The Actuarial Profession making financial sense of the future

Turbo Charging your Actuarial Function

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> 2006 Life Convention SECC, Glasgow 6 November 2006





Agenda

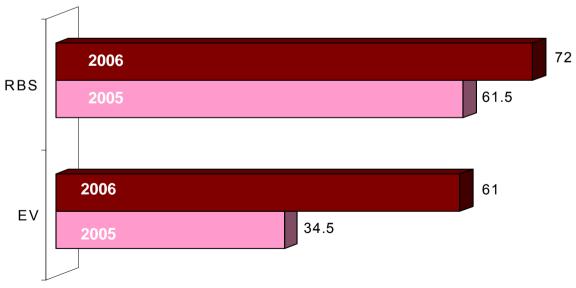
- Why should you do something?
- What's stopping you?
- How could you make a difference?

Why should you do something?

Time Pressures

- → 40% of companies are planning to reduce their external P&L reporting timetables for the 2006 year end, while nearly 60% plan to cut time out of their EV/EEV timetables.
- → FRS26 and EEV have increased reporting requirements
- → Reporting timescales have increased as a result

Median Calendar Days taken to Finalise Liabilities



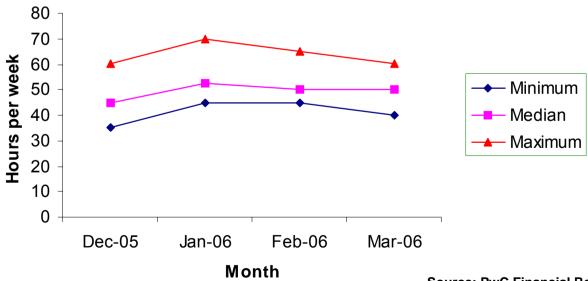
Source: PwC Financial Reporting Process Survey

Why should you do something?

Staff Pressures

- → Increasing pressures from Group on speed and accuracy of reporting, EV etc.
- → However, resources are already stretched.
- → People are undertaking factory tasks and not-motivated or challenged

Hours worked by key staff



Why should you do something?

Cost & Margin Pressures

- → Closed fund runoffs
- → Market structure (NPSS, Stakeholder)
- → Offshoring / Outsourcing
- → Distribution costs
- → Rising competition (annuities)

Agenda

- Why should you do something?
- What's stopping you?
- How could you make a difference?

What's stopping you?

Diagnosis in the early 21st Century

What we see

- Failure to meet deadlines
- Surprises and volatility of result
- Convoluted process
- Large operational finance departments
- "In the trenches" mentality
- Cost of Finance is high
- Poor analytics and MI

What is the cause

- Under investment in people and technology over the years
- Multiple reporting bases with separate data flows
- Processes and structure have evolved rather than been designed
- Propensity to drive change is low
- Back office inadequacies impact Finance (dirty data)
- Poor communication between different parts of the business

What's stopping you?

Cultural and Organisational Issues

- Actuarial viewed as a scorekeeper
- Lack of commitment from others in the business to timely and accurate information
- ➤ A professional desire to get it 100% right before moving on
- Resources not motivated or adequate for type and volume of work
- Increasing pressures from Group on speed and accuracy of reporting, EV etc.
- People undertaking factory tasks and not-motivated or challenged
- Don't see a career in repetitive non-value add tasks
- Viewed purely as a back office function

What's stopping you?

Process and System Issues

- Failure to plan;
- Information collection, provisions calculation, reconciliations etc. delaying the close;
- Often little formal process
- Workload management has to balance year end, operational and special projects;
- No value add in the reporting process rather collation of data
- Review and QA is cursory
- Reporting systems may be old and designed for another purpose
- Extensive use of non core systems to produce mission critical information;
- Manual re-keying of data impacts of speed and accuracy

