

Solvency Framework

25 November 2016

By Anton, Charlton, Paresh, Julindi
Carrie-Anne, Mumsey & Thamsanqa

Agenda for the Day

Introduction

Understanding Reserves

The Current Solvency Framework

How other Countries Responded

Short term insurers vs Medical Schemes

****Tea Break ****

Proposed Risk Based Capital Framework

Responses to Circular 68 of 2015

Demonstration of Calculation

Project Map and Expected Timelines

Anton 5 minutes

Anton 10 minutes

Julindi 15 minutes

Paresh 15 minutes

Paresh 15 minutes

All 10 Minutes

Charlton, Mumsy & Thami 70 minutes

Carrie–Anne 15 minutes

Charlton 10 minutes

Anton 10 minutes

Introduction

- Medical Schemes Act no 131 of 1998 (MSA):
 - i. requires a medical scheme to “*maintain its business in a financially sound condition*”
 - ii. Allows the Minister in consultation with the Council to make regulations in relation to “*the assets to be held by the scheme*”
- Over the years various presentations at the Actuarial Society of South Africa and in 2003, the Council for Medical Schemes (CMS) issued a discussion document to the industry (financial soundness)

Introduction

- Presentation by previous Council member, Ashleigh Theophanides in 2014 on Risk Based Capital (RBC) to Council
- Strategic Plan 2015 – 2020, page 40: Strategic Outcome Orientated Goal 2: *“CMS is looking at a risk based solvency framework that will go a long way in changing the landscape in medical scheme environment. Medical schemes are currently required ...”*
- As a result we have produced Circular 68 of 2015 and a discussion document on the proposed framework

Introduction

- Circular 68 of 2015 – invited stakeholders to comment on the merits of transition to RBC and the proposed RBC framework
- CMS received feedback to stakeholders (details to be provided)
- In September 2016 – a technical workshop to discuss the project as well the feedback from stakeholders was held with our Council
- The Council acknowledge the need for further research and refinement of the proposed RBC

Understanding Reserving

Introduction

What are Reserves and Why set them?

Objectives of Solvency Framework

Alternative Solvency Frameworks

The ideal solvency framework

What are reserves and why set them?

- **Regulatory requirement....**
(Medical Schemes are required to keep a minimum amount of capital as reserves)
- **Why do regulators require this?**
 - i. Regulators' key interest is in financial stability
 - ii. Reserving requirements are a key component of this
 - iii. Reserves should be kept in line with risks that financial entities carry

Objectives of Solvency Framework

- **Maintain financial stability**
 - i. Ensuring that schemes have enough Capital for them to operate as a going concern – the individual circumstances of the schemes must be considered
 - ii. Healthy market competition helps ensure financial stability – solvency requirements should minimize barriers to entry and help ensure fair competition within the market.
- **Provide the regulator with early warning signs that a scheme faces potential financial difficulties**
 - a. To allow enough time for corrective action to be taken

Alternative Solvency Frameworks

- Market solutions – self regulation or rating agency approach
- Minimum capital rules
- Contribution based solvency – current framework
- Claims experience based solvency
- Risk based capital approach
- Statutory professional involvement

Ideal Solvency Framework

- Capture the essential risks of schemes to determine appropriate capital
- Simple to implement and monitor — a framework that is uniform across all schemes but still capture the individual circumstances of the scheme.
- Cost effective to both the regulator and the schemes
- Promote the efficient use of capital
- Promote and reward schemes for engaging in good risk control mechanisms
- Complement other regulatory functions

The Current Solvency Framework

Introduction

Definition of Solvency

The current solvency framework

Historical Solvency Levels

Definition of solvency

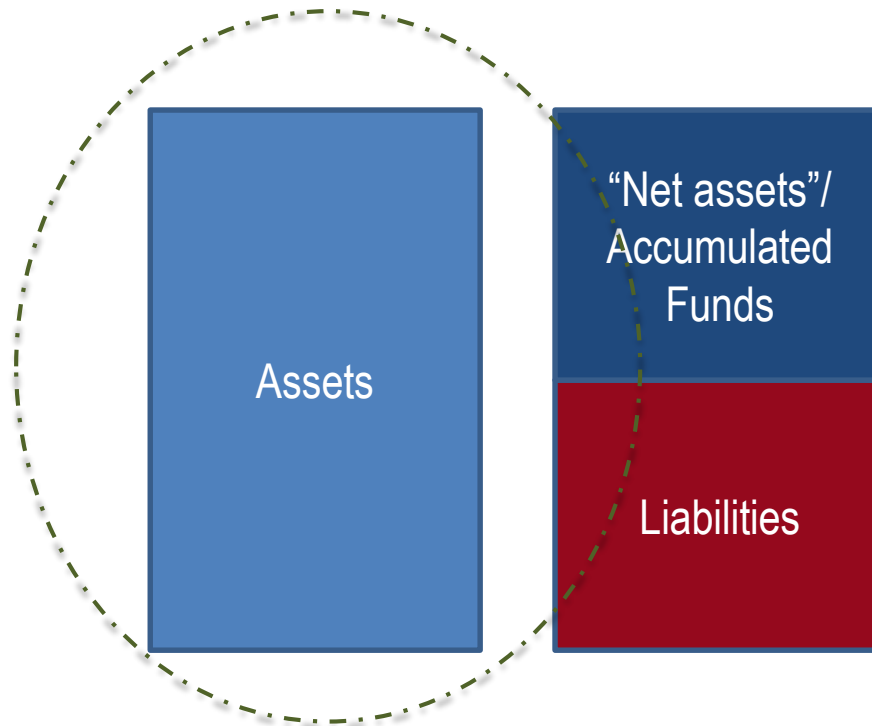
- Ability to meet obligations
- Statement of financial position
 - ✓ Assets cover liabilities?

Liquidity

Definition of solvency (cont)

Solvent

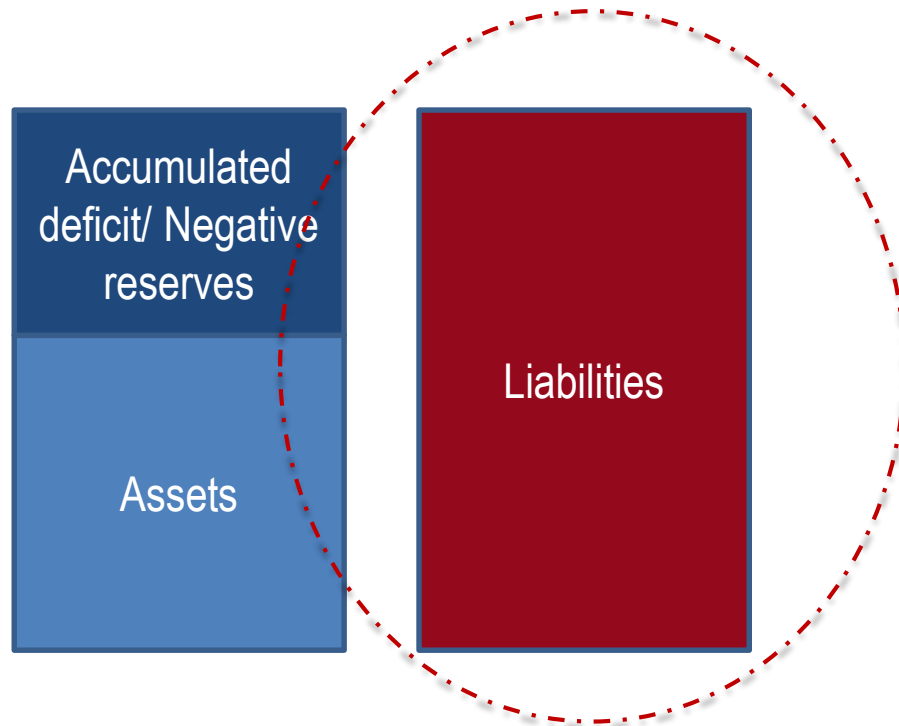
- Assets exceed liabilities



Definition of solvency (cont)

Insolvent

- Liabilities exceed assets



Definition of solvency (cont)

Section 35 (3)

- A medical scheme shall have assets, the aggregate fair value of which, on any day, is not less than the aggregate of:
 - i. the aggregate value on that day of its liabilities; and
 - ii. the nett assets as may be prescribed

