building value together

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The role of insurance companies

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“Managing Uncertainty Together”

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Contents

Insurance products to aid retirement

Why do we need insurance products at retirement?

- Current system in Malaysia at retirement:
  - EPF savings which is paid in lump sum at retirement
  - Does not address the long-term financial need at retirement
  - Most retirees spend all their EPF money within three years of retirement (the Star newspaper, 13 March 2010)

Types of insurance products for retirement

- Insurance companies have developed several products designed to provide financial aid at retirement.
- Some of the typical products that have been developed in the insurance industry globally for retirement purposes include:
  - Long term care products
  - Reverse mortgages
  - Annuities

Types of products
Long Term Care

Long term care is a variety of services that includes medical and non-medical care to those who have a chronic illness or disability.

Usually prevalent among the elderly.

Long term care needs can be met through sole government or private sector provision or a combination of both.

Long term care insurance differs from health insurance due to the age group it caters to, the duration of cover and the types of benefits available.

Types of products
Reverse mortgages

A special type of secured loan for people usually at post-retirement ages.

Allows **release of equity** from their homes.

Release of equity involves:

- Borrowing against or,
- Selling all or part of home

Loan is repaid once property is sold on death or permanent disability (moving into care).

Types of products
Annuities

- Life annuity is a form of longevity insurance. Uncertainty of future lifespan is transferred to the insurer and pooled together with other individuals.

- There are two possible phases for an annuity:

Accumulation / Deferred phase	• Policyholders' premiums accumulates money (account).
Distribution phase	• Insurance company makes income payments until the death of the annuitants.

Types of products
Annuities

Types

Annuity with the distribution phase only are known as **immediate annuity**, while **deferred annuity** have both accumulation and distribution phases.

Guaranteed annuity makes payment for a certain period even after death of annuitant.

Payments that are fixed (guaranteed) are known as **fixed annuity** while **variable annuities**' payment are dependent on investment performance (non-guaranteed).

Overview of the annuity experience in Malaysia

Annuity Malaysia Experience

The story so far

- The SAKK and SATK experience

Lessons learnt

- Creating awareness
- Government backing

Challenges

- Risk-based capital
- Asset- liabilities mismatch
- Poor reputation

Opportunities

- PRS
- Increasing affluent aging population
- Financial savvy society

Annuity Malaysia Experience – the story so far

SAKK and SATK was introduced by EPF in 2000, with over RM4 billion collected from over 200,000 EPF members in less than a year of its launch.

It is a single life deferred annuity with bonus (projected 4% p.a. guaranteed crediting rate and 2% reversionary compounding bonus).

Tax incentives were in place.

Over 30,000 agents were involved.

However objections were made against the scheme:

-Companies profiting excessively.

-Bad deal for EPF members that bought it.

