

# **BENEFITS & COMPENSATION INTERNATIONAL**

**TOTAL REMUNERATION AND  
PENSION INVESTMENT**





## IACA, PBSS and IAAHS Joint Colloquium: Boston

The Joint Colloquium of the International Association of Consulting Actuaries, the Pensions, Benefits and Social Security section and the International Actuarial Association Health Section was held in Boston in May. It provided a number of plenary sessions, where members of all three associations were present, and a choice of workshops, in which IACA/PBSS had one track and IAAHS another. I mainly followed the IACA/PBSS track.

### OPENING SESSION

#### Keynote Address

The keynote address on the first day, which focused on 'Global Challenges and Opportunities facing the Actuarial Profession' was made by Mr David G. Hartman, President of the International Actuarial Association (IAA). He began by noting that this was the first time that three sections of the IAA had met outside Congresses (held every four years). This was, in effect, a mini-Congress held midway between the two, the next one to be held in Cape Town in 2010.

Founded in 1895, the IAA was celebrating the 10th anniversary of being an association of associations. He defined the vision of the association as being recognized as a major player in the decision-making process within the financial services industry, in the area of social protection and in the management of risk, contributing to the wellbeing of society as a whole. The mission of the IAA, as the worldwide organization of actuarial associations, was:

- to promote professionalism, develop education standards and encourage research, with the active involvement of its member associations and sections, in order to address changing needs; and
- to represent the actuarial profession and to promote its role and reputation bringing it recognition in the international domain.

The values of the IAA he described as integrity, accountability, transparency and objectivity when dealing with member associations, other stakeholders and the public. He said that the next step in the strategic planning process was to identify strategic objectives to fulfil the mission and work towards the vision. Six objectives had been proposed to the IAA Council and were to be accomplished with the support of the member associations, as follows:

- to identify, establish and maintain relationships with key supranational audiences and to provide them with the actuarial input to improve the soundness of decisions being made on important issues with a global impact;
- to facilitate the use and expansion of the scientific knowledge and skills of the actuarial profession beyond the traditional areas of actuarial practice to help advance the quality of actuarial services offered by individual members of its member associations;

- to establish, maintain and promote common standards of actuarial education, common principles of professionalism and actuarial-practice guidance for the use of member associations worldwide;
- to support the development, organization and promotion of the actuarial profession in those parts of the world in which it was not present or was not fully developed;
- to provide a forum for discussion among actuaries and actuarial associations throughout the world; and
- to promote and facilitate the globalization of the "actuarial brand".

Mr Hartman remarked that, of the 11 countries with a population of over 100 million, seven had associations with full membership of the IAA. The four large-population countries without a full member were China, Bangladesh, Russia and Nigeria, although two of the top 10 were missing – China and Russia – if looking at countries on the basis of GDP\*. However, he expected both to qualify in the near future. He was pleased to be able to say that both Bangladesh and Russia had representatives at the Colloquium.

In describing the work done by actuaries, he commented that part of it was financial – protecting the solvency and sustainability of both private-sector and State entities through financial soundness and reserve adequacy criteria. Part of it was social protection – developing and maintaining systems of old-age income support and health care for people of all ages. Part of it was risk management – assessing risk and identifying ways of managing risk. Actuaries also contributed by playing a role in regulation and ensuring that their voice was heard whenever policy decisions were to be made.

In one word, Mr Hartman concluded, actuaries faced the challenge of *risk*, including developments in new technologies and biotechnologies, new materials, genetically modified food and new living styles. In the financial area, supervisory authorities in many countries were discovering that solvency could benefit from actuarial input. Catastrophic events represented US\$100 billion worldwide each year. As a profession, actuaries relied on sections of the IAA to promote research and help expand the frontiers of the profession, also to build bridges with other related professions.

### Panel Session

Mr Mike Toothman, Chairman of IACA, introduced a panel (chaired by Mr Paul Thornton), which would explore the theme introduced by Mr Hartman. The panel consisted of Mr Toothman, a Past President of the Casualty Actuarial Society and of the Conference of Consulting Actuaries; Prof. Howard Bolnick, Chairman of the IAA Health Section

\* gross domestic product

(formed in 2002), a Past President of the Society of Actuaries in the USA and Adjunct Professor of Finance at the Kellogg School of Management at Northwestern; and Mr Chris Daykin, Past President of the Institute of Actuaries and Chairman of the PBSS section of the IAA, which was founded five years ago, and a former UK Government Actuary.

In the context of 'Global Challenges and Opportunities facing the Actuarial Profession', the first question presented to the panel was, 'What do you see as the area where the greatest change can be expected?'

Mr Toothman's response was that technology would change what actuaries did, especially in the casualty, i.e. general insurance, area. The challenge would be to quantify the probabilities and ranges around the actuary's 'point estimate'. Demography would create a number of challenges and opportunities for the actuarial profession, especially in the areas of pensions and health care. He expected to see growth in the actuarial profession, especially in China and India where there were many new actuaries in the pipeline, and these demographic changes would alter the face of the profession. In the United States there was increasing exposure to litigation risk. Opportunities outside the traditional areas included enterprise risk management and micro-insurance.

Professor Bolnick's response was that the environment in which we existed was important. He believed that health-care costs would continue to increase faster than GDP. The developed countries were wealthier so there was strong demand for health care. He saw a trend to a mixed private/public system. There was more room for private health care in both the developed and the developing world and he expected to see more managed care. Discussions as to what worked would take place at national and international level. When considering what this really meant there were three dimensions: new markets for private health insurance in developing and developed countries; more sophisticated tools and techniques in managed care; and the ability to play a role in shaping health-care policy.

Mr Daykin's response was that the seismic shift to defined contribution from traditional defined benefit (which could be described as being in meltdown in some countries) would have an impact on the role of actuaries. In other parts of the world there were huge new opportunities opening up for actuaries to get involved in pension provision. These were mostly individual account systems, though actuaries could still play a role (for example, in managing longevity risks which were fundamental to the individual account system). He believed that this was a core area for actuaries but confessed, "We haven't done well on predicting improving mortality. We've got to do better with risk-sharing approaches." In Europe there was pressure for pension funds to be regulated more like insurance companies. In addition, actuaries were being pushed more into the area of risk and financial management. He expected to see massive reform in social security continuing.

Mr Toothman rounded off these comments by remarking that one of the challenges facing the profession was longevity risk. The risk used to be that an individual wouldn't live long enough; now the risk was that he/she would live too long! Actuaries would have to be more involved in the societal debate.

Mr Thornton then invited reactions from the audience. *Mr Adel Al-Otaibi* from Saudi Arabia said he felt that politics could be a challenge. The question was, how could actuaries and politicians be placed on the same podium? *Mr Ron Walker*

from the United States noted that elsewhere in the world the shift was from public to private but that in the USA the trend was in the opposite direction. Professor Bolnick saw the uninsured in the USA as constituting a major problem. There was a large gap in how actuaries thought about this compared with how politicians received the information and acted on it. *Mr Fred Kilbourne* from the United States felt that getting actuaries and politicians together was like getting Paul Revere and the Redcoats to become reconciled. The excess of promises over provision created such a gap that the two parties would not be able to become reconciled without drastic action. He did not believe that actuaries were living up to their responsibilities. *Mr John Bertko*, also from the United States, saw a group of US politicians as moving towards the centre ground. He felt that the ability of actuaries to make proposals was important. There were obligations to recognize.

