INTERNATIONAL ACTUARIAL ASSOCIATION

Mortality Working Group
May 24-25, 2013
World Forum, The Hague, Netherlands
Europe 2 Room

Minutes

Present:
Martin Stevenson – Chairperson
Bill Horbatt – Co Vice Chairperson
Henk van Broekhoven – Co Vice Chairperson
Erik Alm
Michael Eves
Séverine Gaille
Dieter Gaubatz
Al Klein
Paul Lewis
Mika Mäkinen
Darko Medved
Taisuke Nishimura
Ermanno Pitacco
Thierry Poincelin
Lars Pralle
Adam Reese
Brian Ridsdale
Marc Tardif

Invited Guest:
Pablo Antolin – Organization for Economic Co-operation and Development

Conference Call Participant:
Bridget Browne
Absent:
Chresten Dengsøe
Ksenia Novikova
Dov Raphael
Luis Maria Sáez de Jáuregui Sanz
Paul John Sweeting
Benoit Laurent Yema
Peter Ying
Zhaolan Zhan

Observers Present:
Avi Bar-Or, Israel Association of Actuaries
Ignacio Del Barco Martinez, Col.legi D'Actuaris de Catalunya
Ricardo Frischtak, Co-Vice-Chairperson, Accreditation
Morten Harbitz, Chairperson, ASTIN Bulletin Management Board
Ting-Yueh Hou, Actuarial Institute of Chinese Taipei
Li-Ping Hsu, Actuarial Institute of Chinese Taipei
Aline Lamoureux, Institut des Actuaires en Belgique
Michael McDougall, Actuarial Society of South Africa
Hui-Lien Tsui, Actuarial Institute of Chinese Taipei
Hilda Van Der Veen, Het Actuarieel Genootschap
Gunn Albertsen, Den Norske Aktuarforening
Vladimir Novikov, Russian Guild of Actuaries

The Chairman welcomed all members and observers present.

1. Minutes of the previous meeting

The minutes of the previous meetings in Nassau, Bahamas were accepted.

2. New members / retiring members

It was agreed that it would be desirable to increase the membership of the Group, so that the workload could be spread over a larger base of resources, and so that our geographical spread would be increased. It was further confirmed that persons would only be invited who would actively participate in some manner in the activities of the Group. Further admissions would be monitored by Martin Stevenson and Erik Alm.

The initial additional invitees will be from Argentina, Austria, Brazil, Greece, Indonesia, India, Mexico, Norway, Poland, Portugal, South Korea, Thailand and Turkey.

The following changes in membership were advised:

- Adam Reese (USA) joins the Group
- Thomas Terry (USA) moves from member to interested person
- Aline Lamoureux (Belgium) joins the Group
• Benoit Yerna (Belgium) moves from member to interested person
• Hiroshi Yamazaki (Japan) joins the Group
• Taisuke Nishimura (Japan) moves from member to interested person
• John Armstrong (Ireland) moves from member to interested person

3. Country reports

Country reports were received in respect of:

• Australia Bridget Browne
• Canada Marc Tardif
• United Kingdom Brian Ridsdale
• USA Dieter Gaubatz
• The Netherlands Henk Van Broekhoven (verbal report)

4. Moving existing Country reports onto the template

The Chairman advised that Peter Ying had agreed to co-ordinate the project of moving the existing country reports onto the template.

The current plan is that by the meetings in Singapore Peter will put onto the template reports from Taiwan and Australia, and one from the Americas and one from Europe.

5. International Experience Study (IES)

Bill Horbatt provided an update on the IES. Studies are being or have been conducted in the following countries / regions:

Argentina Brazil (incomplete) Caribbean (in progress)
Croatia (in progress) Estonia Mexico (in progress)
Philippines Poland Vietnam

Further work in respect of the Philippines is on hold due to contractual difficulties.

A number of members of the Group volunteered to assist Bill in gaining additional corporate sponsors for the IES.