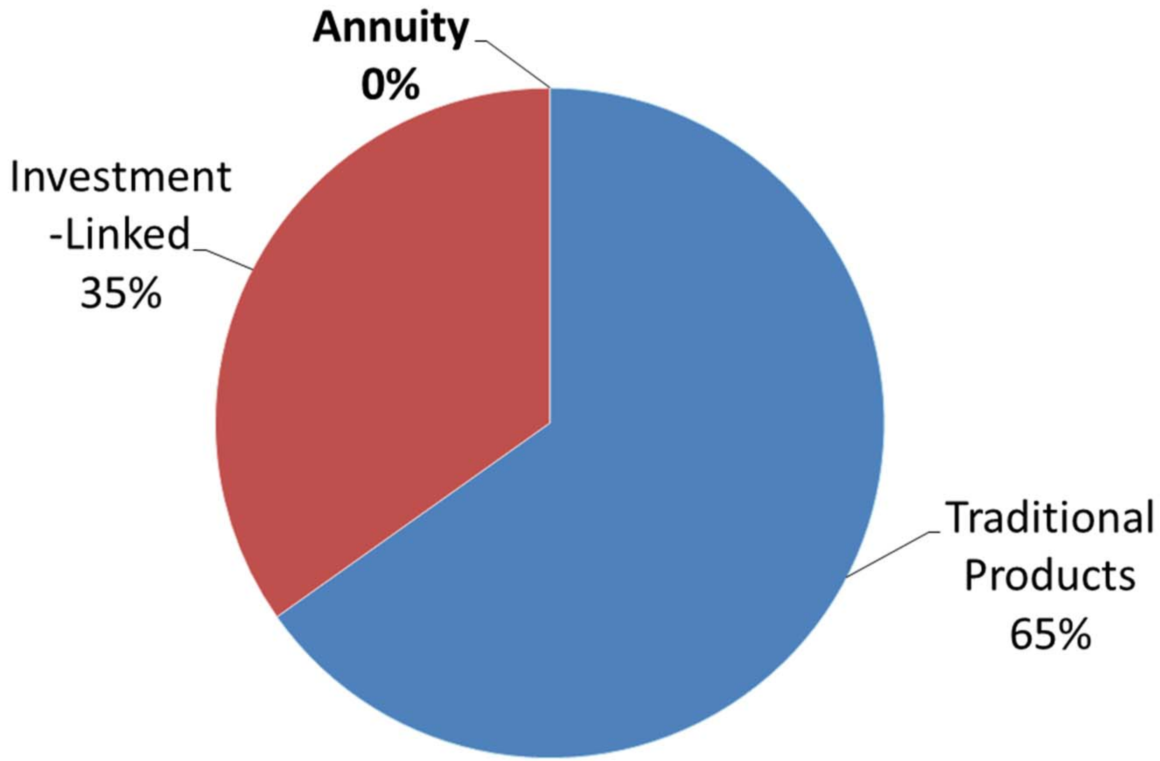
-Agent mis-selling.

The product was also misunderstood, which finally led to its suspension by the Prime Minister.

Source : OECD data, Pension Design and Marketing, The Annuity Malaysia Experience. – by Zainal Abidin Mohd. Kassim, FIA.