Now that the challenges had been mapped out, Mr Thornton asked the panel whether today's actuaries were ready for them. Mr Daykin did not think that actuaries were ready for the new world of defined contribution. Defined benefit would still provide plenty of work for actuaries during its "lingering death". New types of guarantee and protection were needed because there was a massive amount of risk involved in defined contribution (in the areas of investment, interest rates and longevity) and better mechanisms for risk-sharing were needed. Actuaries would have to get to grips with more types of investment product. They had failed to grasp the way in which longevity was improving. This was an area for further development. Professor Bolnick felt that we adapted to change and developed so that, although actuaries were not equipped now, they would find a way (for example, with evidence-based medicine and predictive modelling). There were new ways to assess and rate risk; new products; and new ways to distribute. A better understanding of health policy was required. Actuaries needed to play a part in the evolution of health policy. In his view, more actuaries were needed in the public sector. He did not believe that the actuarial profession was ready but he was optimistic it would get there.

Mr Toothman commented that actuaries were doing the right things to get prepared. "We call it actuarial science and there is science to it but also art," he remarked. There should be a qualification to risk estimates for a better understanding. People were needed to develop tools and techniques. It was important to do a better job of communicating the concept of uncertainty to non-actuaries. Encouraging actuaries to participate effectively in the public policy debate would require better communication skills than actuaries had demonstrated in the past. He felt there was work to be done in the pension, health, terrorism risk and catastrophic risk areas.

*Mr Ian Farr* from the United Kingdom, picking up on the issue of how to engage with politicians and risk sharing, said "we've done it in the UK". Actuaries had been actively involved in a Bill (in the House of Lords at the time of the Colloquium). The objective was to ensure that the legislation would allow risk sharing and he was pleased to say that the Association of Consulting Actuaries had obtained an amendment to the Bill. He was optimistic that it might succeed. There had been a major consultation process with a view to identifying a range of middle ways from full defined benefit to risk sharing.

*Mr Steve Goss* from the United States, commenting on longevity, said that in the USA projections had been made by the actuaries at the Social Security Administration since 1935 and they had been quite accurate. Improvement scales had been introduced much later in standard actuarial life tables for

private life insurance and annuities. To date, these scales adopted by the Society of Actuaries had been “aggressive but a start”. He believed that variability of asset investment was an area that would receive a great deal of attention, as stochastic modelling became more widespread and better understood. On health utilization, he said that the massive growth in expenditure in the USA was because of the nature of the health system that encouraged the most aggressive known medical interventions in all circumstances. As for actuaries and politicians getting together, there had been a long and strong tradition for this. In the United States, government actuaries had worked closely with politicians since before 1935 on social security and subsequently on Medicare legislation. The relationship had followed a specific pattern: when politicians had developed their goals, government actuaries had stepped in and worked with politicians in developing proposals that best met their goals, along with producing cost estimates. The government actuaries were therefore very much involved in the evaluation of proposals because cost mattered in government. This extensive involvement was little noticed in general actuarial circles because it was done without fanfare on a consultative basis. In recent years there had been discontent that actuaries were not widely recognized as visible participants in the political process. However, this went along with the objective ‘umpire-like’ role that actuaries had played. This was an important and critical role that should not be undervalued. Actuaries could have a more visible role, like economists, if they chose to function more in a lobbying role, although this would come at the cost of compromising “the profession’s reputation for objectivity and role as unquestioned scorekeeper”.

*Mr Doug Andrews* from Canada noted that, as the environment was a global issue, there was a role for actuaries there. He also questioned what training/skills were needed for enterprise risk management.

*Mr Alexander Leitchuk* from Russia did not believe that moral hazard was discussed enough, particularly moral hazard from Solvency II. It was generally expected that actuaries would invent the internal models which would always justify lower solvency margins than standardized solvency requirements. However, the opposite could occur: the better the understanding of the risks and the more data there was, the more solvency margin might be needed, while top management would want a *decrease* in solvency margin.

*Mr David Langer* of the United States wanted to focus further on the debate regarding public versus private provision. There had been a deficit in US Social Security since 1987 but “they are told what assumptions to use”. In his view, there was no problem with Social Security and the ‘deficit’ had coloured the discussion.

Mr Thornton invited Professor Bolnick to comment on the competition facing actuaries. Professor Bolnick remarked on the fact that there was plenty of competition in the health area from other groups (epidemiologists, statisticians, etc.) which meant that when actuaries wished to be heard they had great trouble. “You have to have a PhD in something or other to be heard in this forum.” The role of the actuary in the public health system was very strong but it was “a limited and quiet role”. He considered what sort of participation actuaries should have, saying that they had to be very careful to separate ideology from practical thinking. While undoubtedly having strengths, he believed that a weakness with actuaries was that they did not get a good grounding in the environment. In addition, the

life and health areas were very different, so training needs had to be differentiated. Special actuarial skills were required for the health area.

Mr Daykin was then invited to comment and he alluded to Steve Goss’s earlier remarks, noting that The World Bank had promoted the role of economists in pension reform because actuaries were perceived as too narrowly technical. They were regarded as not having public policy awareness – what impact pension plans and social security had on society. In the financial world actuaries could sometimes find themselves in competition with accountants. Actuaries’ competitive advantage was their focus on discounting future cash flows. Accounting standards were moving towards a discounted cash-flow approach to the balance sheet, so actuaries would be well-placed to compete. He believed that an emphasis on professionalism, codes of conduct and strong standards was actuaries’ main selling-point. Lastly, on politicians, he said that they did listen to Government Actuaries. He did not think that actuaries should lobby: they should educate politicians and force them back into being transparent and backed by actuarial evidence and advice.

Mr Toothman echoed, “I don’t think we should be getting into lobbying, although associations might encourage their members as individuals to do so.” He pointed out that one disadvantage lay in the numbers: actuaries were not numerous compared with accountants and financial analysts. However, actuaries had skill-set advantages. “Accountants do a poor job on uncertainties around cash flows. We need to find ways to work hand in hand (*not* us and them).” He was in favour of an exchange of information. He didn’t think that the American Academy of Actuaries had done a good job here. Canada and the UK had done better. Sharing experiences in this area was a role that the IAA could undertake.

*Ms Lei Liu* from China, in commenting on pension funds and actuaries, made the point that, while the present value of the liabilities was known, the performance of the assets was not.

*Mr Eitan Fish* from Israel wanted to know if it was possible to train actuaries to communicate better.

*Mr Junichi Sakamoto* from Japan remarked that social security was in the political environment and was kicked around like a football. It was therefore difficult for the media to interpret the true intention of a policy.

Mr Thornton noted that the two big themes of this panel discussion had been environmental awareness and engagement in policy formation.

In concluding the session, Mr Hartman was pleased that over 30 countries were represented at the Colloquium. He believed that the IAA committees interacted well with international organizations and that the credibility of the profession had been enhanced. The IAA had given unbiased advice. In his view, it would lose out if it became partisan. However, there was a need to become more proactive internationally. At national level, it was up to the local associations to make contact with their politicians. Politicians had ideas on what they wanted to accomplish. Some did not know actuaries existed! Mr Toothman had said technical actuaries were needed, but generalists also, and Mr Hartman believed all was worthless if they didn’t know how to communicate. He agreed that more actuaries were needed. It was possible to have a significant impact on the strength of national programmes and the solvency of insurance programmes.

## PLENARY SESSION

### Delivery, Affordability and Sustainability

The Hon. David M. Walker, President and CEO of the Peter G. Peterson Foundation and former Comptroller General of the United States, addressed the meeting on the subject of the delivery, affordability and sustainability of health care and retirement income security in a global context. He opened his presentation by remarking that, while the United States was number one in many things, it was not number one in all things and that he was going to talk about “where we’re the laggards”. His premise was that the United States was a great country, one of the greatest even, but that it faced a large and growing problem, one of sustainability in its practices – its fiscal policy, social insurance, health care, tax system, approach to immigration, environmental attitude, etc. Each of these represented a situation in which the United States was going to have to change, and sooner rather than later, because of the compounding effect. Compound interest worked for you if you were an investor but worked against you if you were a debtor, he commented. He said that when he considered an issue he put a face to it – his three grandchildren. He believed that the Federal Government was on a ‘burning platform’ and that the status quo way of doing business was unacceptable for a number of reasons, including:

- past fiscal trends and significant long-range challenges,
- selected trends and challenges having no boundaries,
- additional resource demands due to Iraq, Afghanistan, incremental homeland security needs and recent natural disasters in the United States,
- numerous government performance/accountability and high-risk challenges,
- outdated federal organizational structures, policies and practices, and
- rising public expectations for demonstrable results and enhanced responsiveness.