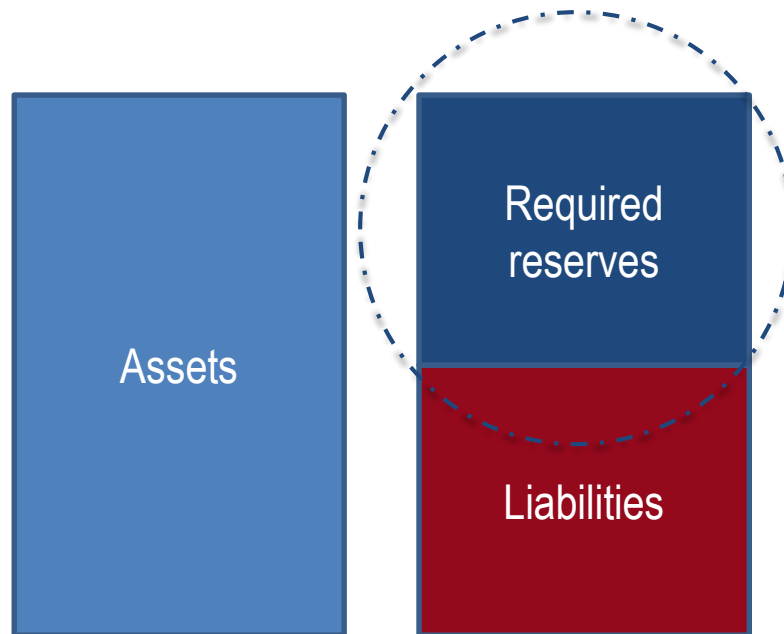
Regulation 29

- Prescribes nett assets

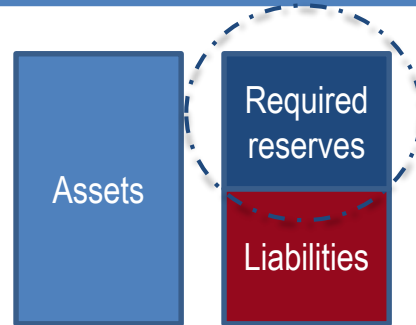
Definition of solvency (cont)

Statutory requirement

- Liabilities plus legally required reserves exceed assets



CURRENT FRAMEWORK



Schemes need to keep at least 25% of
Gross annual contributions as reserves

Consideration: current solvency calculation

- Basis for current requirement (25%)
 - ✓ Campagne report, 1957
- should be an 'alarm bell mechanism' to warn against possible future failure.
- should indicate the need for further investigations rather than providing absolute information as to the solvency position of the organisation.

Source : Cooper, *Solvency and Medical Schemes in SA*, 2001

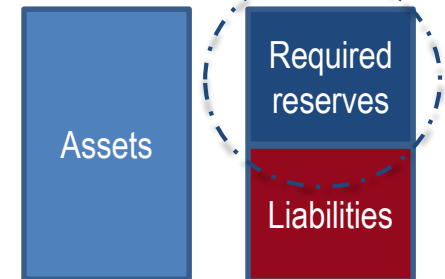
Consideration: current solvency calculation (cont)

- Inadequate contributions
- Total expenditure ignored
- Claims experience ignored
- PMSA trust monies
- Asset structure
- IBNR manipulation

Under-pricing
NHE = 8.6% of GCI
9.5% of RCI

Seasonality
Demographics
Claims volatility
Open vs restricted

Double
Annexure B



Legal requirements (cont)

Regulation 29(1)

- Accumulated funds = nett assets (defined)

Regulation 29 (2)

- Maintain “accumulated funds” expressed as % of gross contribution
- Not less than 25%
- Also called “**solvency level**”

Phase-in provisions:

- Regulation 29(3) -
 - ✓ Since new Regulations - 2000
- Regulation 29(3A)
 - ✓ New schemes after 2000

Year	Solvency %
1	10.0%
2	13.5%
3	17.5%
4	22.0%
5	25.0%

Calculation of solvency

$$\text{Solvency level} = \frac{\text{Accumulated funds}}{\text{Gross annual contributions}}$$

Calculation of solvency

Accumulated Funds

- = Net Assets**
 - (less) funds set aside for specific purpose
(Circular 13 of 2001 – Claims purposes)
 - (less) unrealised non distributable reserves
(Circular 13 of 2001 - Net cumulative unrealised gains)
(Consolidated results)
 - (less) Encumbered assets
(Circular 13 of 2001 – no liability)

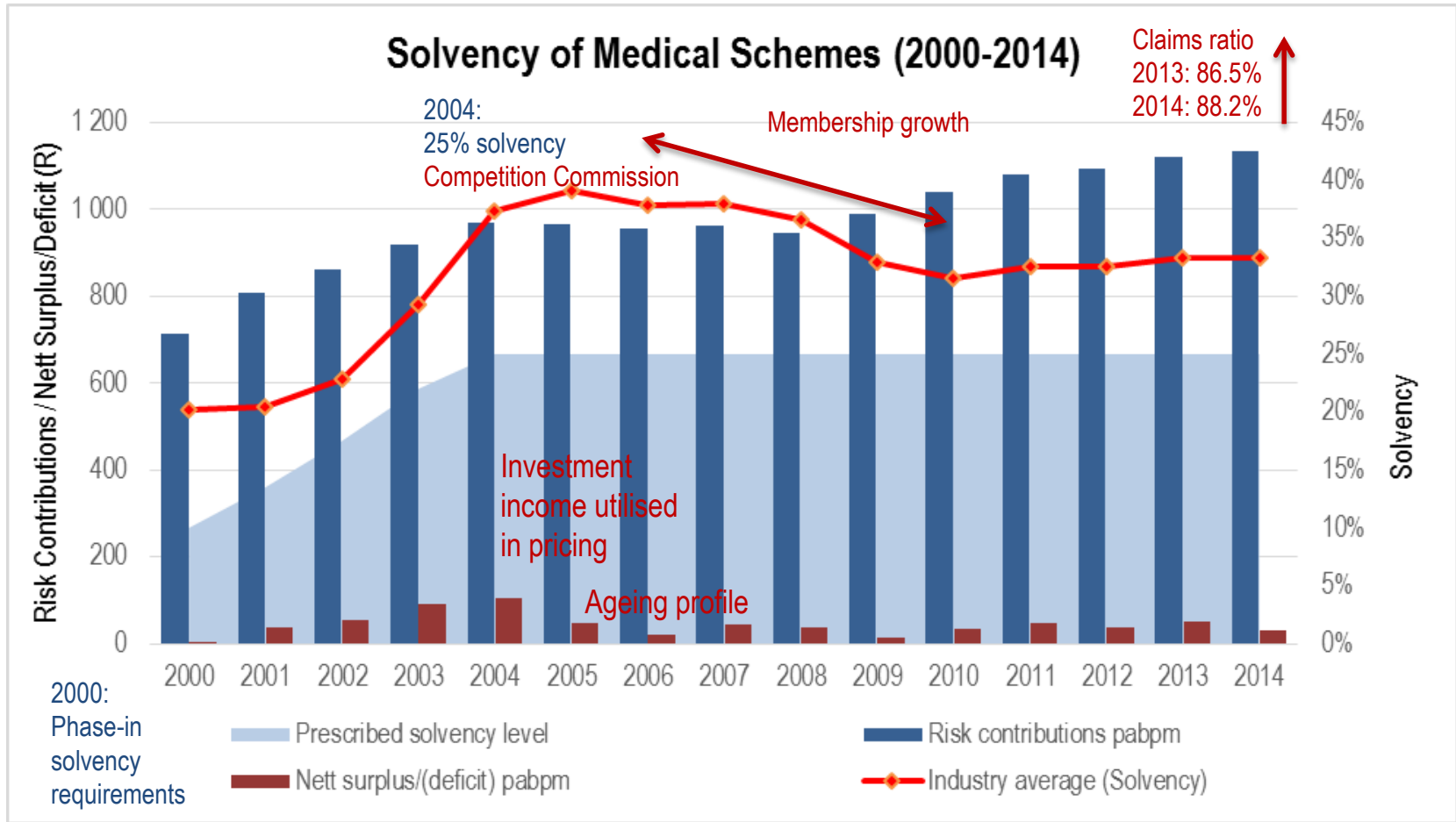
Calculation of solvency (cont)

Gross Annual Contributions

- Emphasis on “**Gross**”
 - ✓ Includes savings contributions
(in essence do not increase or reduce risk)
- “**Annual**”
 - ✓ During the year – compute using
 - Last 12 months
 - Actual YTD + revised budgeted contributions
 - Actual YTD + last month’s contributions extrapolated
 - Year-to-date annualised

Trust monies

CURRENT FRAMEWORK



How have other countries responded?