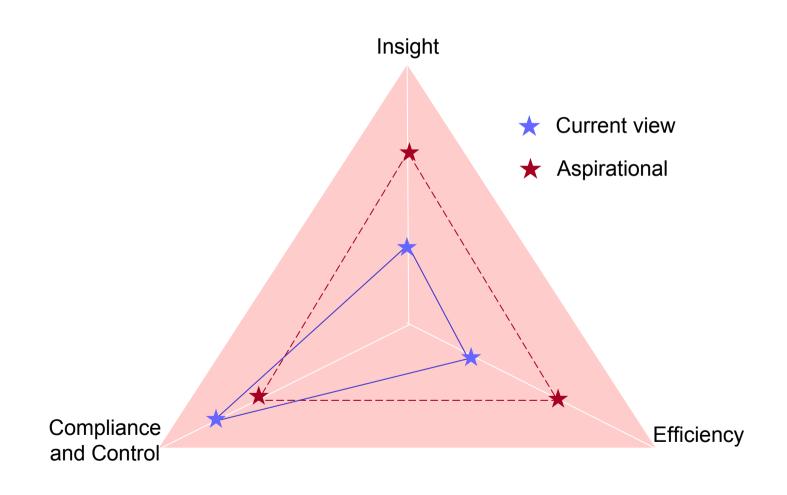
Agenda

- Why should you do something?
- What's stopping you?
- How could you make a difference?

- → Redefine role
- → Redefine structure
- → Redefine process
 - → FastClose
- → Top 10 tips



Critical drivers in transforming the actuarial function



Determining the role for Actuarial is a primary driver in shaping the function

Business skills

Commentator

- Business recognises value of decision support available within Finance and Actuarial and requests support as required
- Actuarial as 'commentator' explaining the business story in numbers

Business partner

- Actuarial activity takes knowledge to business
- Acts as business advisor and integrator
- Providing insight and advice on competitive issues/strategy

Actuarial skills

Score keeper

- Role focused on bookkeeping
- Inward looking culture
- Slow to change
- Efforts focused on transaction processing and month end figures

Diligent caretaker

- Role focused on governance
- Works with business to ensure compliance and effective controls
- Efficient processes benchmarked and managed for continuous improvement

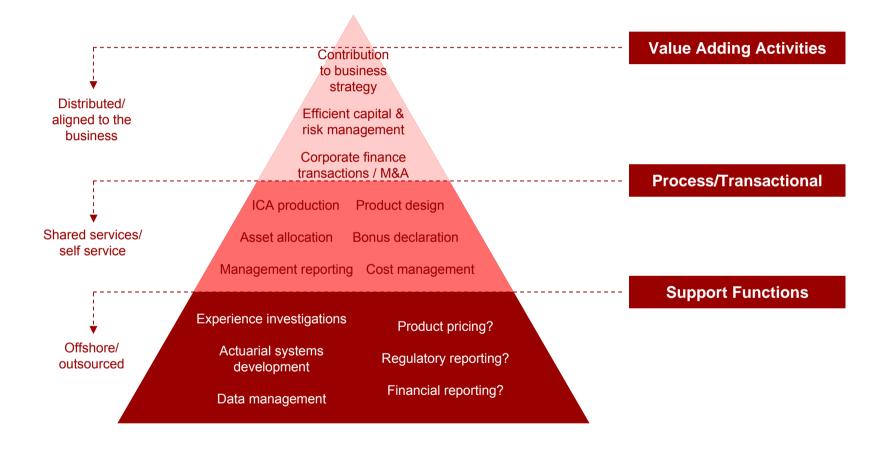
Reactive

Proactive

Aspirations



We are seeing clear standards emerging in actuarial operating models



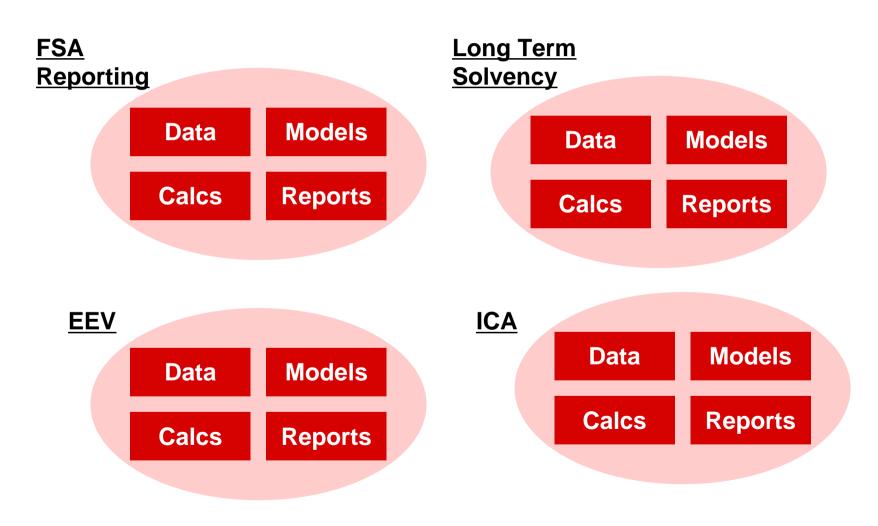


Understand the process for the existing structure

- Process mapping
- Controls
 - Data
 - Calculations
 - Outputs
 - Statutory reporting
 - ICA
 - ALM recommendations
 - EEV
 - Bonus recommendations