The composition of federal spending had changed quite dramatically between 1967 and 2007, with defence spending representing 45% in 1967 and just 20% in 2007 (see FIGURE 1 opposite). Looking at federal spending on mandatory and discretionary programmes, he noted that in 1967 discretionary spending had represented 68%, down to 44% in 1987 and 38% in 2007 (see FIGURE 2 opposite). Spending on Medicare and Medicaid he described as writing a blank cheque. “People thought Rome was too big to fall,” he commented. “They were wrong.” Moving on to the composition of federal receipts by source, he said that there had been less reliance on corporate income tax because companies did not have duties of loyalty to countries but to shareholders: they could and would move location. Many global US companies now generated more income overseas than in the United States. Looking at total taxes, he focused on deficits and net operating costs for 2006 and 2007. There were at least three ways of calculating the US budget deficit and the best of the three made it US\$410 billion. When the baby boomers retired it would become worse: demography was destiny. He described the United States as “the only country on earth that funds its long-term promises with its own debt”, with bonds that were guaranteed as to both principal and interest. He knew that Norway had trust funds backed by real investments: part of its oil revenues were being set aside to meet the future obligations for baby boomers when they

became economically inactive. US federal trust funds were more like “trust-the-government funds”.

Considering surpluses or deficits as a share of gross national or gross domestic product, he observed that the United States had not intended to have large deficits except in times of war or national emergency. “We were creditors in the past,” he remarked, but starting in the 1970s the USA had become “addicted to debt and conspicuous consumption”. In recent years wars had not made the only difference. For only four years of the past 30 had the federal budget been in surplus. The USA had an almost 0% savings rate. Corporate retained earnings were the only aspect that brought it above 0%. “We’re eating our seed corn and mortgaging our future,” he concluded. In 1956, at the time of the Suez Crisis, the United States had held large amounts of UK debt. When Britain had challenged Nasser’s attempts to take over the Suez Canal, the President of the United States had called the Prime Minister and advised him to rethink his position. “They were out within two weeks!” he exclaimed. To his regret, Americans did not study history. “The problem is our off-balance sheet obligations, including the trust fund,” he commented. The United States had made many promises to retirees on pensions and health funds. Currently scheduled payroll taxes and premiums would not be able to cover them. A discount of the present values to fund the Medicare and Social Security promises alone were over US\$40 trillion and the total federal financial hole was apparently US\$53 trillion as of 30 September 2007. “How much have we?” he asked. “Zip – we need at least US\$2 billion more each year even if we balance the books, that is 90% of the net worth of every American. All they have is their citizenship.” In his view, there was a need for periodic fiscal sustainability reports. In 2001 everything had looked good, though people were worried. Medicare, Medicaid and Social Security now consumed 18.5% of the economy. This was the power of compounding. Growth would need to be in double figures to address the US\$53 trillion federal financial hole. “We’re going to have to make tough choices,” he proclaimed. “We need to develop a US solution. This country will never tax at levels that Europe does.” With federal taxes at 18.5% now, he believed higher taxation would come but not at the levels of 30-32%, or 40-42% overall.

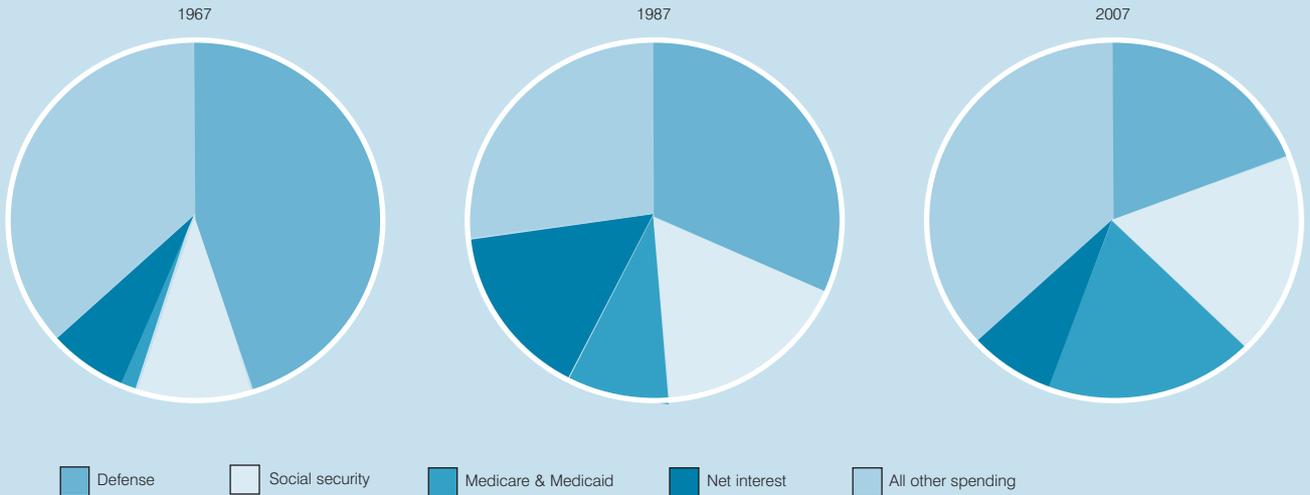
As for the ‘sub-prime crisis’, Mr Walker had found that people were more focused on this than on the larger fiscal challenge. He identified some disturbing parallels between the two:

- a ‘disconnect’ between those who benefited from current policies and practices and those who bore the risk and paid the price,
- a lack of transparency,
- the importance of both confidence and cash flow,
- the limitations of credit ratings, and
- inadequate supervision, with no action being taken until a crisis hit.

“If the United States feels it, other countries will,” he warned. The financial challenges facing the USA and other developed nations would have an adverse effect on developing countries. Both the country’s entitlement programmes and tax system would have to be reformed. In 1789 government had represented a mere 2% of the economy; now it was 20% and was set to grow dramatically. The Government had over-promised and over-extended itself.

FIGURE 1

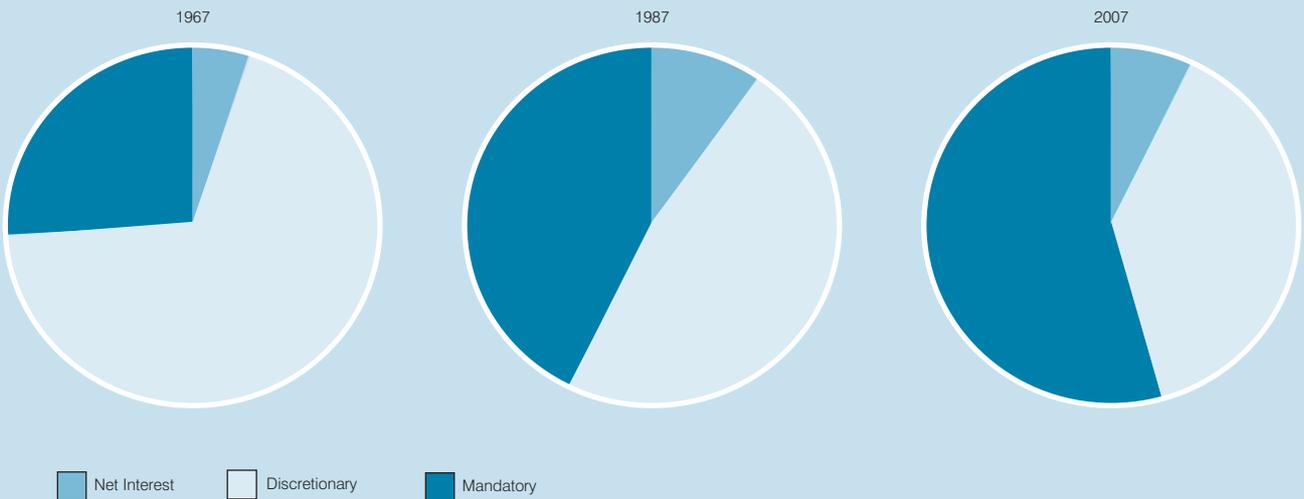
Composition of Federal Spending



Source: GAO analysis of Office of Management and Budget Data

FIGURE 2

Federal Spending for Mandatory and Discretionary Programs



Source: GAO analysis of Office of Management and Budget Data

At this point, Mr Walker invited the audience to speculate on where the United States ranked, compared with most other OECD\* countries, on select key economic, social and environmental indicators. He then revealed that, while it might be the only superpower, on average, the USA ranked 16 out of 28 on:

