per solo, consistent timeline and process

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The practical challenges are significant

- Pre Solvency II, supervisors have primarily been concerned with local policyholder protection
- ► Colleges are a complex set of relationships, evolving rules for co-ordination and 102 groups with colleges to supervise
- ► The economic environment, in particular the sovereign debt crisis, is not helping!
- ▶ In addition, EIOPA's creation and developing powers further complicate the picture (Omnibus II)
- ► Language of documentation adds additional requirements
- Arriving at a group process which is "fair" for local insurers

- **►** Timeline
- Approach to review and interaction
- Resources (quantity and quality)
- ► Technical aspects

Timeline

- ► Some supervisors started in 2009
- ► Others have yet to start
- ► Most kicked something off in 2010

Approach to review and interaction

► Full day on site workshops on single risk categories (eg equity) where companies have faced a 'grilling'

VS

- ► 'Desktop' review of documents, no technical feedback
- Clearly defined process

VS

Bespoke process (or none at all!)

Resources (quantity & quality)

- ▶ Wide range (1 to 10+), only a few can allocate significant resources
- Commonly 2 to 4 individuals allocated to each firm in preapplication
- ► 'Experts' are scarce
- ► High staff turnover is a common issue

Technical aspects

- ► The meaning of 'Independence' for validation
- Extent of technical feedback
- Extent of reliance on benchmarking
- Extent of sensitivity testing of different approaches
- Willingness to rely on other supervisors

Emerging challenges on some methodologies

- Variance/covariance aggregation and full risk distributions
- Depth of time series analysis supporting non-market risk stresses
- Portfolio replication and other approximation techniques

But there are similarities too

- Aligned view of the "destination" per CEIOPS-DOC-76/10, former CP 80
- ► PAQC: UK 4/2010, Germany 10/2010 very aligned
- ► SAT: UK July 2010, Ireland early 2011, Germany mid 2011, Netherlands August 2011
- ▶ Some alignment also coming from Level 3 "consultations"

And some frustrations!

- ► "Clearly regulators will eventually have to agree on the application date but little evidence that they intend to followed a "joined up" approach."
- "We're effectively getting sum of individual regulators!"
- "the regulator is staffing-up by poaching our team!"
- "Everything seems to be a "Major" item!"

Some specifics: Poland (KNF)

Market concerns on lack of staff but increased IMAP activity over 2011. Pre-app entry deadline 30/9 Encouraged insurers to participate in pre-IMAP process, issued detailed instructions and organised meetings with every participant Surveys on readiness for the ORSA to identify which firms would experience most difficulties Periodic training being conducted

on hot topics



Some specifics: Ireland (CBI)

Generally felt to be aligned with FSA

IMAP comprises of three stages:

- Readiness Assessment
- Pre-application (Submission, Walkthrough, Decision on assessment, Model Overview & Work plan by CBI)
- Formal application

Many firms in the Walkthrough phase (Use Test, Governance, SQS Local, SQS Group, Calibration, Validation, P&L Attribution, Data, External models and Documentation)



Some specifics: Germany (BaFin)

BaFin has not published anything publicly since pre-application requirements

Only 3 companies aiming to get approval in the first stage - training and discussion to be held between BaFin and these companies

Other companies observing experience of top three firms and may follow later



Some specifics: France (ACP)

ACP has started the preapplication process and organised the review of Internal Models with each company.

IMAP comprises of three stages:

- Methodology review
- Calculation review
- Results review

Evidence of extensive documentation required to demonstrate the appropriateness of a firm's Internal Model



Some specifics: Italy (ISVAP)

Slow start. Little guidance locally from the regulator. Now staffing up.

ISVAP has commenced with requests for information on:

- ► Risk governance
- ▶ Data quality

Lengthy process expected approximately 12-14 months, following a risk by risk approach



Some specifics: Netherlands (DNB)

SAT covers A.120-125 and detail of DOC 48/09

Gap analysis on each requirement and set out actions to close these

IM split into "overall" parts and "component specific" parts.

Independent validation / review report for each component of the IM is required.

DNB require an Internal Audit signoff on Contents of Application Template



EIOPA's latest initiatives

- Monthly informal meetings
- ► FAQs on pre-application
- Ad-hoc training for supervisors
- Peer review of work done in pre-application
- ► Engagement in colleges for group model pre-application

"The European perspective" Paolo Cadoni, EIOPA Internal Models Committee Chair, London, 3 November 2011

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The Swiss experience

- Strong encouragement and incentive for application over 100 models in the process
- Process has been running for 3 years; no models yet formally approved
- Submissions focused on detailed methodology description
- Focus on methodological and technical aspects
- ► Limited requirements for companies to perform own validation
- Significant regulatory resource constraints outsourcing to third parties for some issues
- ► Some private feedback provided, with mixed response

So what can we learn from Switzerland?

Do..

- ensure submissions are complete, precise and mathematical
- develop a strong informal regulatory relationship to provide early feedback on any "showstoppers"
- challenge your supervisor's view if you have the supporting evidence – they are learning too

Don't...

- expect too much formal feedback from the start
- rely too much on market practice as justification

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Possible implications

- May get worse before it gets better for groups
- Knock on delays to model approval for solo entities possible
- Potential for "component" approach to validation becoming the standard
- "Provisional" or "Pending" model approval per Switzerland?
- ► Further enhancement of EIOPA's role?

Questions or comments?

Expressions of individual views by members of The Actuarial Profession and its staff are encouraged.

The views expressed in this presentation are those of the presenters.