STRUCTURE

Existing structure



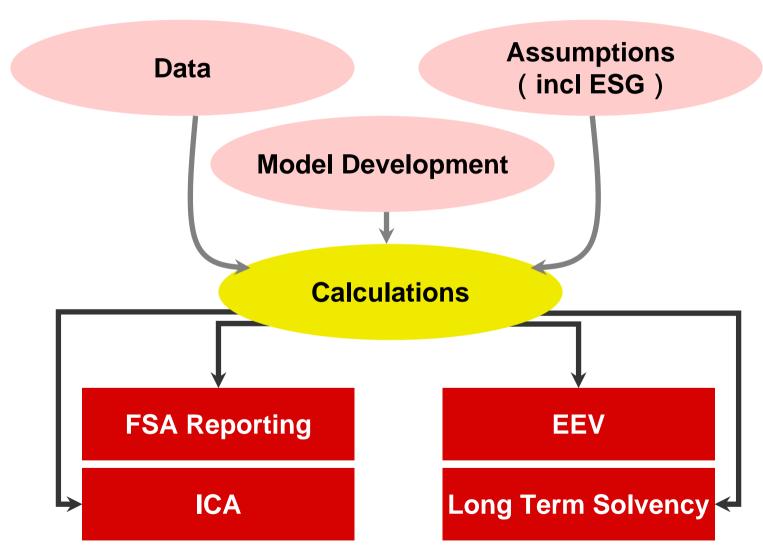


Existing structure - issues

- Model duplication
- × Poor controls
- Duplication of work
- Inconsistencies in work
- Highly qualified / experienced staff required in all areas



More efficient structure



STRUCTURE

Proposed structure

- ✓ Better controls
- ✓ Staff specialisation
- ✓ Less experienced (= less expensive) staff in some areas
- ✓ Requires rigorous work scheduling in
 - Data management
 - Assumptions
 - ESG
 - Model development



How could you make a difference? Learn PROCESS Examples of initiatives behind actuarial strategy programs -

- Quantify and aggregate risks.
- Implement a commercial strategy in risk terms.
- · Redefining the KPIs for the business
- · Global MI software with extensive "drill down" capabilities for group
- Updating and automating the planning process
- Identify, document, test and remediate key controls.
- Improve process and controls
- Ongoing efficiency improvements

 Initiate and co-ordinate benchmarking.

Risk Management

Business Performance Management

Controls Environment

Managing Actuarial function as a business

Systems

Data

Capital Management

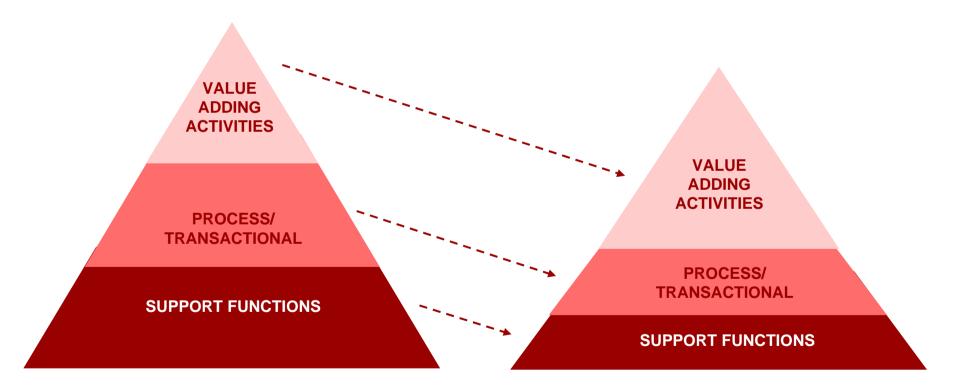
Reporting Requirements

- Rationalise legacy systems
- Agree timetable for finalisation and signoff of models.
- Benchmark PC availability to peers
- · Improve data conversion systems
- Data cleansing exercise
- · Identify, document and agree data requirement with across business functions.
- Setting up capital allocation
- · Accurate.
- Time to close books shortened from 30 to 3 davs
- · "Smart close".
- Well understood