New business annuities in 2011 (excludes SATK)

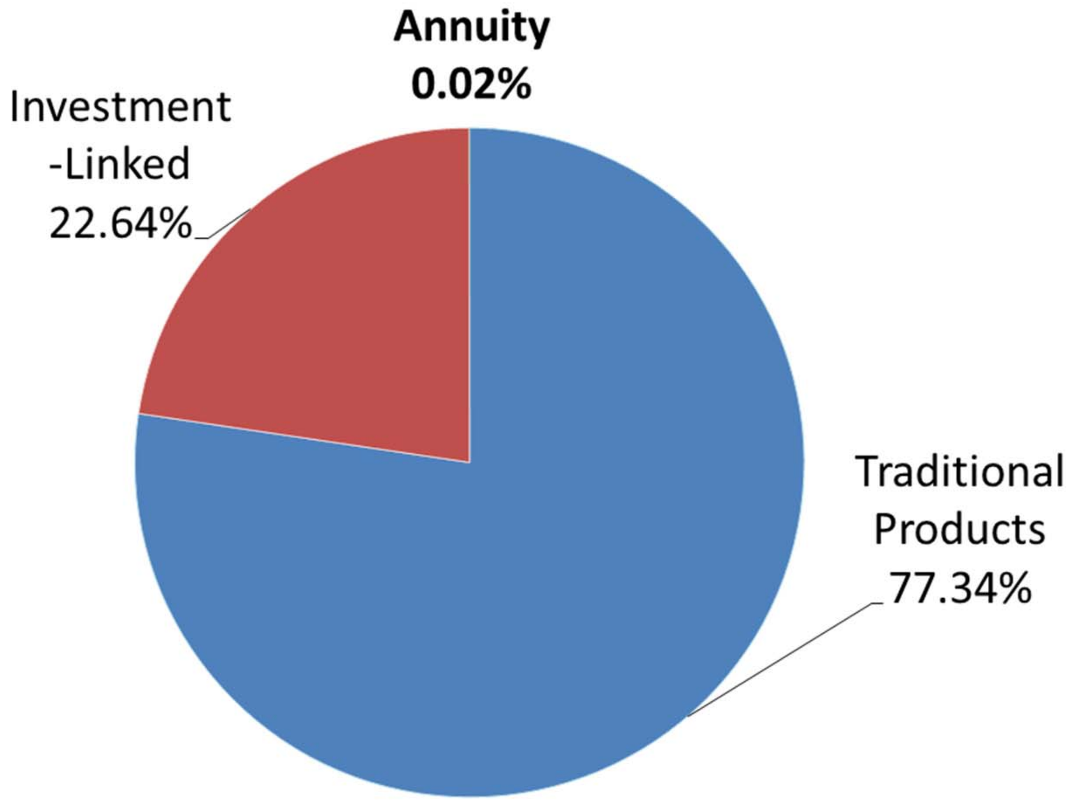
New business premium annuities was only around RM0.3million in the last 5 years. This represents less than 0.001% of the total new business premiums in Malaysia from 2007-2011.