Introduction

Solvency II in EU

RBC in Australia

SAM in South Africa

Solvency II in EU

- This a form of **Risk Based Capital** Solvency Requirement
- Risks accounted for include:
 - i. Operational risks
 - ii. Market risks
 - iii. Liquidity risks
 - iv. Credit risk and
 - v. Insurance risk
- This system is based on three pillars which are namely;
 - a. Pillar 1: setting out the minimum capital required for schemes using a very prescriptive method
 - b. Pillar 2: own risk assessment by the scheme encouraging schemes to proactively manage risks
 - c. Pillar 3: transparency - where a scheme takes more initiative to report to the public and regulators on its activities

Solvency II in EU

- Pillar 1 sets out a method of calculation that requires minimum capital such that the risk of insolvency is at most 0,5% in a single year
- Pillar 2 would require each scheme to develop its own risk assessment over a longer time period to ensure economic viability
- The regulators would assess the suitability of each scheme's calculation for Pillar 2

RBC in Australia

- This another form of **Risk Based Capital** Solvency Requirement
- Risks accounted for include:
 - i. Asset risks
 - ii. Liability risks
 - iii. Insurance risk
 - iv. Outflows of capital, and
 - v. Operational risk
- This system is based on two tiers which are namely;
 - a. First tier: setting out the minimum capital required for schemes using a formula
 - b. Second tier: own risk assessment by the scheme encouraging schemes to proactively manage risks

RBC in Australia

- First tier sets out a method of calculation that requires minimum capital such that the risk of insolvency is at most 0,5% in a single year
- Second tier would require each scheme to develop its own risk assessment over a longer time period to ensure economic viability
- The regulators would assess the suitability of each scheme's calculation for the second tier

SAM in South Africa

- This another form of **Risk Based Capital** Solvency Requirement
- This is an adaptation of Solvency II to South African Insurers
- It is similarly based of 3 pillars namely:
 - i. Pillar 1: setting out the minimum capital required for schemes using a standard formula (Regulatory Capital)
 - ii. Pillar 2: own risk assessment by the scheme encouraging schemes to proactively (Economic Capital)
 - iii. Pillar 3: transparency - where a scheme takes more initiative to report to the public and regulators on its activities
- Risks accounted for include:
 - a. Asset risks
 - b. Liability risks
 - c. Credit concentration risk, and
 - d. Operational risk

SAM in South Africa

- Pillar 1 sets out a method of calculation that requires minimum capital such that the risk of insolvency is at most 0,5% in a single year
- Pillar 2 would require each scheme to develop its own risk assessment over a longer time period (typically 3-5 years) to ensure economic viability
- The regulators would assess the suitability of each scheme's calculation for Pillar 2

SAM in South Africa

Proposed RBC	SAM – Short-term insurance framework (FSB)
3 year time horizon	One year Time horizon + Own assessment which requires longer time horizon
Only one calculation for all	One calculation for all + review of every scheme's calculation
One model for all schemes to calculate reserves	Formula for all schemes + a model for every scheme which will be different
	<p>Places more burden on scheme as they have to develop own internal model for calculation over longer period.</p> <p>The Regulator has to review each model from the medical schemes</p>

Short Term Insurance vs Medical Schemes

Legislative provisions

Governance

Complexity of environments

Motivation for risk management

Ability to raise additional capital

Ability to implement complex regimes

Risk management tool available

Legislative provisions

Medical Schemes Act

- Section 57 deals with general provisions on governance
- Sets out the duties of the BoT
- Must act in the best interests of beneficiaries of medical schemes at all times.
- Criminal sanctions can be imposed for non-compliance with the Act.

Companies Act

- Governance of companies is set out in detail in sections 57-78.
- In addition to criminal prosecution directors can be held personally liable for their actions and civil claims can be instituted against them.

Governance

- i. There are various types of companies regulated in terms of the Companies Act.
- ii. Medical Schemes are always mutual societies or not-for-profit organisations.
- iii. King IV serves as a guideline for directors and trustees but is not legally binding.

Medical Schemes

- Board of trustees
- Complex environment
- Skills of Board members not aligned with complexity
- Alignment of interest between Boards and beneficiaries is not strong

Companies

- Board of Directors
- Less complexity of environment
- Board members mostly appointed on merit – therefore very skilled
- Strong Alignment of interest between Board and shareholders.

Complexity of environments

- Medical Schemes often have to contract with external parties to provide services
 - i. Administrators, Managed Care Organisations, Marketing, Consultants (actuaries investment)
 - ii. These are for profit and in most cases have more technical abilities than boards
- This places Medical Schemes at a higher risk financially and as a result carry more operational inefficiencies
- In insurance companies most of these services are provided in house

Motivation to manage risks

- Higher in Companies – effects of losses directly impact providers of capital
- Scheme's impact of losses less serious for members – they will join another scheme
- It can also be argued that its easier for shareholders to hire and fire board of directors than it is for members to remove board of trustees

Ability to raise capital

- Insurance companies can borrow as well as seek more equity from shareholders
- Insurance companies are more flexible when underwriting (refuse cover, risk rate, exclusions)
- Insures can change premiums during a financial year (no community rating like in medical schemes)
- Only source of funds for schemes is member contribution and its difficult to alter contributions

Ability to oversee a complex regime

- Short term insurance companies
 - Greater access to technical resources
 - Have invested in complex models to help manage risks
- Medical schemes
 - Most do not have technical recourses to develop in-house models (Pillar 2 of SAM)
 - These will come at a cost

Risk Management tools available

- Short term insurance companies
 - Have a wider scope of tools manage risks;
 - i. Reinsurance
 - ii. Underwriting tools
 - iii. Risk rating
 - iv. Limit liabilities
- Medical schemes
 - Limited ability to manage risk
 - a. No cap on maximum loss a scheme may face
 - b. Underwriting limited (Late joiner penalties and waiting periods may only be imposed in certain circumstances)
 - c. Community rating & Requirement to pay PMBs in full (are in line with social objectives which are appropriate in a healthcare space)

Proposed RBC

Introduction

Business risk

Asset risk

Operational Risk

Advantages

Results

RBC Framework

- Should be simple to implement and monitor
- Account for major risks
 - i. Business Risk (day to day capital requirements for a scheme)
 - ii. Assets Risk (fall in market values in extreme events)
 - iii. Operational Risks (Failures in People, Systems & Processes)
- Investment guidelines to be kept (Annexure B though may be revised) – will help minimise liquidity risks
- Three year time horizon – not to have a too short term view
- Low probability of failure/ruin: 1% (1 in 100) over a 3 year period

Business Risk

- A model has been developed to determine probability of failure / ruin over 3 year horizon:
- Risks allowed for include:
 - i. Moderate fluctuation in asset values
 - ii. Claims volatility risk
 - iii. Pricing risk
 - iv. Non-health care expenditure
- This model gives the minimum capital required – with chance of insolvency of 1 in 100 over a three year period.

Asset Risk

- Extreme market events occur very rarely but may have dire consequences.
- These are not included in the business risk section.
- The proposal is to require capital in line with the riskiness of assets held.
- The capital could be the maximum loss in a year for each asset class multiplied by actual assets holding in the specific asset class over the last **15 years**.
- Example values could be:
 - Cash:- default risk can be set 1 %
 - Bonds: -15%
 - Equities: -36%
- These values are only illustrative (based on returns from 2002)

Operational Risk

- This is very difficult to estimate accurately
 - There are various reasons for failure of schemes and reasons for failure are unique, also very few cases.
- CMS has a few tools that may shed light on specific schemes' operations
 - Complaints – highlight failures in systems, people & processes
 - Compliance & investigation inspections – give more details on operations of the scheme (unfortunately not carried out for every scheme annually)
 - There is much value in including these when measuring scheme risk – a positive spin off could be influence behaviour

RBC Framework

Business Risk

What does the revenue account of a medical scheme look like in the future?

Income		
Contribution income		Easy to predict
Other Income		Easy to predict
Investment income		Not easy to predict
Expenditure		
Healthcare Expenditure		Not easy to predict
Administration Expenditure		Easy to predict
Broker Fee		Easy to predict
Net Surplus		

RBC Framework

Business Risk

How do we project the future revenue account?

Income		
Contribution income		Use the budget assumptions
Other Income		Use the budget assumptions
Investment income		Allow for future variation
Expenditure		
Healthcare Expenditure		Allow for future variation
Administration Expenditure		Use the budget assumptions
Broker Fee		Use the budget assumptions
Net Surplus		

RBC Framework

Business Risk

Distributions used to make cash flow projections

Income	
Contribution income	Individual scheme's budget assumption for Yr1 and Industry average Yr2 &Yr3
Other Income	
Investment income	Lognormal distribution for Equities & Bonds (parameters set based on 3 year history on major indices)
Expenditure	
Healthcare Expenditure	Normal distribution (claims ratios) to project future expenditure (parameters set based on 3 year history on schemes' claims ratio)
Administration Expenditure	Budget assumption (Industry wide assumption)
Broker Fee	
Net Surplus	

RBC Framework

Business Risk

What does the balance sheet of a scheme look like in the future?