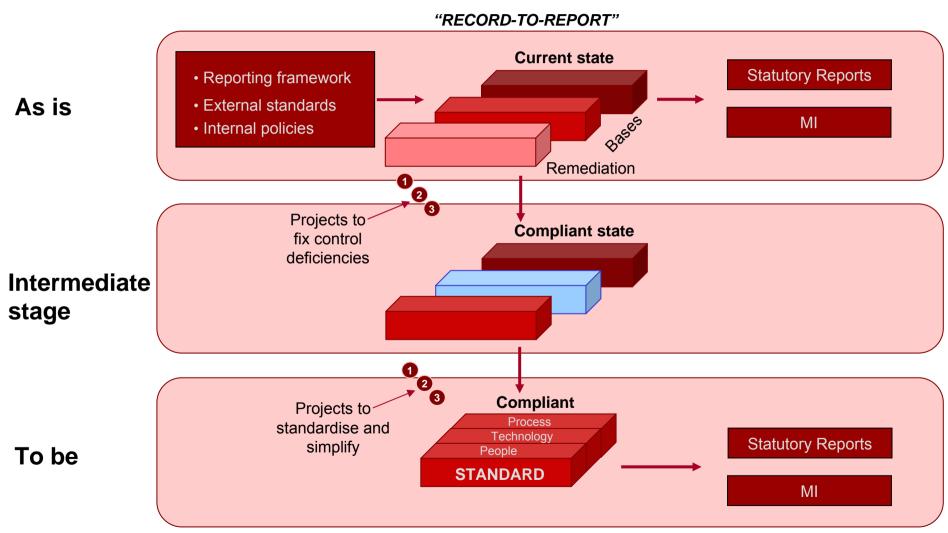
PROCESS

Process re-engineering

- ✓ Re-designing processes can free up time to spend on value adding activities
- ✓ It may also lead to cost reductions



Standardisation and simplification is key to addressing the efficiency and control agenda



PROCESS

Typical Process Improvements







 Too much time spent verifying asset data from investment managers

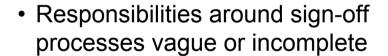


 Agree format, contact and checks that IM should perform and install as service agreement





 Ring fence actuarial resource to critical path only





 Introduce clear governance detailing who signs off results and processes

 Demographic basis process is not fixed / late changes are accepted



 Agree sign-off process, confirming the basis document before "Day 0"

Lack of understanding of critical path



 Produce detailed timetable showing all processes, interactions and dependencies, identifying bottlenecks and critical points.



Stakeholder agreement

- → Important not to re-engineer processes in isolation. Securing both management and auditor buy-in before implementation is crucial.
- → A comprehensive deliverables list can be used to ensure key stakeholders are in agreement upfront.

| | A | С | D | E | F | G | Н | | К |
|---|-------------|----------|--|---|---|---|-------------------------------------|------------------------|----------------|
| 1 | Deliver | ables re | auired | | | İ | | | |
| 2 | Version 1.1 | | | | | · | | | |
| 3 | Report | Area | Section | Objectives • | Requirements • | Information provided at YE2005 | Comments on adequacy of information | Contacts | Target Date |
| 4 | Regulatory | Data | Data Trail | Verify that data completeness checks have been carried out as per documented procedures and that all anomalies have been investigated and explained reasonably. Check that appropriate allowance has been made for policies identified as missing from the data. Review management's movement analysis and resulting explanation of significant movements for reasonableness. | PROCESS AND CONTROLS PACK (REGULATORY DATA) 1a Process and control documentation and flowchart 1b Evidence that process and controls are carried out DATA PACK (REGULATORY DATA) 1c Reconciliations of policy counts/SA/premiums from download to final results and/or similar controls 1d Analysis of movement for totals/by product class for policy count/SA/premiums (ie reconciles totals at beginning and end of year 1e Details of other analytical reasonableness checks by management 1f Summary of rejected policies and details of steps taken to account for them in the valuation 1g Walkthrough meetings | | | Contact A Contact B | WD5 |
| 5 | Regulatory | Systems | Systems Access Controls and Integrity | Review the controls in place to ensure that the systems are not inadvertently or deliberately altered leading to a misstatement of reserves. | PROCESS AND CONTROLS PACK - SYSTEMS 2a Document detailing the change controls around the valuation system in particular restricted access, back up systems, the system changes procedure, version control procedures etc. 2b Evidence that the process and controls are carried out | Information sourced from email correspondence with the valuation teams and walk- through meetings carried out by auditors | | Contact C Contact D | WD9 |
| U | Regulatory | Systems | System Changes | Understand the justification for system changes made since the previous valuation and assess the reasonableness of the impact of these changes on financial results. Review the process used to implement system changes. Assess the testing of the models performed and signoff packs for reasonableness. | SYSTEMS PACK (CHANGES) 3a List of planned/actual changes to system in year and evidence controls in place around them including appropriate sign off 3b Demonstration that of the effect of each material system change and justify that the level of the change is reasonable. 3c For significant changes, e.g. new products, the effect of the change should be verified using an independent system and a series of representative policies that cover all features of the business. | Information sourced mainly from email correspondence, walkthrough meetings and the following documents: > Change control spreadsheets > Problem Log | | Contact Y Contact Z | VDII |