Source: Annual Insurance Statistics, 2011, BNM

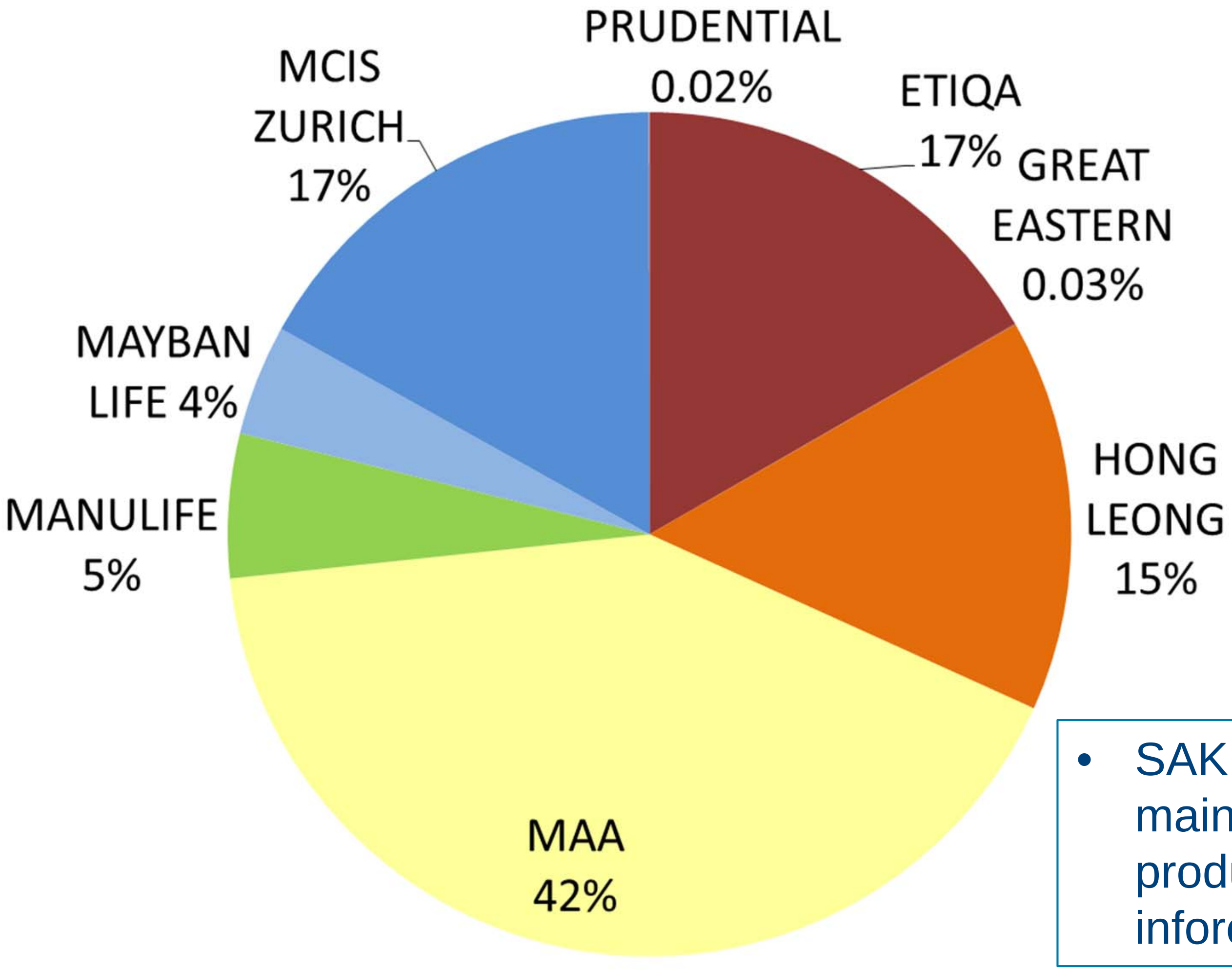
Annuities in Force in 2011 (excludes SATK)