6. Historic comparative mortality improvements using the HMD

Bridget Browne provided an update on her project of comparing mortality and mortality improvement across countries represented in the Human Mortality Database. The analysis will be through heat maps.

The paper is expected to be completed by August, in readiness for ICA 2014. The paper will also be discussed in the MWG meetings in Singapore.

7. OECD Projects on Mortality and Annuity Products

Pablo Antolin presented on the OECD projects on mortality and annuity products.
In respect of mortality, the project was to assess how pension funds, annuity providers and the regulatory framework incorporate future improvements in mortality and life expectancy. It was found that in most countries mortality tables do not account fully for future improvements. Mortality tables used by insurance companies account for future improvements in more countries than those used by pension funds.

Pablo requested:

- Mortality data (1960-2010) for annuitants or life members populations
- Mortality data by income, educational level, professions, or other socio-economic variables
- Studies that look at mortality and life expectancy differences across different population socio-economic subgroups.

In respect of annuities, the purpose of the project is to understand better the problems facing annuity markets.

Pablo’s contact details are: pablo.antolin@oecd.org

8. **Report from Underwriting Committee**

   Al Klein provided a progress report in respect of the Underwriting Committee. The full report, which will be presented at ICA 2014, will also be presented at the meetings in Singapore.

9. **1 in 200 year mortality event “nonsense or possible”**

   Henk Van Broekhoven made a presentation in respect of an analysis with respect to mortality of statutory requirements for a reserve against a 1 in 200 year event. Henk will produce a follow up paper for Singapore, in combination with his role in the Solvency Subcommittee.

10. **Practical problems with the Lee Carter model**

   Erik Alm provided a presentation on the practical problems associated with the Lee Carter Model. The presentation will be updated and included on the website later this year.

11. **Upcoming events**

   *European Actuarial Academy* (August 2013) A list of possible topics will be forwarded to Severine Gaille to pass on to the European Actuarial Academy, with a view to some members of the Mortality Group presenting to the Academy. Travel expenses may be reimbursed.

   *Singapore meetings* (October 2013). Paul Lewis will make one last attempt, but it appears unlikely that the MWG will have an opportunity to present on mortality related issues.

   *ICA meetings in Washington* (April 2014) Members of the MWG presenting are Al Klein, Bridget Browne and Ermanno Pitacco. It was agreed that the MWG would seek some publicity, possibly through posters. The Chair is to investigate.
Mortality and Longevity Symposium (London 2014) Brian spoke to the following Symposium presentation. Brian also produced the following notes on the discussion:

“Subjects

Subject that would be of interest to the international community include:

- The impact of Genetic profiling on medicine and longevity
- Substandard annuities
- Healthy longevity
- Mortality by socio-economics and zip code
- Trends in international mortality using the HMD – slowing down?

Target markets

We need to recognise that part of our international target market of those most interested in mortality will already have attended the “Living to 100” conference in January and/or ICA 2014.

There is no mortality stream at ICA 2014 but IAA MWG members Al Klein, Bridget Browne and Ermanno Pitacco have submitted papers and there may of course be papers from other contributors on mortality.

We might plan to invite certain speakers to (present and) provide updates to their Lt100 and ICA2014 papers at our conference, and/or we might wish to have a particular session on “highlights from Living to 100 and ICA 2014”.

Membership of the planning group

Paul Lewis (South Africa) is willing to join the planning group (he has been involved in planning for previous IAA MWG sessions). (By phone of course!)

Séverine Gaille (Switzerland) may also be willing to join, she will let me know.

Pricing and practicalities

Séverine Gaille mentioned that academics may be funded to attend conferences if they are making a presentation (but not otherwise). This could be as small as a poster or participating in a breakfast meeting. We should consider offering these opportunities when we are designing the overall programme.

Timing

We need to get out the publicity within the next couple of months, so that potential attendees can put the conference and travel costs into their budgets for next year.”