Year end fast closing

- Listed company expectations
- Full close or early close and roll forward?



Timeframes – EV reporting

This year's Financial Reporting Process Survey included 5 of the 7 FTSE 100 life insurers

2005 Year-End EV Timescales Exper Investigation Model Dev Cut-Off Expense Assumps Demog Assumps 120 100 80 60 Calendar Days 40 20 0 -20 -40 -60 -80 -100 − Fastest - x Median → Slow est Min Max

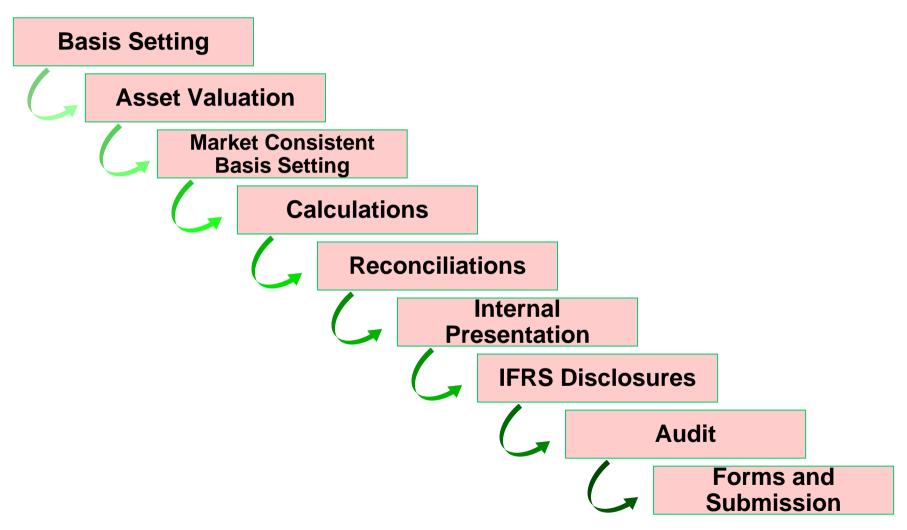


Full close for a year end

- Steps
 - Basis setting
 - Asset valuation
 - Market consistent basis setting
 - Calculations
 - Reconciliations
 - Internal presentation
 - IFRS disclosures
 - Audit
 - Forms and submission



Full close for a year end



FAST CLOSE

Full year end close

- Benchmarking
- Change management programme
- Implementing
- Cultural impact



Top 10 tips

- 1. This cannot be just fitted around the day job by business as usual
 - Time and resource
 - Skills and capability
- 2. How do you eat an elephant? One bite at a time
 - Prioritise based on critical path
 - Quick wins establish momentum.
- 3. Financial reporting starts before the finance function get involved
 - End to end process
- 4. Manage the stakeholders
 - Within the wider business, particularly executive demands
 - Third Party Administrators
 - Auditors
- **5. Remember CHOCOLATE** (mnemonic for participant ground rules) committed, honest, open, constructive, ownership, learning, adventure, team, enthusiasm.



Top 10 tips

- 6. Do what you can before Working Day 0
 - Year end balances not necessarily needed
 - Ring fence time and resource
- 7. Materially correct and on time is better than 100% accurate and late
- 8. Communication and Challenge
 - Accountants and Actuaries need to understand each other
 - Internal and external network
- 9. The more often you do it the easier it gets
 - Turning annual reporting into a non-event
- 10. Get involved this is a chance to make a difference to your working life

Questions

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