Annuities in-force business currently contributes around RM200 million in terms of sums insured in Malaysia in 2011, and is decreasing each year. This represents around 0.02% of the total sums insured in Malaysia in 2011.



Source: Annual Insurance Statistics, 2011, BNM

Market share of annuity providers in 2011
Excludes SATK



- SAKK are the main annuity products inforce

Source: Annual Insurance Statistics, 2011, BNM

Annuity Malaysia Experience – lessons learnt

Creating awareness	• Lack of awareness and understanding on the product among the public. • Insurers should invest more in public education. • Establishing an annuity-centric entity to discuss relevant issues.
Government backing	• A national scheme product needs the full backing of government to ensure its survival. • Mandatory full/partial annuity take up on withdrawal of retirement benefits.

Source : OECD data, Pension Design and Marketing, The Annuity Malaysia Experience. – by Zainal Abidin Mohd. Kassim, FIA.

Challenges and opportunities

Challenges for insurers: Pricing reverse mortgages

- There are challenges for insurers in pricing reverse mortgages.
- It is sensitive to assumptions on:
  - Termination rates
  - Housing price appreciation rates
- Significant drop in housing prices can result in losses for insurers in the short run.
- There is little risk-pooling in reverse mortgages.

Challenges for insurers: Quantifying longevity risk

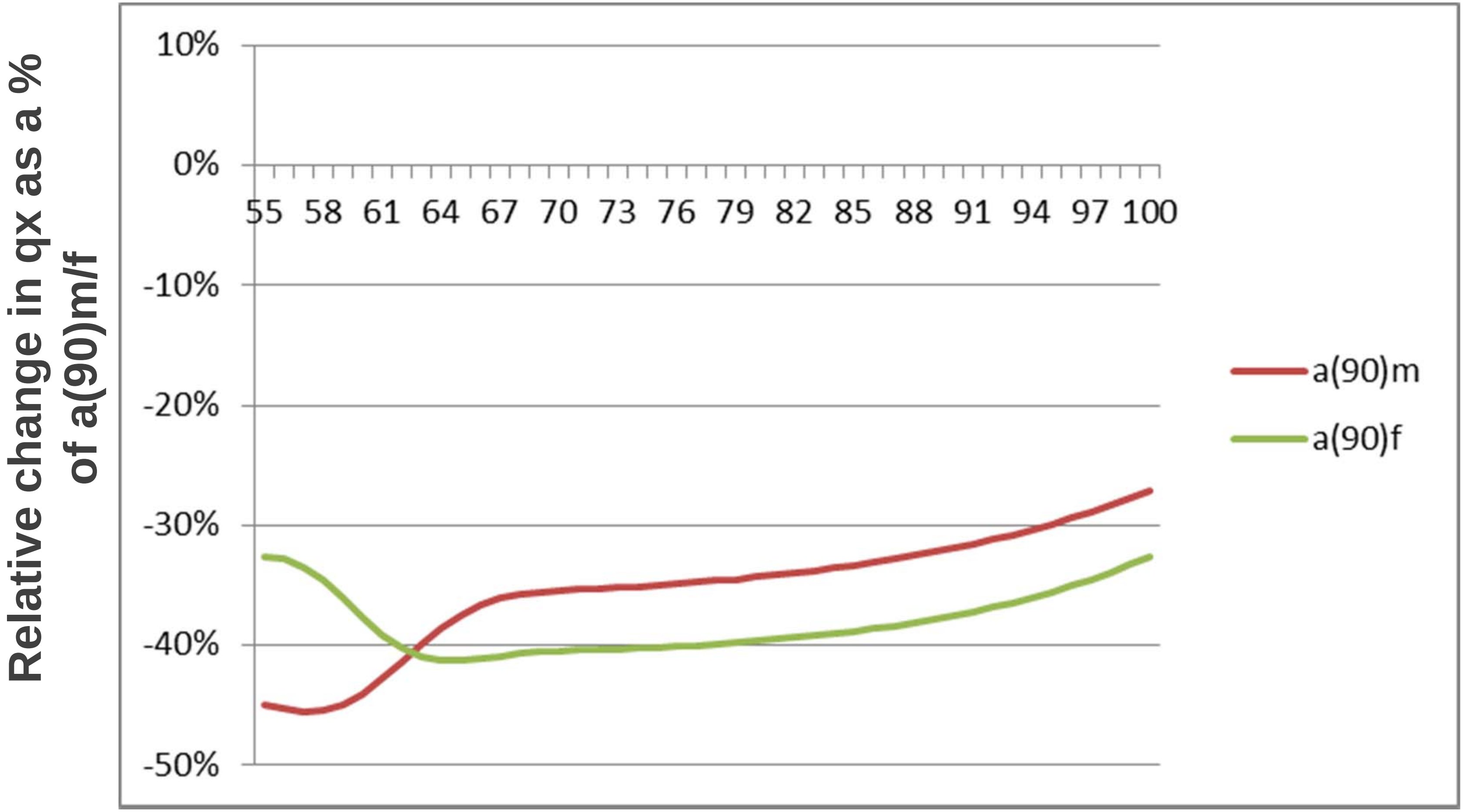
- Recent experience shows that people are living longer than expected.
- The increasing life expectancy trend is expected to continue.
- There are challenges in projecting longevity at older ages, making it difficult to price and reserve for long-term retirement products (e.g. annuities).
- Companies will have to take on longevity risk in retirement products, and due to the uncertainty, this risk may have penal capital requirements.

