IFRS 17

Will you be ready for 2021?
IFRS 17 Working Party

Laura Barella, PwC
Helen Cooper, Hiscox

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Overview

- Objectives

- Background

- Technical Overview

- The Premium Allocation Approach (PAA)

- The Building Block Approach (BBA)

- Next Steps

Objectives of today

#1	Increase awareness and encourage engagement
#2	Understand key elements of the IFRS 17 exposure draft
#3	Create a common language to enable discussions
#4	Highlight areas of uncertainty, difficulty and areas of focus
#5	Encourage discussions around potential challenges for you

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IFRS 17 - what, why and how?

What?

- New accounting standard for valuation of insurance contracts for both Life and General Insurers…it's different to current accounting and Solvency II.

- Publication of the IFRS 17 insurance contracts standard expected May 2017, with an effective date of 1 January 2021.

- Will impact all current IFRS reporters immediately from implementation.

- The impact will vary by firm depending on the business you write and the level of maturity of your business processes.

- UK accounting rules likely to change as well ... so will impact virtually all in the UK in time.

Why?

- Current IFRS 4 Insurance Contracts Standard is only an interim Standard => diverse practice and differing treatments

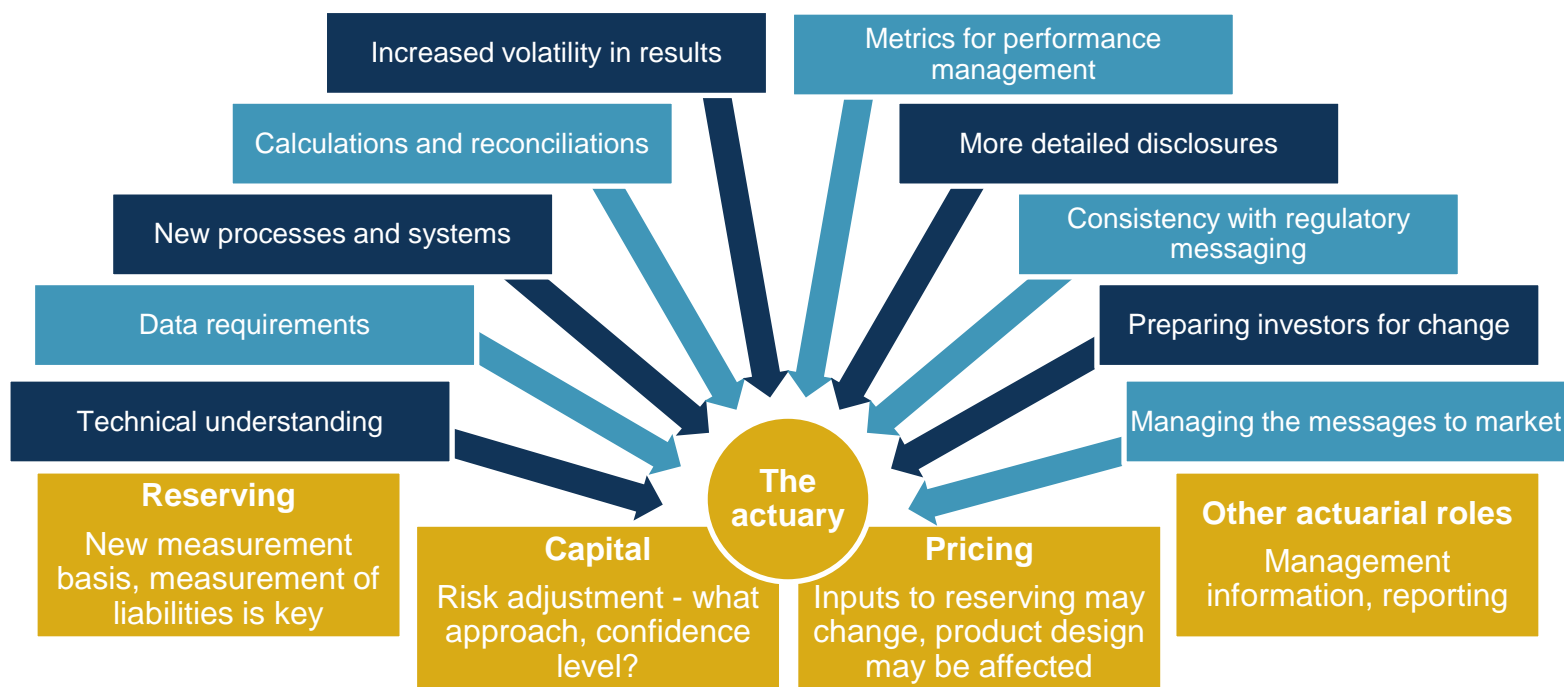- Comparisons are difficult for different products, companies and jurisdictions

How?