- population/migration,
- macroeconomic trends,
- prices,
- energy,
- the labour market,
- science and technology,
- the environment,
- education,
- public finance,

- quality of life, and
- economic globalization.

He described the United States as growing because of innovation and yet “health care is what we are betting the ranch on”. The USA spent twice as much as other countries per capita, yet it had below-average results. For cultural and political reasons “we won’t go for a single provider system”. In his view, it was imperative to have a budget with automatic stabilizers built in, as in Sweden, to “stop going over the cliff”. The taxpayer should not be put in the position of subsidizing everyone, as was now the case with Medicare.

\* Organisation for Economic Co-operation and Development

Mr Walker believed that US politicians were out of touch and out of control. They were representatives who were not representative of the real world. Many suffered from myopia, tunnel vision and self-centredness. Of the four national deficits (namely the budget, the balance of payments / trade, savings and leadership), the biggest deficit facing the United States was in leadership. In his view, the key leadership attributes needed for these challenging and changing times were:

- courage,
- integrity,
- creativity,
- partnership, and
- stewardship.

The business and professional community, young Americans and the media were all needed to meet six unsustainable challenges, as follows:

- deficits (budget, savings and balance of payments),
- entitlement programmes,
- ballooning health-care costs,
- gaps in the education system, e.g. the financial and literacy crisis,
- excessive energy consumption, and
- the proliferation of nuclear and biological warfare materials.

Inviting questions/comments from the audience, *Mr Ken Buffin*, who had masterminded the programme, said that Mr Walker had succeeded in addressing the theme of the conference. The beltway around Washington, D.C., delineated where the outside world ended and the Alice in Wonderland world began. He drew a parallel with the UK 60 years ago – a bankrupt nation in which citizens felt that the time for change had come. Health, education, etc. – could the country afford it? Prime Minister Clement Attlee had believed that somehow the productivity *would* come, so that the country could have these services. Mr Walker's response was that basic and essential health care could be afforded, but not the current 'Tower of Babel' system. Of course, it was necessary to define what 'basic and essential' meant. He hazarded that universal coverage might not include such items as inoculations and other preventive measures, protection against ruin from a catastrophic accident or illness, and the opportunity for individuals to buy supplementary cover at group rates to provide greater choice. He said it was worth recalling that the first rule of holes was that, when you were in one, you should stop digging.

*Mr Doug Andrews* from Canada believed that there was a "5% of GDP solution" available to the United States if it could learn from other developed countries and get the right mix of public and private financing and administration. Mr Walker reiterated that a cap on spending was needed, together with more personal responsibility.

*Mr Steve Goss* from the United States, picking up on the 2001 projection of fiscal outcomes, observed that this had been fiscally sustainable at the time. In 2008 Medicare had become massively out of control. This was because of Medicare Part D, which had been introduced subsequently and was where "we shouldn't keep digging". Mr Walker said that it was the difference between 20.5% and 18.5% that was worth noting.

"2% of the economy compounded is a lot of money." Between 2001 and 2008 there had been 9/11, the 'War on Terror', Iraq, Afghanistan and the big spending of the current Federal Government. Medicare and Medicaid were the problem, not Social Security.

*Mr Brent Walker* from Australia began by commenting that reaching solutions was not easy. He had learned that, to be effective, agents of change were necessary. "Policy wonks aren't good," he commented. He believed it was important to identify who in government on both sides would be a good agent of change. In an Australian context, Mr Walker had found that a particular 'Radio Shock Jock' had turned out to be a good agent of change. He had influenced both the Australian Treasurer and the Prime Minister. Mr David Walker's response was to say that the 'big tent' theory was unlikely to work in the United States because its political system was not parliamentary. Instead, the US President had to be one of the change agents – there was just one chief executive in the United States. By contrast, no one was in charge of Congress: there were political factions. Secondly, a few change agents in Congress who were willing to lead were required. Thirdly, young people needed to become more informed and involved. Fourthly, the media – both old style and new – should be used. Fifthly, the business community and professionals were needed and, finally, stakeholders (like the AARP\*) should be involved.

Professor Bolnick said that he was a great believer in universal health care but there were two technical issues to address: why were US costs higher than in the rest of the world and what was the validity of the cost projections? In his response, Mr David Walker said that the reason why costs were higher was that "we pay our providers a lot more and there is a higher administrative cost". In addition, there was a proliferation of technology. People needed incentives to behave well. There was therefore a call for transparency as to both cost and quality and a need for more accountability. His view was that the United States scored zero on all three counts. A small difference could make a big difference with compounding. The Congressional Budget Office was of the opinion that the projections were too low. He believed a public debate should take place on how much broad-based health-care coverage was needed. It was always easy to spend someone else's money.

*Mr James Davies*, who was British but working in the United States, challenged Mr Walker to aim higher in the proposed move towards a universal health-care system and to test the extent of individuals' willingness to pay higher taxes. Mr Walker's response was that Americans were willing to pay higher taxes but that they did not trust 'D.C.' and, in his view, they were right not to. They should demand tough budget controls. What was needed was universal health-care coverage that was affordable and sustainable. Comprehensive and integrated solutions had yet to be developed. There would be some pain because tax burdens had to be kept as low as possible if the United States was to compete with other parts of the world.

*Mr Adrian Baskir* from South Africa shared his country's experience. "We have many poverty-stricken people" so, in the health-care reform, primary health care had been introduced, available to every citizen from a State hospital – no fancy frills. In South Africa there was also a Medical Aid industry which

\* formerly the American Association for Retired Persons

provided a second tier of universal care, with a prescribed minimum. There was therefore an incentive for wealthy individuals to go to the private system. The carrot worked better than the stick here.

## WORKSHOPS

Eight workshops were provided on an excellent range of topics – from pension reform to critical illness.

### EU: Public–Private Health-Care System Partnerships

Three speakers shared the workshop covering public–private health-care system partnerships in EU countries: Professor Bolnick of the United States, Mr Aongus Loughlin from the Republic of Ireland and Mr Jeroen Breen from the Netherlands.

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Professor Bolnick got the ball rolling by outlining the goals and objectives of health-care systems. Countries basically had three goals, namely cost, quality and access, but within these goals there were individual aspects. As far as cost was concerned, the system had to be:

- equitable (fair financing),
- affordable (with cost being no barrier to access), and
- sufficient (with adequate funding for health-care resources).

As to quality, the system had to be:

- effective (achieving attainable population health outcomes),
- efficient (maximizing the use of scarce resources),
- uniform (no relatively disadvantaged groups), and
- autonomous (medical decisions being made by the patient and his/her physician).

Access had to be socially acceptable (responsive to citizens' 'wants' and/or 'needs') and universal (for all citizens). There was, of course, a difference between what people wanted and what they needed; and they needed less than they wanted. Unfortunately, he pointed out, there was inherent conflict among the three goals of:

- universal access,
- high quality, and
- cost effectiveness.