12. Website Information Base and publicity for the MWG

Christian Levac and Brian Ridsdale provided an update on the contents of our website and the usage statistics. The most visited site was “Healthy Longevity”.

2013-07-08
In respect of publicity, Brian Ridsdale subsequently provided the following notes:

“1. After each meeting we shall produce a brief summary report ("the IAA Mortality update") of the main items of interest arising from our meeting, for circulation to members of our own associations with an interest in mortality

2. We will aim to refer (hyperlink) to papers, minutes, etc on the website, so readers of the summary report are encouraged to refer to the website, thus publicising the website and bringing in new users

3. We shall send the summary report to our own members and observers (one per country), asking them to circulate the report to interested people in their own Actuarial association. We will encourage the recipients to add their own "take" on the news.

4. We shall make a list of countries who are members of the IAA, and who don't have a representative on the MWG, and ask them whether they would like to nominate someone in their association to receive and circulate the report

5. We shall build up a circulation list of interested associations to whom the report will be sent

6. We shall ask for an update from each of our members and observers before each IAAMWG meeting, to confirm numbers of recipients within their association, points of interest, and any other relevant feedback

7. We will summarise this for the IAA MWG meeting”

Dieter and Christian will assist Brian in publicising our website.

13. Vision statement / brochure

The attached brochure was approved.

In particular it was agreed that the vision statement will be:

The Mortality Working Group will be a preeminent international actuarial body to provide insights and knowledge with respect to mortality and trends in mortality.

14. EU Unisex development

Erik Alm provided an update on this topic. The implementation date has now passed. So far there has been surprisingly little discussion. There is some evidence that margins have widened because of the added uncertainty of not being able to separately price male and female rates.

Erik has been requested to bring to the attention of the Group any significant developments.

15. A preview of new life mortality tables in Finland

Mika Mäkinen presented on new life mortality tables in Finland.
16. **New SoA 2008-09 International Life mortality experience study**

Dieter Gaubatz presented on the *SoA’s 2008-09 Individual Life mortality experience study*.

17. **Ensuring that SOA MORT data base has up to date studies**

Dieter Gaubatz described the SOA MORT data base and requested members to assist in keeping it up to date. Dieter will write separately to members.

18. **Longevity risk in life annuities and pensions: hedging or sharing?**

Ermanno Pitacco provided a presentation on longevity risk in *life annuities and pensions*: hedging or sharing?

19. **Projecting mortality in small populations**

Ermanno Pitacco provided a presentation on projecting mortality in *small populations*.

20. **Integrating our various areas of study**

A discussion was led by Henk Van Broekhoven and Bill Horbatt in respect of combining some of our specialist areas into a holistic study.

It was agreed that the initial project will be a combination of:

- Bill Horbatt: the IES
- Henk Van Broekhoven: Determining insured mortality from population mortality
- Bridget Browne: Comparative mortality studies with the HMD

21. **Topics for meeting**

At the next meeting, the Chair of the Issues Advisory Group (IAG) (Al Klein) will step down, with Bridget Browne and Paul Lewis staying on. A volunteer is sought to join the IAG.

A discussion was held on topics to be discussed at the next meeting. The following were agreed:

- Historic comparative mortality improvements using the HMD (Bridget Browne)
- The OECD’s papers on mortality (and provide feedback to Pablo Antolin)
- How Swiss Re manages mortality uncertainty (Michael Eves)
- The effect of the economy on rates of mortality (Paul Lewis)
- Mortality aspects of Solvency II (Henk van Broekhoven – see item 10)

22. **Next meeting**

The next meeting of the Mortality Working Group will be held in Singapore 10-13 October 2013.
23. Meeting procedure

Although not part of the meeting, the following suggestions were made in respect of making the meetings more effective.

- Country reports would be taken as read
- The time limits on items should be strictly enforced
- For presentations, speakers should allow for comments and questions to occupy one third of the time allotted.
- Action points should be collated and distributed immediately after the meetings.

Respectfully submitted,

Martin Stevenson