Investments		
Cash		Easy to predict
Bonds		Not easy to predict
Equity		Not easy to predict
Other net current assets		
Current liabilities		Not included
Current assets		Not included
Members' funds		
Net Surplus from Income statement		Not easy to predict

RBC Framework

Business Risk

How do we project the future balance sheet of a scheme?

Investments		Use the budget assumptions
Cash		Allow for future variation
Bonds		Allow for future variation
Equity		
Other net current Assets		
Current liabilities		Not included
Current assets		Not Included
Members' funds		
Net Surplus from Income statement		Use the revenue account balance from above

RBC Framework

Business Risk

How do we project the future balance sheet of a scheme?

Investments	
Cash	Use the budget assumptions
Bonds	
Equity	Lognormal distribution for Equities & Bonds (parameters set based on 3 year history on major indices)
Other net current Assets	
Current liabilities	Not included
Current assets	Not Included
Members' funds	
Net Surplus from Income statement	Use the revenue account balance from above

RBC Framework

Business Risk

set seed 2016
set obs 250000

1. gen CR1=rnormal(0.6506,0.0938)
2. gen pn1=rpoisson(234.5175)
3. gen ER1=exp(rnormal(0.008109,0.034197))
4. gen BR1=exp(rnormal(0.003577,0.026043))
5. gen RCI1= (180509244+ 13041)*(1+0.0831 * 0)
6. gen RHCE1= (-181992516*CR1 -196628*pn1)*(1+0.092 * 0)^0
7. gen ADM_E1=-14405285*(1+0.06 * 0)
8. gen Brk_F1= -180509244 * 0.0206*(1+0.0831 * 0)
9. gen Equity1=38620334*ER1
10. gen Bonds1=245545371*BR1
11. gen Cash1=40750934*(1+0.00568)^(1/12)
12. gen Ivst_F1 = - (Bonds1+ Cash1+ Equity1)*0.0002
13. gen NCF1=RCI1+RHCE1+ADM_E1+Brk_F1+Ivst_F1+Equity1*0.002421 + Bonds1*0.007087

RBC Framework

Business Risk

- Carry out many projections (simulations) of revenue account and balance sheet for the next 3 years
- Currently we use 250 000 simulations
- Count how many times the value of the assets falls below zero – scheme would have become insolvent
- Probability of failure = no of failures/no of simulations
- Find the minimum capital such that the probability of failure is 1 in a 100 - (2 500 in case of 250 000 simulations)

RBC Framework

Business Risk

Impact of calculation

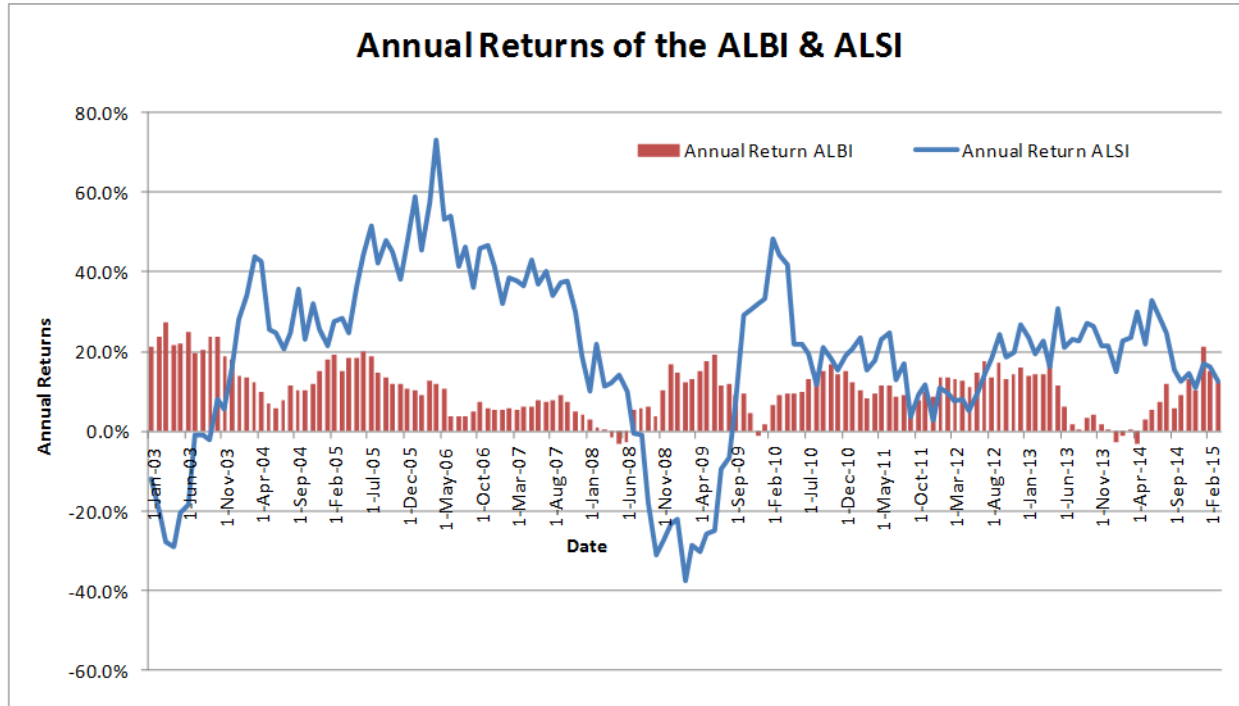
- Reserves are set considering all elements of the revenue account and the balance sheet

Behaviour modification

- Very limited scope for manipulation of solvency calculation
- Encourages schemes to consider all features of revenue account as part of risk management
- Limited ability of deliberately under pricing

RBC Framework

Asset Risk



- Returns on assets classes varies greatly
- Impact of variation may be dire on medical schemes
- Reserves need to be kept to survive such asset value moves

RBC Framework

Asset Risk

- Reserves per asset class are calculated as follows:

<i>Equity</i>	<i>Bonds</i>	<i>Cash</i>
37%	3%	1%

	Asset Holding	Reserve Requirement
	Scheme A	
Equity	100 000 000	37 000 000
Bonds	20 000 000	600 000
Cash	30 000 000	300 000
Grand Total	150 000 000	37 900 000
	Scheme B	
Equity	30 000 000	11 100 000
Bonds	20 000 000	600 000
Cash	100 000 000	1 000 000
Grand Total	150 000 000	12 700 000

RBC Framework

Asset Risk

Impact of calculation

- A scheme with more risky assets holds more reserves

Behaviour modification

- A scheme will only invest in risky assets if it can afford to

Compliance & Investigation

Case Studies: Governance failures

Pro Sano (2003) (which has now amalgamated with Bonitas Medical Scheme in 2013)

- Trustees used funds of medical aid fund to settle personal tax liabilities of R4 million
- Trustees ordered the fund to pay for a tax consultant for personal tax advice

Conclusion: Trustees served with notices for the removal in terms of section 46 of the Medical Schemes Act on the basis that they were not fit and proper

Case Studies: Governance failures

Omnihealth Medical Scheme (2003) – (which was liquidated in 2007)

- Agreement with administrator not properly recorded, resulting in Omnihealth paying R25 million more than what was entitled to administrator
- No written contract for provision of managed health care services, resulting in fund paying R6.5 million that it had not contracted to pay
- Loyalty scheme allowed, which did not comply with legislation and which cost members R9.5 million
- Reinsurance contracts implemented without authorisation of BoT, which lost almost R16 million of members' money in reinsurance premiums
- Bad debts accrued to about R30 million due to failure to stop payments for “members” in arrears with their contributions

Conclusion: Trustees served with notices for the removal in terms of section 46 of the Medical Schemes Act on the basis that they were not fit and proper

Case Studies (cont'd)

Hosmed (2013)

- Trustees selectively wrote off debt owed to Hosmed by their employer - benefited employer and themselves, but prejudiced fund, its beneficiaries and other employer groups...Failed to disclose this conflict of interest and did not recuse themselves from meetings
- Trustees lied under oath iro signatories of the procurement agreement (irregular procurement)
- Trustees procured marketing material in irregular manner
- Trustees conducted investigation in unfair and aggressive way resulting in employer groups leaving the fund - fund lost almost 3 000 members
- Trustees failed to manage their personal finances responsibly (2 trustees had numerous judgments against them related to debt) - this meant that they were unlikely to run a fund properly

Conclusion:

- Trustees removed in terms of section 46 of Medical Schemes Act.
- Court placed scheme under provisional curatorship in terms of section 56 of Medical Schemes Act.