As a result, it was really only realistic to choose two out of the three. Universal access meant the need for more money and if quality was wanted that meant citizens having to make do with less (fewer services or waiting lists). Health-care systems suffered from perpetual stress. The trick was to create and manage a balanced system that addressed the different needs, wants, interests and perceptions of the various stakeholders. He noted that there were three issues that were constantly debated:

- feasibility,
- sustainability, and
- satisfaction.

By feasibility, he meant the achievement of simultaneous balance between cost–quality–access goals and objectives; by

sustainability, the provision of the financial and health-care resources needed to maintain a balance between cost–quality–access goals and objectives in the long term; and, by satisfaction, the fulfilment of stakeholders' expectations as health care and health-care systems evolved. Different cultures saw these differently, he commented. However, if costs went up faster than GDP over 10-20 years, there was a problem maintaining balance. Considering the four structural options (see FIGURE 3 overleaf), no country in the world had a system as extreme as the No. 1 option, i.e. pure private health insurance. The US system looked much like the No. 2 option and the Dutch system fitted it more now than in the past, i.e. a mixed system with a private insurance base. Most European countries used the No. 3 model, i.e. a mixed system with a public insurance base, with the Voluntary Health Insurance (VHI) component growing. The No. 4 option consisted of a purely public health insurance system. He remarked, "you won't find private health insurance with universal access" (see FIGURE 4 overleaf). Either care was managed, in the 'managed care' sense, or cost barriers were relatively uncontrollable. Private health insurance was 'wants orientated' to satisfy consumer demand, while public programmes tended to be 'needs orientated' in order to control costs. If a mixed system had costs going up by more than GDP, it had a range of mechanisms by which to control them. There were more trade-off possibilities (highlighted in FIGURE 5 on page 31). The European experience showed that a 'public only' system did not work either. There were unpopular constraints, political funding problems and dissatisfaction with the constraints.

Professor Bolnick's conclusions were that mixed health-care systems could allow wants to be satisfied by having them catered for by the private system while the needs were met by the public system. He viewed private systems as a "safety valve" that allowed citizens, usually those who were better off financially, to receive care that the public system could not afford. A mixed system with either a public base or a private base (the latter more likely to occur in developing countries) left the public system freer to treat those on modest incomes and the poor.

\* \* \*

Mr Loughlin described the Irish health-care system, which was two tier, with plenty of government support. It was not without its faults but had many advantages. He would show how the two tiers interacted.

The Republic of Ireland had a very small population – 4.2 million – and all citizens had access to health care. The population under 70 was divided into two categories. Category I constituted those who were means tested and, depending on status and income, they were granted a 'medical card' that provided free hospital care, out-patient treatment, GP\* services and prescription drugs. Category II was made up of people who were not entitled to a medical card and who paid a charge of €66<sup>†</sup> per day for a maximum of 10 days in hospital, a €66 accident and emergency (A&E) charge, a charge for GP visits and up to €85 per month for prescription drugs, although the State picked up any amount above. All citizens over the age of 70 were eligible for free health care regardless of income, so in effect became Category I.

\* General Practitioner  
<sup>†</sup> €1 = £0.79; €1 = US\$1.42 as at 12 September 2008

FIGURE 3

The Four Structural Options

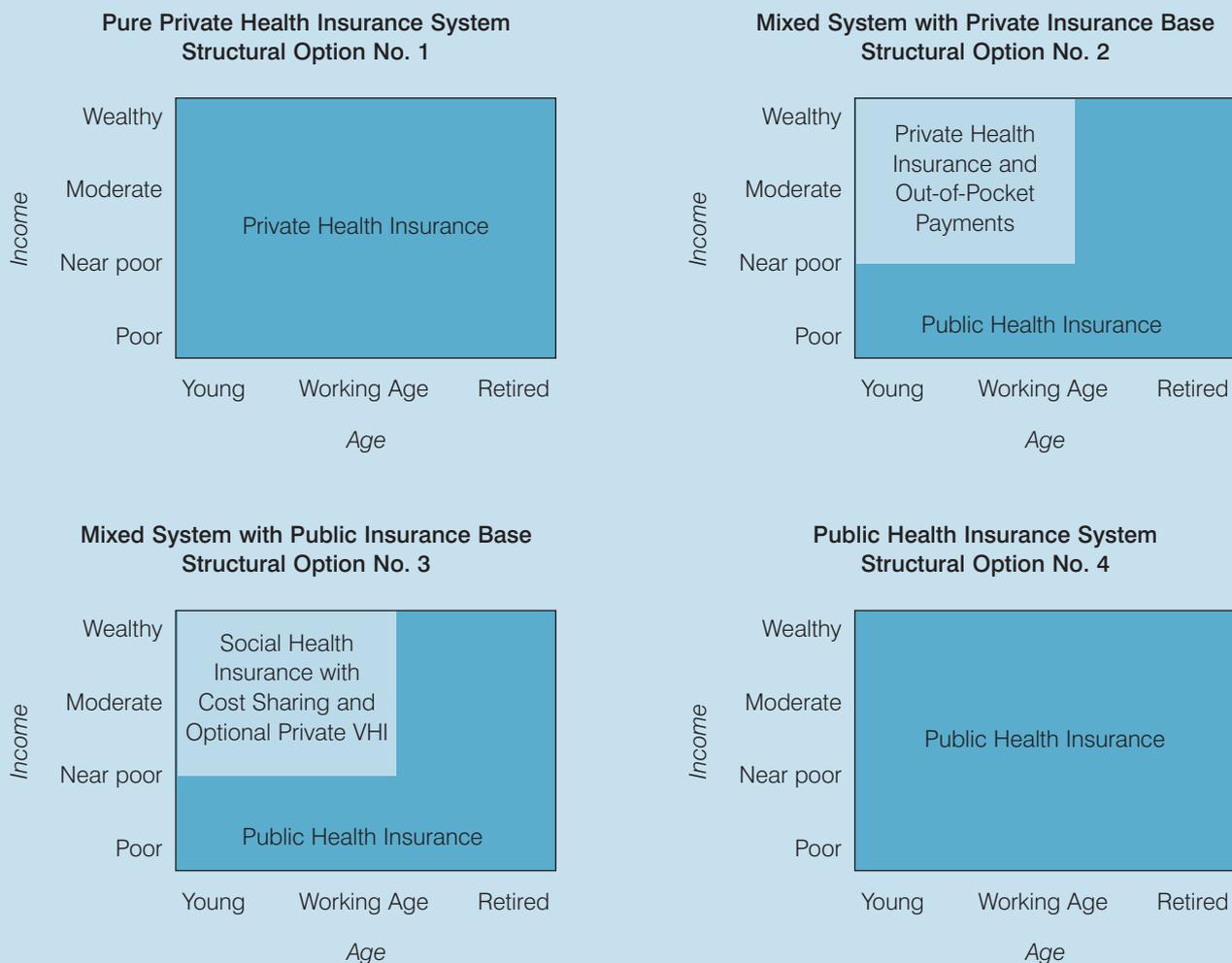


FIGURE 4

Health-care Systems' Performance

Structural Option	Health-care Systems' Goals		
	Access	Cost	Quality
Private Health Insurance	Universal Access Not Possible	Relatively Uncontrollable • Managed care or cost barriers	Coverage of Healthcare "Needs" and "Wants"
Mixed System with Private Base	Possible with Good Stewardship	Limited Public Sector Program Relatively Controllable	Public Sector Covers "Needs" of Underserved
Mixed System with Public Base	Possible with Good Stewardship	Public Sector May "Shift" Costs to Private Sector	Private Sector Covers Additional "Wants" of Affluent
Public Health Insurance	Universal Access Achieved	Relatively Controllable Through Budget Constraints	"Wants" Constrained, "Needs" Covered

FIGURE 5

Health-care Systems' Perpetual Stresses

Structural Option	Perpetual Stresses			Trade-offs
	Feasibility	Sustainability	Satisfaction	
Private Health Insurance	<ul style="list-style-type: none"> <li>• Universal Coverage Not Possible</li> <li>• Unconstrained Growth and Costs</li> </ul>	The Excluded Grow as Unconstrained System Becomes Increasingly Expensive	Disadvantaged Generally Excluded	
Mixed System with Private Base	Balance Achievable in Carefully Designed System	Private Health Insurance May Become Too Expensive	Complicated Structure	
Mixed System with Public Base	Balance Achievable in Carefully Designed System	Funding Problems Result in Public Sector Constraints	Dissatisfaction with Constraints, Waiting Lists and Out-of-Pocket Spending	
Public Health Insurance	Unpopular Constraints	Political Funding Problems/Constraints	Dissatisfaction with Constraints	

Mr Loughlin said that the public system was financed through general taxation, for which the basic rate was 20%, with those who were more highly paid being taxed at 41%.