Challenges for insurers: Reserving and capital requirement for longevity risk

- Challenges in determining the capital requirement for longevity that represents 75th Confidence Level for RBC.
- In Europe, under Solvency II, the standard model approach to determine capital at 99.5th percentile for longevity risk is an immediate and permanent reduction in mortality rates by 20%.
  - Largely based on historical mortality experience of nine EU countries
- In Malaysia, the RBC framework uses a 5-year setback, which is around a 35-40% (varies by age) immediate and permanent reduction in mortality rates.

RBC Framework – Life Insurance Risk Capital Charges for Annuities

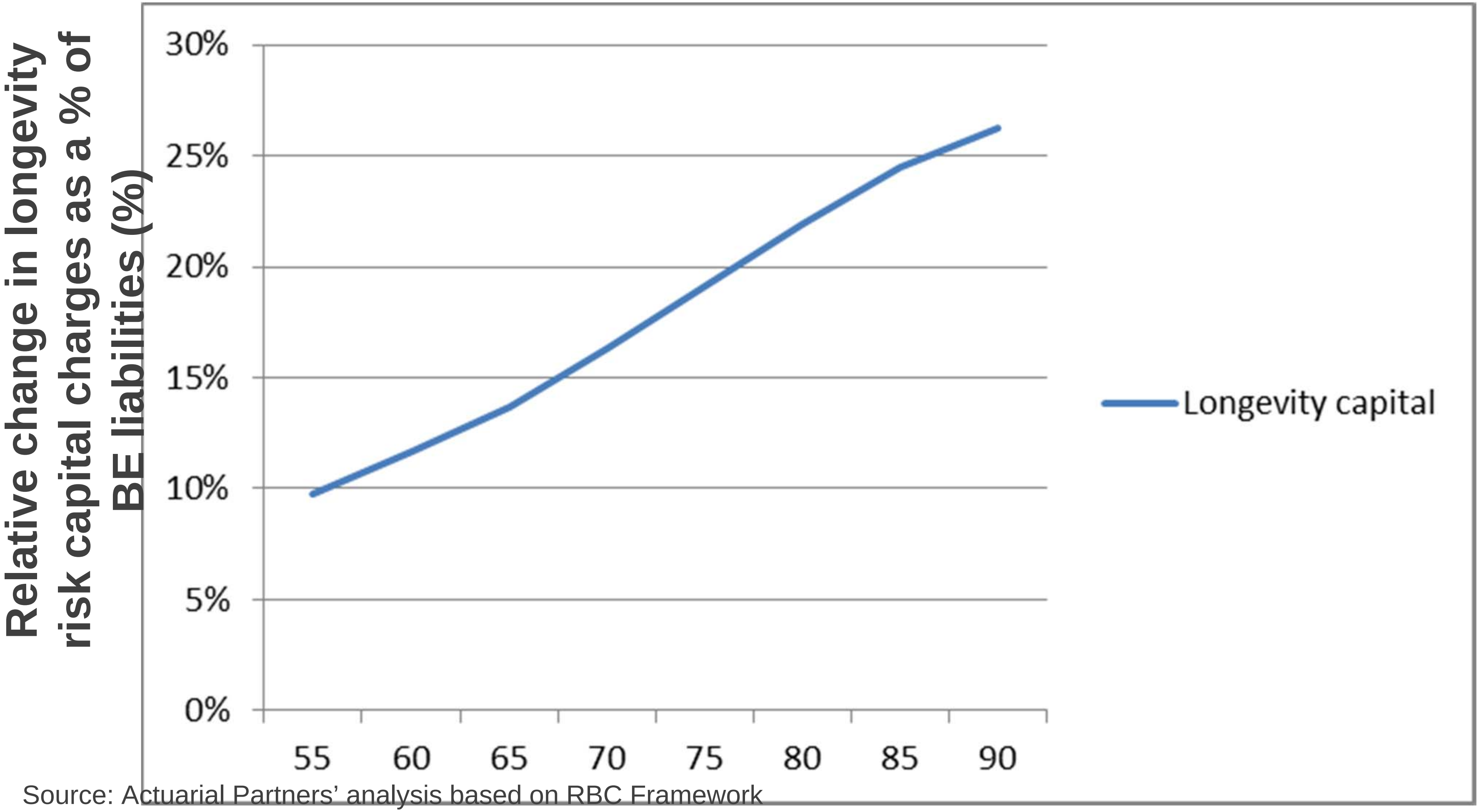
The LRCC for annuities is a 5-year setback on best estimate mortality table.
Assume best estimate annuity table = 100% a(90) m / f



Source: Actuarial Partners' analysis based on RBC Framework for Insurers v2.0

RBC Framework – Life Insurance Risk Capital Charges for Annuities

Increasing capital requirement at older ages
Assume Best Estimate mortality = 100% a(90)m