Compliance & Investigation: Types of Inspections

Operational Risk

The Registrar may order the following inspections:

- A forensic inspection: In terms of section 44(4)(a) of the Act – if the Registrar is of the opinion that such an inspection will provide evidence of any irregularity or of non-compliance with the Act by any person; or
- A routine inspection: In terms of section 44(4)(b) of the Act for the purposes of routine monitoring of compliance with the Act.

APPLICABLE LAWS & RULES

Compliance & Investigation: Applicable Laws & Rules

Operational Risk

- Statutes:
 - The Constitution
 - The Medical Schemes Act 131 of 1998
 - Section 32: Binding force of rules
 - Financial Institutions (Protection of Funds) Act 28 of 2001
 - Inspection of Financial Institutions Act 80 of 1998
 - Companies Act 71 of 2008
- Case law

Section 57. General provisions on governance.

- A board of trustees must consist of persons who are fit and proper to manage the business contemplated by the medical scheme in accordance with the applicable laws and the rules of such medical scheme.
- The Medical Schemes Act obliges the board of trustees to ensure that the interests of beneficiaries are protected at all times; act with due care, diligence, skill and good faith; take all reasonable steps to avoid conflicts of interest; and act with impartiality in respect of all beneficiaries.

Compliance & Investigation: Common Law Cases

Operational Risk

Lord Coke, 16 Century

“Fit (or *idoneus*) with respect to an office is said to involve three things, honesty, knowledge and ability: honesty to execute it truly without malice, affection, or partiality; knowledge to know what he ought duly to do; and ability, as well in estate as in body, that he may intend and execute his office, when need is, diligently, and not for impotency or poverty neglect it.”

Kaplan v Incorporated Law Society, Transvaal 1981 (2) SA 762 (T) at 782D – E.

- fit and proper is a relational term which measures personal qualifications against a certain task – it is subjective to the task at issue
- The courts generally agree that “fit and proper” has no settled meaning and does not contain two distinct ideas

Compliance & Investigation: Common Law Cases

Operational Risk

The Arrow Altech Judgment (2007)

- On giving of gifts / entertainment the court held-
 - “The practices I have mentioned appalled me and seem prima facie to constitute a breach of the Corruption Act, 94 of 1992.” and “If such measures are being resorted to by our captains of industry then the court must set its face most resolutely against that.”

Compliance & Investigation: Common Law Cases

Operational Risk

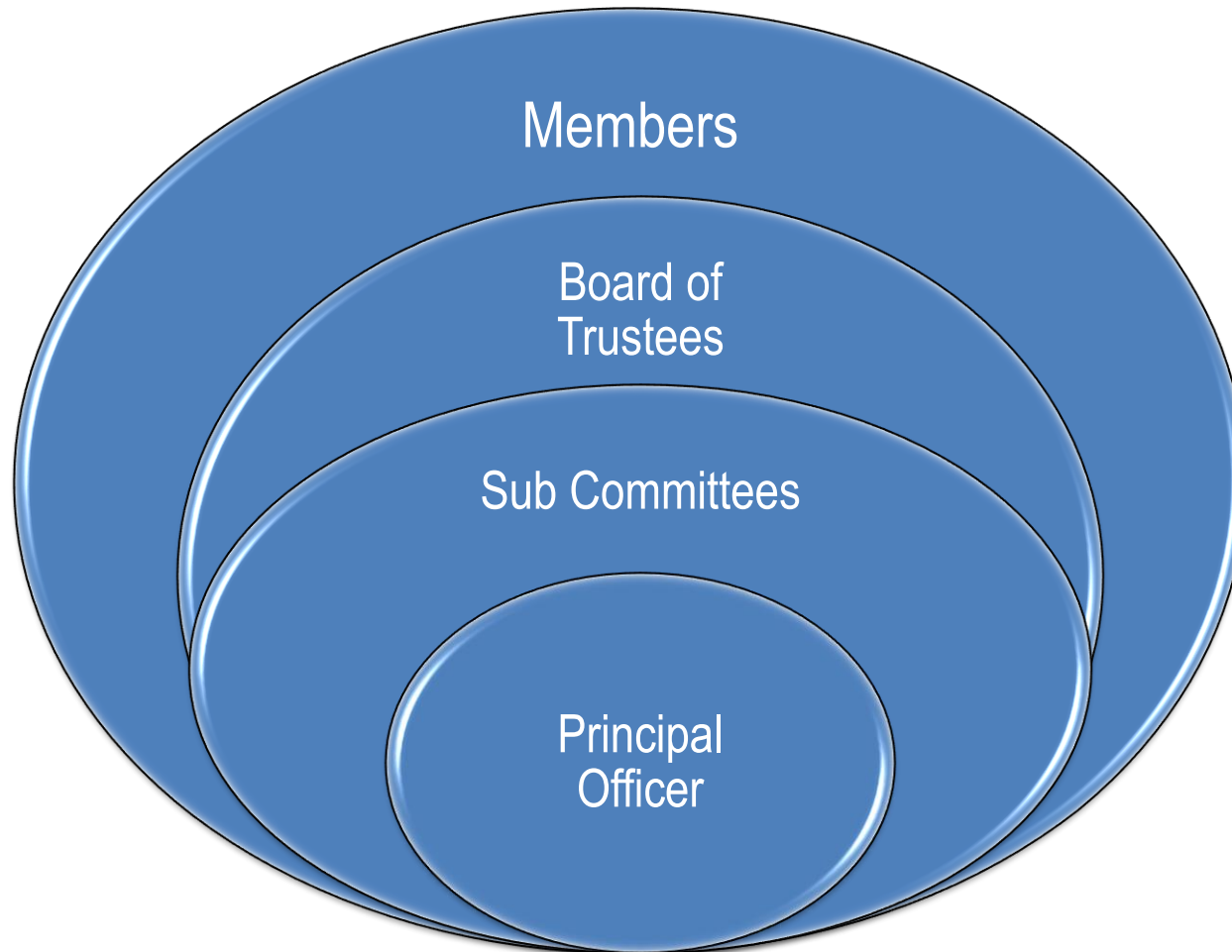
In Selangor v United Rubber Estates Ltd

- The English Court had the following to say about interference with a trustee's good judgment –
 - “... they were puppets which had no movement apart from the strings and those strings were manipulated by Cradock. They were voices without any mind but that of Cradock; and with that mind they are fixed in accordance with the view which I have already expressed on the law. They doubtless hoped for the best but risked the worst; and that worst has befallen them they were puppets which had no movement apart from the strings and those strings were manipulated by Cradock. They were voices without any mind but that of Cradock; and with that mind they are fixed in accordance with the view which I have already expressed on the law. They doubtless hoped for the best but risked the worst; and that worst has befallen them”

MEDICAL SCHEMES GOVERNANCE STRUCTURE

Compliance & Investigation: Corporate Governance Structure

Operational Risk



MINIMUM EXPECTED GOVERNANCE PRACTICES



Meetings of
Members

Board of trustees
meetings

Meetings by committees
of the board

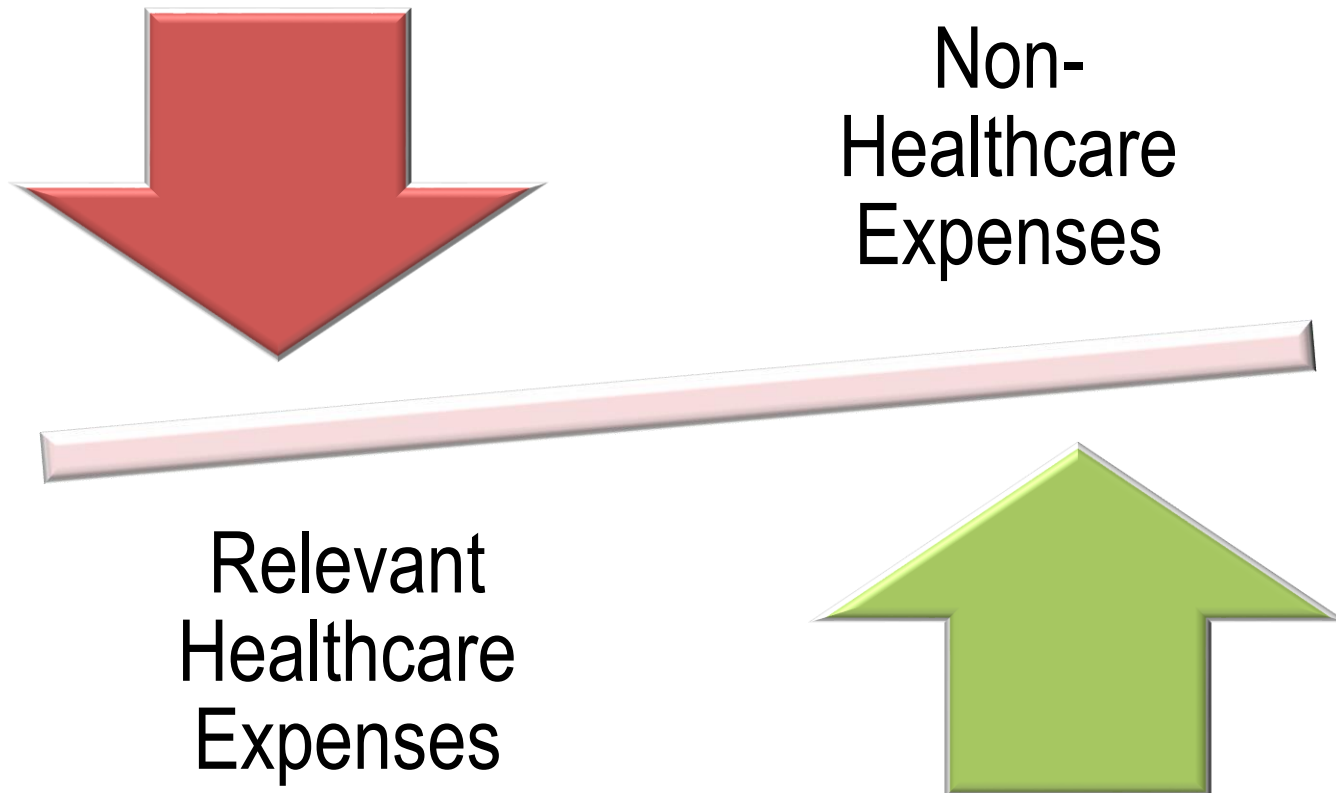
Clear role and functions of a
Principal Officer