In providing the background to the Irish private medical insurance (PMI) system, he noted that it had been established in 1957 with the passing of the Voluntary Health Insurance Act, the intention of which had been to encourage the 15% of the population who were not entitled to free treatment at the time to purchase PMI. This had been embraced by the Irish population. The Government had originally looked at the Australian model. Free universal access to public hospital beds for all citizens had been introduced in 1991. Nonetheless, over 52% of the Irish population was still covered by PMI (compared with approximately 12% in the UK).

There were currently three providers:

- Quinn Healthcare (formerly BUPA Ireland),
- VHI, and
- VIVAS Health.

However, as it was voluntary, those people in Category I tended not to buy PMI, although some did for speed of access. The cornerstones of the system were:

- community rating (the same premium was charged for a given level of cover regardless of age, sex or current health status),
- open enrolment (insurers could not refuse cover to anyone regardless of age, although there was a 26 to 52 week waiting period plus a five to 10-year pre-existing condition exemption allowed), and
- lifetime cover (once insured no one could be refused a renewal unless there had been an attempt to defraud an insurer or a premium had been missed for over 13 weeks).

Mr Loughlin observed that all PMI contracts had to provide a specified minimum level of benefits which broadly covered the full cost of all medically necessary treatment in a public hospital that was curative in nature, including consultants' fees. Risk equalization (between the carriers), which supported the community-rating principle, had not yet been introduced because of a number of court cases but he was confident that it would come in. The community-rating impact was that people under 50 were paying more than they needed to in order for the over-fifties to be able to afford PMI.

In 2003 the Health Insurance Authority (HIA) had been established as gatekeeper and its responsibilities included:

- licensing private health insurers;
- monitoring the health insurance market in general;
- acting as adviser to the Minister for Health & Children;
- managing and administering the risk equalization scheme; and
- providing information and assistance to consumers of PMI in the Republic of Ireland.

The interaction between the public and private systems was as follows:

*Public to private.* Charges for private beds in public hospitals did not reflect the 'full economic cost'. There was tax relief on health insurance premiums and on medical expenses.

*Private to public.* Private patients forwent public entitlement. Public hospitals received income from private beds. The best consultants were attracted to public hospitals.

He explained that at present the charge for a private bed in a public hospital was about €500-800 per day. If the patient had no insurance, he/she would be able to obtain tax relief on the payment to a hospital.

Mr Loughlin believed that the Irish approach worked because it:

- helped to ensure that medical and other professional and technical staff of the highest calibre continued to be attracted into and retained in the public system;
- promoted a more efficient use of consultants' time by having public and private patients on one site;
- facilitated the active linkage between the two delivery systems in terms of the dissemination of current medical knowledge and best practice; and
- had a National Treatment Purchase Fund, which had been set up to assist those on waiting lists to have necessary treatment carried out privately or abroad (after three months of waiting).

The Irish State encouraged PMI by giving everyone who took out a policy 20% tax relief on the full cost of the premium. In addition, even if an employer paid the cost of PMI for employees, the employee *still* received 20% tax relief and the employer could claim corporation tax relief on the same premium.

Since A&E services were primarily provided by the public hospital system, the public/private mix enabled patients to avail themselves of private health care when admitted to a public hospital on an emergency basis. This provided an additional income stream for the public hospital system, although the charge was not the full economic cost.

In rounding off his talk by covering current and future challenges, Mr Loughlin described waiting lists in the public system as "an issue". In March 2008, 42,774 patients had been on inpatient waiting lists and the perception was that PMI helped patients to jump the queue. The Irish Government was pushing co-located hospitals, i.e. private facilities on a public-hospital site.

He commented that costs had gone up by 55% in three years. The cost-increase figure for 10 years was 170%, so medical inflation was fairly entrenched. The number of people over 65 would triple between now and 2050 putting pressure on costs. Even now, the over-65s accounted for half the total bed day usage.

There was a greater focus in PMI on day-care and out-patient treatment, with vHI registering a 205% increase in day-care claims between 1996 and 2006. In addition, private A&E centres were now opening. There was also a greater focus on preventive care in PMI, with most plans now including screening cover, etc. There were said to be 140,000 on the public out-patient waiting list.

Lastly, Mr Loughlin noted that there was increasing pressure to introduce Social Health Insurance, which would provide free GP care for all, equal hospital treatment according to clinical need and a restoration of transparency and trust.

\*                    \*                    \*

Now it was Mr Breen's turn to describe the public-private health-care system in his country – the Netherlands – which

had experienced a far-reaching change in legislation in 2006. He gave us a few useful figures to provide a context for his remarks. The population had stood at 16,353,972 in 2007 and the country's surface area was 41,528 square kilometres, making the population density 394.3 per square kilometre, ranking the Netherlands 26th out of 231 countries for density. "It's crowded!" he commented.

Before 1 January 2006 the Dutch health-care system had been two tier, i.e. there had been both public and private medical care insurance. He explained that, within this, there had been three components, as follows:

- non-insurable risks had fallen under the public social security system (*AWBZ*<sup>\*</sup>);
- there had been a dual system of public (*ZFW*<sup>†</sup>) curative treatment for those earning less than €33,000 and for everyone over age 65, with those earning above that figure having to buy PMI; and
- supplementary care (for extra dental, optical, etc. treatment) was privately provided.

In 2003 total medical costs had amounted to €58 billion, 35% of which represented *AWBZ* and 65% the rest – so what was the *real* problem? It could be found in population projections between now and 2050. The 0-20 age group would decrease and then stabilize; the 20-65 age group would decrease dramatically and then stabilize; and the over-65 age group would increase equally dramatically. As a result, costs would have grown very, very strongly, hence the reform.

The health-care system was inefficient as no real free market existed. He confessed that it still worked on budgets, not on performance, where the attitude tended to be, why spend 85 when you have 100? However, there was a wish to try and stimulate free markets. The system was still very new. It operated in the following ways:

- Basic medical insurance (the *basisverzekering*) was compulsory for all residents in the Netherlands.
- It was provided through insurance companies but operated within the overall public-health framework.
- The cover provided under the 'basic' insurance policy had been determined by the Government which reimbursed most of the cost of the main parts of people's healthcare needs.
- People could choose to supplement the basic policy to cover those medical expenses that were not reimbursed.
- While the Government had indicated an average cost across the Dutch population of providing the standard package at around €1,100 p.a., insurers could set their own premiums. However, they were not allowed to apply medical selection, so no one could be excluded.
- All applicants had to be charged the same premium regardless of age, sex, health status, etc.

\* *Algemene Wet Bijzondere Ziektekosten*  
† *Ziekenfondswet*

Mr Breen observed that, although it was possible to change insurer once a year, he did not believe that people would want to change once they had signed up as long as the service was good. Premiums had increased by 15-20% since 2006 because they had been set too low initially.