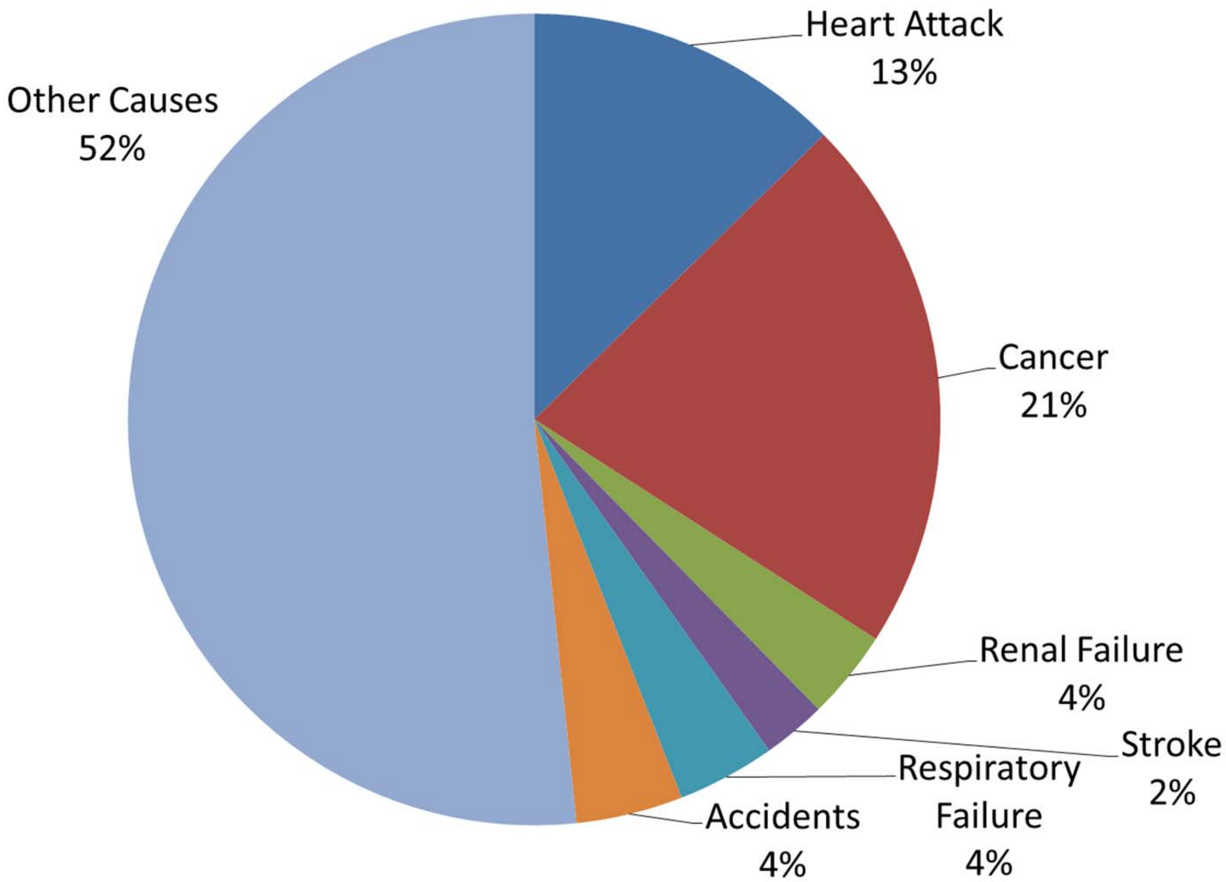


Source: Actuarial Partners' analysis based on RBC Framework

Challenges for insurers: Risk charges structure for longevity risk

- An immediate and permanent reduction in mortality may not be realistic.
- Considerations if a different risk charges structure to determine capital for longevity risk may be more appropriate, given the nature of the risk:
  - Allowance for mortality improvement assumptions (e.g. 1%-2% p.a.)
  - A combination of immediate and permanent reduction in mortality with allowance for mortality improvement
- Cause of death analysis can assist to determine the reasonableness of the stress tests of an immediate reduction in mortality rates for annuities.

Causes of death for ages 55 and above in Malaysia



Source: Actuarial Partners' analysis of LIAM Statistics

- Heart attack and cancer are the main causes of death.
- A 35% - 40% immediate reduction in mortality represents a complete elimination of deaths due to heart attack, cancer and renal/respiratory failure

Annuity Malaysia Experience – challenges

Risk-based capital (liabilities)

- Cost of guarantees are expensive, making annuities expensive. (interest guarantee, longevity guarantee)

Asset liabilities mismatch

- No suitable financial instruments to hedge both investment risk and longevity risk.
- Asset liabilities mismatch increases risk charge on assets.

Poor reputation of industry

- Previous experience with Malaysian annuities results in bad publicity on annuities in general.

Source : OECD data, Pension Design and Marketing, The Annuity Malaysia Experience. – by Zainal Abidin Mohd. Kassim, FIA.

Annuity Malaysia Experience – Opportunities

Suruhanjaya Sekuriti
Securities Commission
Malaysia

Private retirement scheme (PRS)

Increasing affluent aging population

Financially savvy society

Conclusions

- Insurance products can provide valuable long-term financial aid at retirement ages.
- With increasing life expectancy in recent years and a continuing expected future mortality improvement, it is difficult to project longevity.
- Longevity uncertainty combined with a high capital requirement for annuities, as well as high distribution cost associated with insurance companies means long term retirement products (e.g. annuities) is difficult to price and reserved for, thus can be prohibitively expensive.
- The success of long-term retirement products depends on the support of the government and proper education to the consumers.

Questions

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