Clear role and functions of other officers
of the scheme

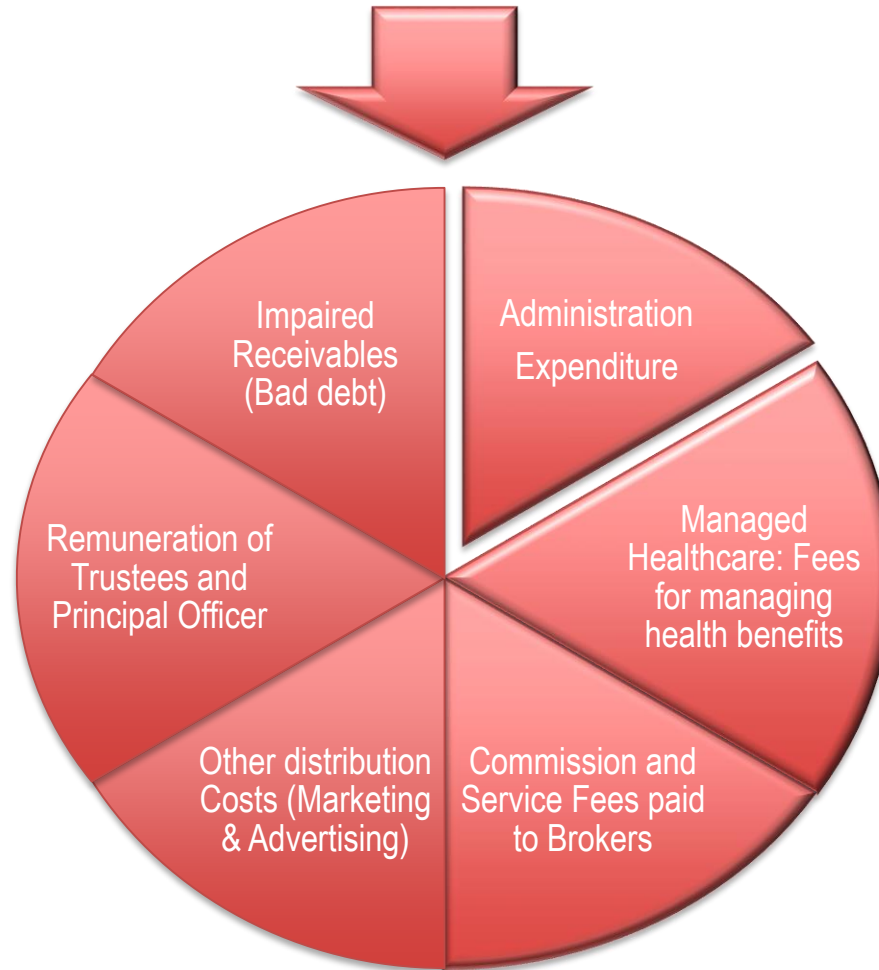
IMPACT OF SERVICE PROVIDERS ON GOVERNANCE

Compliance & Investigation: Operations & Expenditure

Operational Risk



Compliance & Investigation: Non-Health Care Expenses Operational Risk



WHEN GOVERNANCE FALTERS: CONSEQUENCES ?

Compliance & Investigation: Non-Panel Intervention

Operational Risk

Directives

- The Registrar may issue directives in terms of the provisions of the Medical Schemes Act and/or section 6 of the Protection of Funds Act.
- Where a directive is not complied with, may enforce the same by:
 - naming and shaming;
 - obtaining a court order to compel the scheme to comply;
 - trustees may be removed in terms of S46 of the MS Act;
 - trustees may be removed in terms of the scheme's rules
 - the entire Board of Trustees may be removed in terms of S56 of the Medical Schemes Act or S5 of the Protection of Funds Act

Compliance & Investigation: Panel Intervention

Operational Risk

Section 66 of the Medical Schemes Act

- Failure to furnish a return, financial statement, document or reply to an enquiry within the prescribed time period attracts a penalty.
- Contravention of, or failure to comply with any provision of the Medical Schemes Act may lead to criminal prosecution in line with section 16 of the Medical Schemes Act.

Protection Of Funds Act:

- A person who contravenes or fails to comply with any provision of this Act may be prosecuted.
- A court may order a person that benefits unduly to compensate the institution or principal for any damage suffered.

COMPLAINTS

Complaints Process

Operational Risk

- Complaints submitted to CMS are dealt with by the Complaints Adjudication Unit (CAU).
- Adjudication processes and all decisions taken are based on provisions of the Medical Schemes Act 131 of 1998 (“the Act”) and the registered rules of the medical scheme concerned.
- Section 47 of the Act gives rise to the mandate of the CAU.
- Complaints must be submitted in writing through the dedicated channels.
- Upon receipt of the complaint, an analysis of the merits is conducted at the onset to determine validity.
- Complaints which are *prima facie* regarded as valid, are referred to medical schemes for a formal response.

Complaints Process

Operational Risk

- Initial determination of validity does not indicate non-compliance or contravention – Final decision only taken upon conclusion of investigations.
- Evidence submitted by complainants and medical schemes is thoroughly interrogated.
- Adjudication involves the application of relevant legislation, case law, registered Scheme rules and other legal principles.
- Decisions are communicated in the form of written rulings.
- Principles of fair administrative justice underpin the decision making process.
- Decisions are binding on all parties concerned, unless appealed in terms of the Act.

Complaints Process

Operational Risk

CLASSIFICATION

- Incoming volumes alone cannot be used as a reliable measure of non-compliance as more complaints may not necessarily imply poor compliance levels.
- Various categories are used to classify complaints depending on the merits and issues in dispute.
- Upon conclusion of investigations, classification of the complaint is reviewed again, based on findings.

Complaints Process

Operational Risk

CLASSIFICATION

- The number of confirmed contraventions and nature of complaints lodged against a medical scheme could be deemed a more reliable measure for purposes of evaluating risk and apportioning weight to complaints in the index.
- Although decisions may be appealed, CAU has a relatively high success rate.
- High number of CAU decisions are confirmed by Appeal Committee and Appeal Board.
- In 2015, the Appeal Committee upheld 90% of rulings issued by CAU
- In *GEMS v Appeal Board of the Council for Medical Schemes and Others* [2016] ZAGPPHC, a ruling emanating from the CAU was upheld by Appeal Committee, Appeal Board and also confirmed on review by the High Court.

Complaints: Appeal Process

Operational Risk

SECTION 48

- In keeping with fair administrative justice, all decisions are appealable through the two-tiered appeal system.
- Section 48 of the Act provides for the first level of appeal to the Council's Appeal Committee.
- Appeal Committee may allow oral and/ or written submissions.
- Appeal Committee may confirm or vary the decision or it may rescind the decision and come up with its own.
- Appeal Committee decisions may be appealed to the Appeal Board as provided for in Section 50.