He described this new market as being challenging for insurers, what with compulsory acceptance and no premium differentiation allowed. He said that there would be risk equalization between all the insurance companies but linked to State prices. This would compensate the insurers for the less healthy risks in their portfolios, the Government operating a risk and claims settlement system. However, there was a delay here with neither 2006 nor 2007 yet settled.

In looking to the future, Mr Breen observed that, when creating a free market in an area in which there had not been one in the recent past, there was a need to stimulate free thinking and acting. He believed it was possible to make use of techniques found in other branches of insurance, such as retentions (borrowed from motor insurance) and capital funding versus pay-as-you-go techniques (as found in the retirement area). It was important to rid the system of budgeting methods, which meant that hospitals were not competing with each other, and use methods based on performance instead. However, he did issue a caveat that, while there was a need to increase the free-market possibilities in hospitals, it should not be forgotten that the social component in the health-care area – solidarity – must be preserved.

### **Pension Reform and Solutions to Challenges**

Mr Chris Daykin from the UK shared a session on pension reform and solutions to the challenges of providing old-age economic security with Mr Rod Marshall, also from the UK.

\* \* \*

Mr Daykin looked at the global position. He observed that longevity was one of the six drivers of pension reform. Another key issue for governments, the International Labour Office and The World Bank was pension costs, which were becoming unsustainable in the long run in their structure and financing. However, it was not just sustainability that posed a problem; most countries had real problems of coverage. Social security was not delivering to anything like 100% of the population. It could be as low as 5-10%, focused on the formal sector. Retirement income could also be inadequate. Other aspects on which actuaries and economists focused were incentive structures to encourage people to keep working and then retire at the right time. To actuaries, intergenerational transfers were acceptable but less so to economists. However, the maturing of schemes could become a problem, as governments became used to the cheapness of the early years. As the schemes matured and the population aged, cost became a more critical issue. He said there was a big debate underway on whether it was possible to raise retirement ages. It depended on employment prospects. In raising the retirement age the potential for a longer period of contributions increased. The way to approach it was to widen access to social security so that more people became recipients.

Mr Daykin commented that 10 years ago when The World Bank had published its book, *Averting the Old Age Crisis*, defined contribution schemes had been considered 'good news'. However, they only provided a partial answer. The individual became more and more exposed to risk. In addition, there was

volatility of outcome, with rates being variable from year to year depending on when the individual retired. With defined contribution schemes there was a personal longevity risk. By contrast, defined benefit schemes often encouraged people to retire early because the costs of doing so were not explicit. Pension reform was usually a multi-disciplinary affair involving politicians, agents of change, policy-makers, economists, actuaries, etc. Defined contribution systems were improving in efficiency and transparency but their transaction costs were still high.

In Japan and Canada defined benefit social security was becoming too expensive and so individual personal accounts had been introduced. Furthermore, in Sweden and Italy notional defined contribution schemes had been pioneered. The basic idea could be found in the French system, he explained, in *répartition par points*. However, The World Bank didn't favour that version of the system because of a lack of transparency. The move from earnings-related social security to a flat-rate system was more of a poverty-relief effort than in the interests of income replacement. A demogrant (or citizen's pension) was expensive in terms of the exchequer but it was a way of improving coverage. The World Bank now talked of the demogrant as Pillar Zero (a non-contributory scheme providing a minimum level of pension). Governments were starting to think about targeting benefits on people who needed them more. This had been true of Australia for many years and was now true of the UK. Individual accounts and a smoothing of social security schemes had become a significant element in funding (Canada, the Republic of Ireland and Norway were examples here of having some form of national buffer fund), i.e. prefunding part of social security. One of the key reforms had taken place in Chile in 1981 – it had been held up as a great example of radical reform, involving the accumulation of defined contribution amounts with an underlying guaranteed minimum pension provided by the government. However, there had been problems with the adequacy of coverage of the system and Chile was now starting a further process of reform and planned to introduce a Pillar Zero – a citizenship pension. There had also been discussion on how to create better competition. Transparency and efficiency had improved and there was now an increasing focus on the payout period – the decumulation phase. A proper mechanism was required to protect against longevity risk.

Mr Daykin noted that only a few countries had bitten the bullet on retirement age. The United States was raising it from 65 to 67 by 2022 but still allowed people to retire at 62. The United Kingdom was moving women's retirement age from 60 to 65 (the same as men's) and then both sexes up to 68 by 2046. Some other countries had moved in the wrong direction in the 1970s, 1980s and 1990s because they had thought it would help unemployment, although this had not turned out to be effective.

The Chilean reform had been mimicked in Latin America (for example, in Mexico in 1997) and in Central and Eastern Europe (for example, Poland), he continued. However, none of these reforms had been as radical as Chile's. Now that the system had been in place for a number of years countries were having to address in what way the money should be paid out at the end of working life – annuities and/or strictly controlled programmed withdrawals. He remarked that coverage in Chile had not worked out as well as had been hoped. Only those in the formal sector had been properly covered. More than were originally expected would qualify for the government guarantee. In Mexico the contribution rate was only 6.5% so it was expected that the Government would have

to pay for many minimum pensions. Disability and survivors' pensions were still the responsibility of the Government in Mexico. Mr Daykin observed that individual accounts had been important for new entrants but recognition bonds had been issued for previous rights. Coverage and transaction cost problems tended to persist as did decumulation issues. Sales people could be adept at persuading people to change provider, thereby raising costs. The payout phase was now the focus of attention for the World Bank. Uncertainty on life expectancy was a further problem in countries without developed annuity markets. There was a need for very long-dated bonds to match the liabilities. People often preferred to have the money themselves rather than rely on an insurance company, which they viewed as making profits out of them rather than simply risk sharing.

There were, of course, varying degrees of sharing risk. Notional defined contribution had been introduced in Sweden as a mechanism for reforming the defined benefit scheme, he explained. This had been done as a step change so that it wouldn't be as apparent that the benefits were being changed. Contributions accumulated in a personal account. There was notional annuitization. Swedes were incentivized in this way to work and "retire at the right time". The transition from the old defined benefit State scheme to the new notional defined contribution scheme was fairly rapid. A revaluing of individual accounts in accordance with average wage movements took place. There were credits for periods of sickness and other absence. The annuity responded to improving longevity and there was an automatic balancing mechanism based on 'actuarial accounting' (which he described as very crude) to replace long-term projections. Funded individual accounts had been introduced with contributions of just 2.5% of earnings in Sweden. There were low administrative costs and a choice of 700 investment funds (with default arrangements if no funds were selected). Many contributors fell into the default fund, yet it was considered to be a very successful reform.

This was not quite the end of the story, Mr Daykin continued. While the primary goals of a pension system had been expressed by The World Bank as "to provide adequate, affordable, sustainable and robust old-age income", its secondary goals were "to create developmental effects by minimizing negative impacts and leveraging on positive impacts.

To interpret, the development effects were in the economy and the negative and positive effects were in the areas of fiscal sustainability and a market economy. The World Bank's 1994 framework, he reminded the audience, had consisted of the following three pillars:

- mandatory unfunded public defined benefit social security (Pillar I),
- mandatory funded and privately managed defined contribution (Pillar II), and
- a voluntary savings retirement plan or occupational pension plans (Pillar III).

The latest World Bank framework, which dated from 2004, comprised five pillars, as follows:

- a non-contributory scheme providing a minimal level of protection, sometimes called a demogrant (Pillar Zero),

- mandatory unfunded publicly managed defined benefit or notional defined contribution providing some longevity insurance (Pillar I),
- mandatory funded and privately managed defined contribution or defined benefit (Pillar II),
- voluntary savings plans which were regulated and privately managed (Pillar III), and
- informal intergenerational financial and non-financial support, i.e. family (Pillar IV).

Mr Daykin believed that many of these goals could have been achieved with defined benefit but they had been conceived in an era with a different focus. Defined benefit accumulated as a lump sum and then annuitized could achieve the same end as funded individual accounts or notional defined contribution. The most serious issue was how to share the longevity risk, given that defined contribution was still the "preferred route of pension reform". A critical factor was how to encourage later retirement. The economics were such that people would have to work longer: 40 years in work and then 40 in retirement simply wasn't an option. The Finnish, German and Swedish systems all had their own mechanisms.

In rounding off his remarks, Mr Daykin noted that there was a wide range of solutions, each country with a different approach having started from a different position. Defined contribution might be favoured in some quarters for its incentive structure but it lacked the basic characteristics of protection. Unless it came in a with-profits form or with a strong underpin, defined contribution exposed members to investment risk as well as longevity risk. He was therefore of the view that a minimum pension or defined benefit underpin was desirable, although care should be taken to avoid this having a dominant effect.

Defined benefit was undergoing a rethink, i.e. mostly moving to career-average revalued earnings, which could be equated mathematically with defined contribution or certainly to notional defined contribution, which was really a defined benefit structure dressed up as defined contribution. A focus on the fund at retirement facilitated longevity solutions. Indexing retirement age to improving longevity was also a possibility. Cash balance plans were another DB/DC hybrid that shouldn't be forgotten.

Finally, rooting out inefficiencies and improving retirement benefits could be accomplished by taking the following steps:

- introducing compulsory or near-compulsory defined contribution plans to achieve full coverage;
- collecting contributions centrally;
- avoiding insurance wrappers;
- controlling commission and charges;
- providing choice, but not too much choice, of investment funds; and
- including a minimum income guarantee.

Care did need to be taken in the design, however, Mr Daykin emphasized. If a significant percentage of funds ended up in

the coffers of the financial services industry and in the pockets of salesmen, the aims of many reforms would have been defeated.

\* \* \*

Mr Marshall then described the pension reform position in the UK in some detail. He began by commenting that, since he had started working in pensions in 1983, there had not been a single year in which UK pensions hadn't experienced change of some description. As far as forthcoming changes to State Pension Age were concerned, these were already on the statute book. Another significant change was that from 2010 the number of qualifying years needed by UK citizens to receive a full basic State pension was being reduced to 30. In addition, basic State pension increases would start to be linked to earnings rather than prices and contribution conditions were being made easier.

Personal accounts were to be introduced, probably from April 2012, but none of the necessary legislation was yet on the statute book. The idea was that personal accounts were a low-cost method of saving for retirement and they were targeted at the estimated seven million people who were expected to have inadequate incomes in retirement. The groups that tended to be least interested were those at the younger ages and those on moderate to low incomes, together with part-timers and/or those working for small employers. A high proportion of lower earners in the UK were women. Individuals would be automatically enrolled into exempt work-based pension schemes or personal accounts if they were employees aged between 22 and State Pension Age and if their earnings were above £5,000 p.a. Contributions would be made on earnings between £5,000 and £33,500 p.a., this band being increased each year in line with national average earnings.

Mr Marshall said that employees would have to contribute at least 4% of earnings and employers a minimum of 3%, with another 1% coming from the Government in the form of tax relief. These contributions would be phased in over three years. He expressed a concern that some employers might level down, i.e. contribute less to pensions in the future. Automatic enrolment was considered to be an effective way of catering for people's tendency to fail to act when faced with difficult financial decisions. US research into 401(k) schemes had shown that automatic enrolment had the greatest effect among people on low incomes, members of ethnic minority groups and women.

Employees over State Pension Age could opt into personal accounts and receive an employer contribution on qualifying earnings as could those under the age of 22. Existing Group Personal Pension plans, which were contracts between an insurance company and the individuals covered, would not count as personal accounts under the proposals as currently drafted but this was expected to change by the time personal accounts came into effect.

He said that there were about three million self-employed people in the UK, of whom around two million were not saving for a private pension. The self-employed would be able to participate in personal accounts on a voluntary opt-in basis, choosing their own level of contributions, subject to a contribution ceiling that applied to everyone.

It was interesting to note that in defined contribution plans UK employers generally contributed approximately 6% and employees, 4%. Defined benefit, on average, cost 17%

of payroll, with employees contributing 5% in addition. The National Pension Saving Scheme (NPSS), in contrast, was envisaging only 8% in total. The cost of providing benefits was more or less the same, Mr Marshall remarked, whether defined benefit or defined contribution. He wondered whether a way could be found to save some of the good points of defined benefit. After all, with defined benefit plans it was companies that were generally exposed to market volatility and under defined contribution plans it was the members. A new defined benefit approach was therefore under development in the UK by which the risks and advantages could be shared. The NPSS left all the risks with members, but with a shared-risk scheme there was more certainty for employees and more control over costs for the employer. One approach that was attracting attention was career-average revalued earnings (CARE), by which the benefit was still based on salary and length of service but not final salary. It involved less risk for the employer because high flyers became less expensive in pension terms. However, the longevity risk was still borne by the employer and the investment risk probably was too. Cash balance schemes could also be considered shared-risk schemes. They produced a lump sum based on length of service and final salary, which was converted into a pension on annuity rates at the time of retirement. Here, the employer bore the risk before retirement and the member bore the investment and longevity risks at retirement. It lay somewhere between defined benefit and defined contribution.

The Association of Consulting Actuaries (ACA) in the UK was proposing a 'third way', one that would help to boost occupational pension provision and would address concerns about potential levelling down. He believed that the most creative benefit designs sat somewhere between defined benefit and defined contribution. He saw them as a more practical solution than changing the requirements for defined benefit schemes.

The main characteristics of the shared-risk schemes proposed by the ACA were that:

- they were based on average pensionable salary to retirement,
- targeted increases of revaluation for each year pre-retirement and increases for pensions in payment were only paid if finance was available,
- a funding reserve would be set up based on prudent assumptions under the new scheme-specific funding regime,
- each year's pension became defined benefit, subject to no past-service shortfall, and
- pension increases had to 'catch up' before future increases could be granted.

What was so attractive about this approach was that it incorporated the following safety-valves:

- revaluation and increases only occurred if corporate finances allowed;
- the employer had the ability to increase normal pension age;
- the possibility of reducing the rate of future accrual existed, bearing in mind that an eightieths defined benefit

plan was still better than a poor defined contribution plan; and

- there was the option of winding up the scheme without providing future revaluations or increases.

However, the risks were still by no means eliminated and so this approach was likely to be more attractive to medium-sized and large employers.

Mr Marshall concluded his presentation by noting that shared-risk schemes would be eligible for the Pension Protection Fund, which meant that:

- 100% of accrued (defined benefit) benefits would be covered;
- the levy would take this into account as well as the reduced risk; and
- levies would have to be held separately from the defined benefit scheme levies.

Shared-risk schemes would not be contracted out but they would exempt employers from the NPSS. However, these were as yet only proposals.

### **DEVELOPING WORLD WELL REPRESENTED**

The actuarial profession around the world should feel proud that such an event as the IACA, PBSS and IAAHS Joint Colloquium, as described here, can be staged in 2008. The pressures of the office and life generally limit everyone's time for the preparation of papers and attendance at a three-day event. The quality of the Colloquium, both the papers prepared in advance and the event itself, including the high level of participation, demonstrates how alive and involved the actuarial profession is today, far from the image of operating in a backwater. Actuaries are not considered to be good communicators; however, despite the fact that there were many countries represented at the meeting and a high proportion of the participants did not have English as their mother tongue, the level of debate was very high in both content and expression. What was particularly pleasing was that the developing world was featured to a greater extent than I can recall in past colloquia, a trend that I hope will continue.

**ISJ-B**