Complaints: Appeal Process

Operational Risk

SECTION 50

- Appeals to the Appeal Board are governed by Section 50.
- Fee payable as prescribed.
- Appeal Board is independent and impartial - appointed by the Minister of Health.
- Appeal Board proceedings are open to the public unless decided otherwise by the Chairperson.
- The Appeal Board has wider powers similar to High Court - It determines its own procedure and may elect to admit oral or documentary evidence.
- The Appeal Board may confirm, set aside or vary a decision.

Why use complaints to measure Operational Risk?

CURRENT SCENARIO

- Legislation recommends disputes resolution at Scheme level but does not prohibit direct approach to CMS
- Results in high volumes of complaints at CMS, which could have been resolved at Scheme level
- Reactive redress by CMS as opposed to proactive redress by Scheme, which would be ideal
- Essential early feedback on service failures is thus ignored, only to be heeded after adverse findings
- Relations between members and schemes deteriorate due to prolonged dispute resolution processes

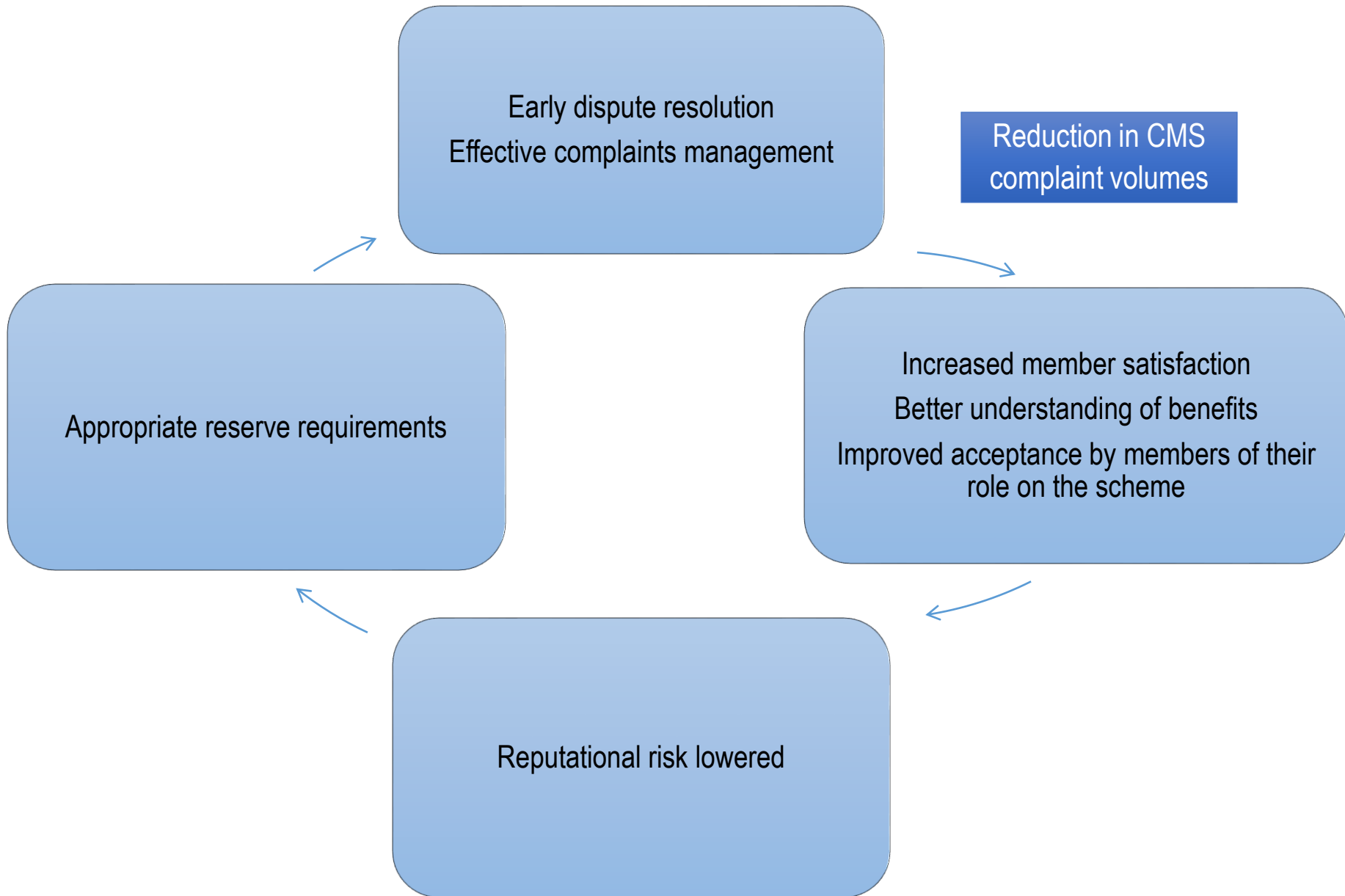
Why use complaints to measure Operational Risk?

REALITY

- Complaints are in integral part of the Scheme's internal operations and often a good gauge of the effectiveness of services delivered to members
- Inefficiencies in various internal systems filters down to members, who in turn, raise the alarm through complaints
- If used effectively, complaints may serve as a sensor for administrative shortcomings and allow early implementation of proactive counter measures
- Schemes are losing out on opportunities to directly engage members
- Members feel disengaged and under-valued

Benefits of proposed Solvency Framework

- Integrated approach to overall risk management
- Puts the risk associated with complaints back on the front banner
- Balance between prudence, compliance and members satisfaction
- Refocuses attention on member queries / disputes
- Opportunity to implement early dispute resolution
- Restore / Save member - scheme relationship
- Opportunity to set appropriate reserve levels
- Reduction in volumes of complaints to CMS



RBC Framework

Operational Risk

How to set capital against operational risk

- i. Propose to set capital requirement at a band say from 5% to 15% of annual contributions – (ITAP proposal was 10%)
- ii. Set up an index measuring complaints per 1000 beneficiaries (may be split into type of complaints)
- iii. Develop an index based on compliance reports (after investigation)
- iv. Use these indices to determine capital requirements
- v. Indices should be such that a scheme with low complaints holds less capital
- vi. Credit will be given for positive reports while higher capital will be required for negative and resistance to inspections

RBC Framework

Operational Risk - Complaints

- Reserves requirement will range from 2% to 6% (illustrative figures only)
- Past complaints trends are as follows (higher end & not averages):

Type of complaints	Maximum no of complaints per 1 000 beneficiaries	Average per 1 000 beneficiaries	Proposed weight in index
All complaints	4	0.54	10%
Valid complaints	3	0.47	30%
Non-payment of benefits	2	0.35	60%
Other complaints	1	0.12	-

- Non-payment of claims carry more weight in the index
- Each schemes complaints are compared to the above to set calculate an index

RBC Framework

Operational Risk - Complaints

- Reserves requirement will range from 2% to 6% (illustrative figures only)
- Implication of calculation

Type of complaints	Maximum no of complaints per 1 000 beneficiaries
All complaints	4
Valid complaints	3
Non-payment of benefits	2
Other complaints	1

- A scheme receiving at least 4 complaints per 1 000 beneficiaries; of which 3 are valid complaints and 2 relate to non-payment of benefits will have maximum reserving requirement i.e. 6%.
- A scheme receiving at least 4 complaints per 1 000 beneficiaries; of which all of them are invalid will have a reserving requirement of 2,4%

RBC Framework

Operational Risk - Complaints

- Example of reserve calculation:

Scheme	A	B
Complaints per 1 000 beneficiaries		
All reported: (all reported x 1 000 ÷ no of beneficiaries)	2	3
Valid complaints: (valid complaints x 1 000 ÷ no of beneficiaries)	1.5	2.5
Non-payment: (non-payment x 1 000 ÷ no of beneficiaries)	1	1
Other: (other x 1 000 ÷ no of beneficiaries)	0.5	1.5
Contribution to index		
All Reported: (all reported x 10* ÷ 4**)	5	7.5
Valid complaints: (valid complaints x 30 ÷ 3)	15.0	25.0
Non-payment: (non-payment x 60 ÷ 2)	30.0	30.0
Complaints Index		
Complaints Index	50.0	62.5
Complaints Capital Requirement		
Capital Requirement: 2% + Complaints Index * (6% - 2%)	4.00%	4.50%

- Reserve requirement will be set in-line with number of complaints and nature of complaints

RBC Framework

Operational Risk - Compliance

- Reserves requirement will range from 3% to 9% (illustrative figures only)
- A scheme inspection broadly covers areas listed below:

Compliance Field	No of Sub-fields
1) Board of Trustees	13
2) The Administrator	4
3) MHO	3
4) Brokers	3
5) Contracts	8
6) Non Health Expenditure	1
7) Scheme Rules	6
8) Complaints	6
9) Website	2
10) Audit Committee	2
11) Savings Balance	3
12) Annual General Meetings & Other Meetings	4
13) Investments	5
14) Principal Officer	3

- After an inspection, the inspector fills in a form indicating each scheme is compliant per each sub-field
- This is used to calculate a score for the scheme
- A high score indicates higher levels of non-compliance and the converse applies

RBC Framework

Operational Risk - Compliance

- Reserves per asset class are calculated as follows:

Scheme	A	B
Inspection report		
Worst possible Compliance Score	316	304
Sum of Actual Compliance Scores	50	80
Compliance index		
Complaints Index (Sum of Actual Compliance Scores ÷ Worst Possible Compliance Score) x 100	15.8	26.3
Complaints Capital Requirement		
Capital Requirement 3% + Compliance Index * (9% - 3%)	3.95%	4.58%

- Reserves will be lower for a scheme with a lower score –a scheme that is more compliant

RBC Framework

Operational Risk

Impact of calculation

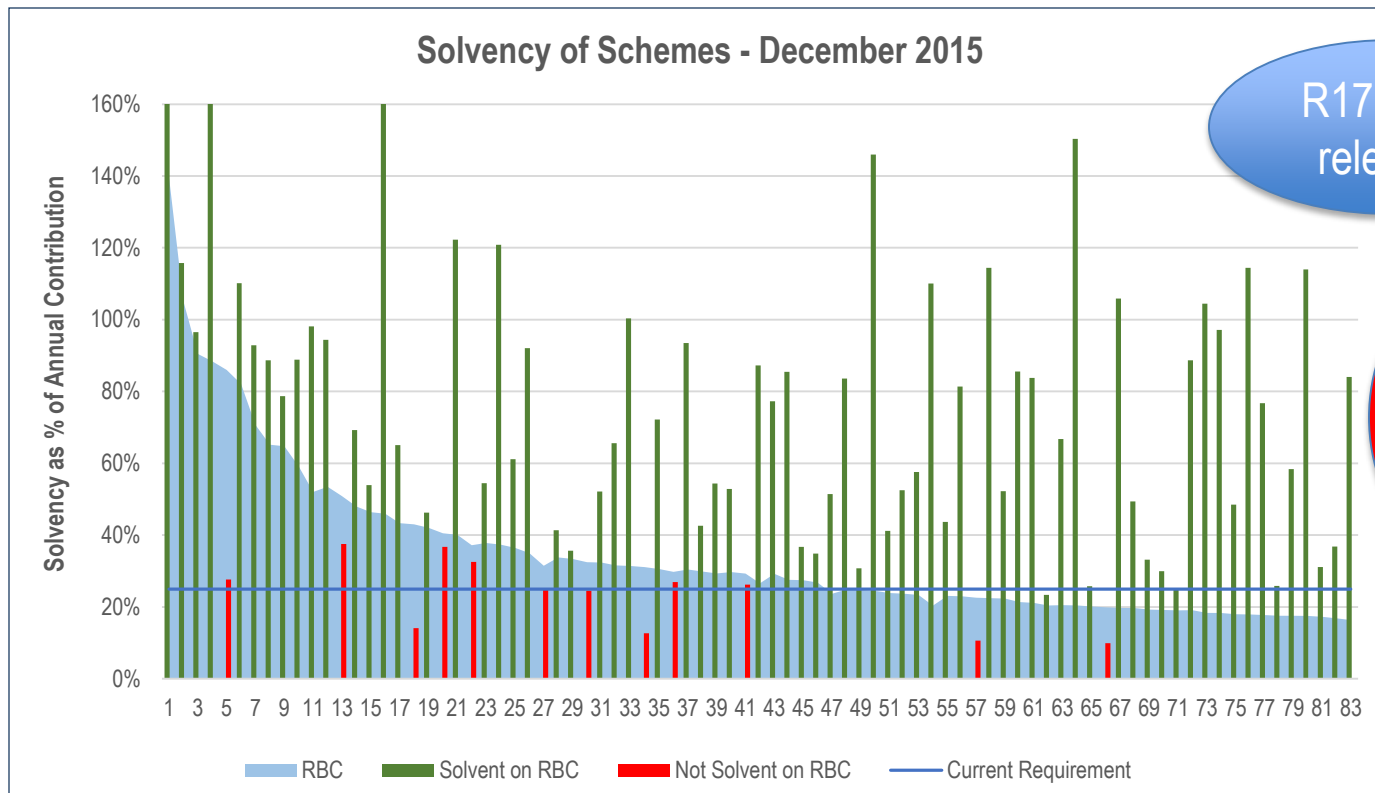
- A scheme with higher operational inefficiencies as measured by the indices will be required to keep more capital

Behaviour modification

- A scheme will be more proactive in management of complaints – simplify the process for beneficiaries
- The regulator may receive less complaints
- A scheme would pay more attention to governance structure as this would be credited in the reserve calculation
- Less resistance to inspections by the regulator
- Should encourage more transparency

RBC Framework

Solvency of schemes



- The RBC reserves above are very conservative as they assume maximum amount risk i.r.o. compliance index
- They RBC calculation also indicates that some schemes are taking on more risk than they should

Responses to circular 68 of 2015

Introduction

Major Themes

Business risk

Asset risk

Operational Risk

Comments on Solvency Review

- CMS received 18 comments on Circular 68 of 2015
- Organisations:
 - 1 Hospital Group
 - 2 Administrators
 - 6 Consulting & Actuarial firms
 - 9 Medical schemes

Comments on Solvency Review

- Support review and a RBC framework
- Governance
- Managed Care Organisations
 - i. Additional requirement to hold reserves to reduce the reserves held by schemes
 - ii. Loading scheme's capital requirement for risk of default by MCO
- Medical Savings Accounts

Comments on Solvency Review

- **Business Risk**

- i. Benchmark against other industries (1% probability of ruin vs 0.5%)
- ii. Claims ratio (including savings or not)
- iii. Average claims ratio of previous 3 years may not be representative of the future
- iv. Monthly Cash flow projections vs a formula based approach vs development of “In-house” models
- v. Split scheme type as well as scheme size

Comments on Solvency Review

- **Asset Risk**
 - i. Increase number of asset classes
 - ii. Reduce maximum loss period from 12 to 3 months
 - iii. Include derivatives in determining capital requirements
- **Operational Risk**
 - i. Index for complaints and level of compliance
 - ii. Operational Risk management Framework (ORMF) should be a requirement for all schemes
- **Other Risks**
 - i. Catastrophe risk, contribution risk
 - ii. Economic capital requirements

Comments on Solvency Review

- Features of the desired model/framework
 - i. Equitable, simple, reliable, consistent and financially efficient
 - ii. Early warning system
 - iii. Consider risk management systems already in place, inter-dependencies between risks, identify all the significant financial risks
 - iv. Rand amounts instead of percentages
 - v. Combine projections with retrospective analysis
- CMS should not re-invent the wheel

Comments on Solvency Review

- Implementation
 - i. Resources, Costs
 - ii. Systems
 - iii. transitional arrangements

Comments on Solvency Review

Workshop with Council

- Comments from Council workshop
 - i. Include complaints received at the scheme & include speed of resolution
 - ii. Carry out sensitivity analysis
 - iii. Pilot framework before implementation

Project Map & expected timelines

Introduction

Refinement of RBC framework

Testing and further refinement

Parallel implementation

Regulatory reforms

Introduction

- Transition from one framework to another is not a once off event – it's a journey
- The CMS will continue with the research & development
- This will have to involve extensive stakeholder engagement
- We are open to any ideas that are credible and will improve the framework

Refinement of framework

- It involves stakeholders working together – no one can do it alone
- Need to construct a suitable framework for South African Medical Schemes
- Need to consult widely with stakeholders to ensure we are all on the same page – should be developed most for-see-able circumstances
- Framework should limit scope for abuse



Maybe 2 years to refine
framework

Testing of framework

- Once framework is developed - period of testing and refinement
- Will enhance learning of participants – medical schemes and the regulator as well



Maybe 2 years to test framework

Parallel Implementation

- For such a major change implementation should be phased
- Key considerations is dealing with management of reserves:
 - i. Those with excess reserves – set up a plan for managing this down to required level
 - ii. Schemes below reserving requirement – set up a process to allow such schemes to build up reserves



Maybe 2 years for
parallel implementation

Regulatory reforms

- Once we are satisfied the developed framework works, regulatory reforms would be necessary

Involvement of Stakeholders

- Various working groups to refine framework
- Working Groups could tackle
 - i. Business Risk
 - ii. Asset Risk
 - iii. Operational Risk
 - iv. Impact assessment (*transitional arrangements; implementation e.t.c.*)
- We will invite nominations to join working groups

Conclusion

Thank You