- Global insurance Standard

- IASB wants consistency across industry and consistent accounting for all insurance contracts by all companies

- IASB intention is to have one Building Block Approach (BBA) for all contracts

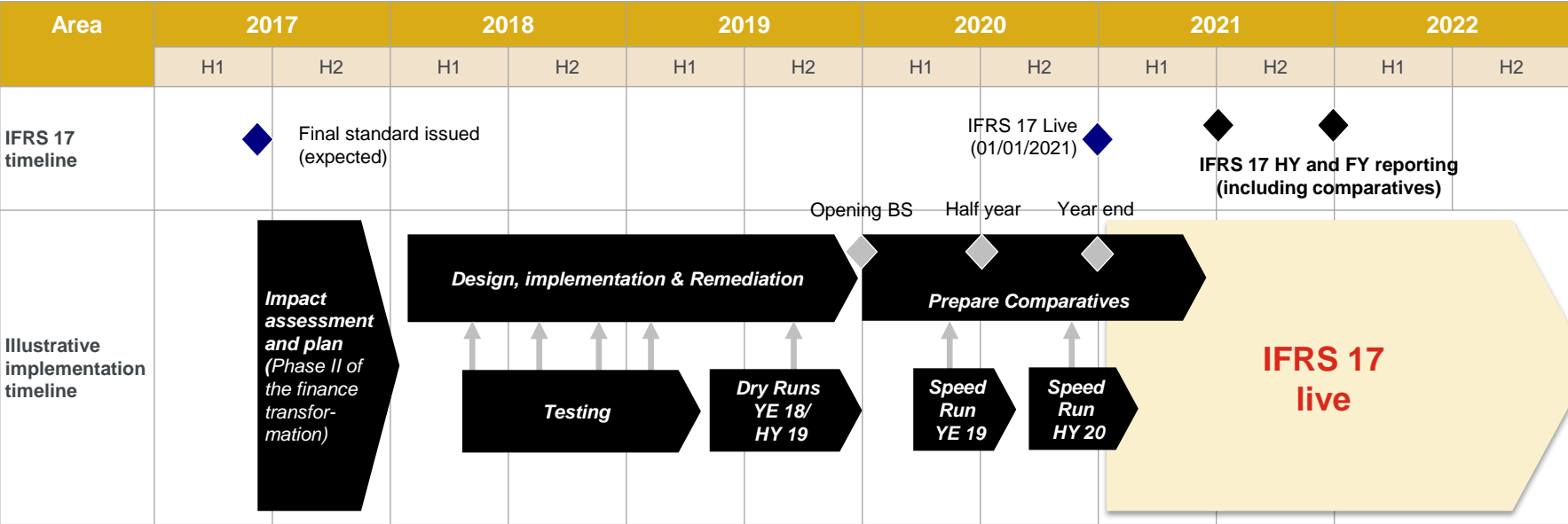- IASB believes market-consistent approach provides best information

For General Insurance:

- Current GI model not considered 'broken'

- Request from general insurers to develop simplified model => Premium Allocation Approach (PAA)

- PAA should be an approximation of the BBA

- Can only be used under certain circumstances = > This leads to potential issues around PAA eligibility for multi-year contracts
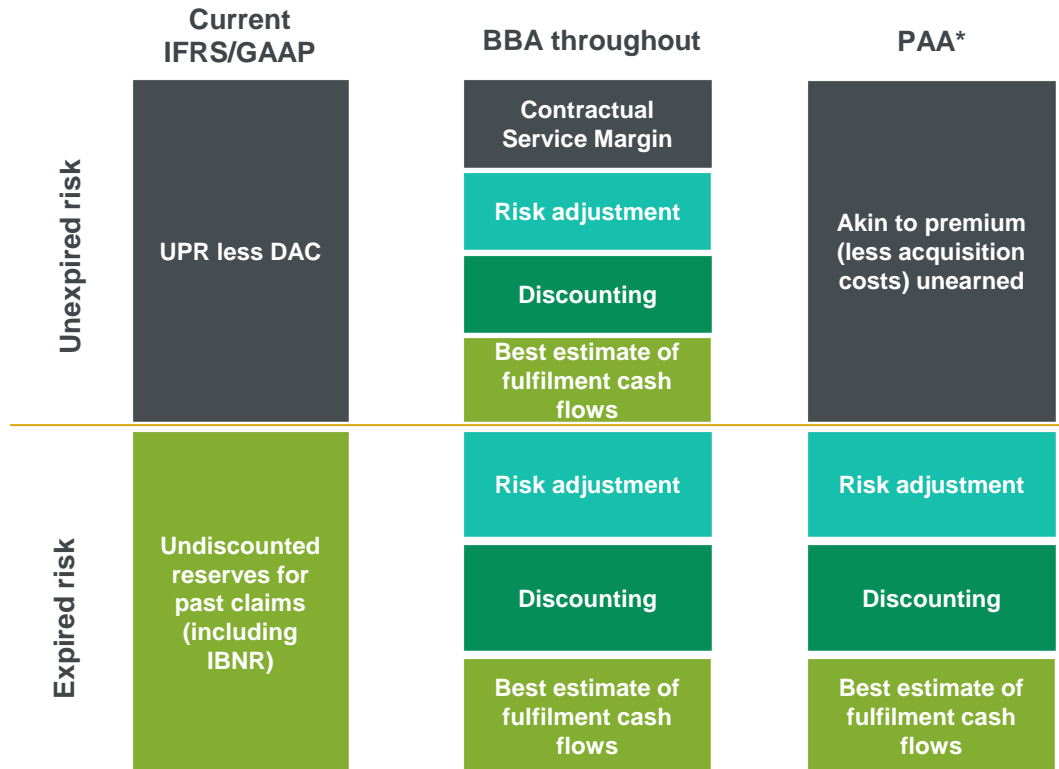
Why is this such a big deal?

Increased volatility in results

Metrics for performance management

Calculations and reconciliations

More detailed disclosures

New processes and systems

Consistency with regulatory messaging

Data requirements

Preparing investors for change

Technical understanding

Managing the messages to market

The actuary

Reserving
New measurement basis, measurement of liabilities is key

Capital
Risk adjustment - what approach, confidence level?

Pricing
Inputs to reserving may change, product design may be affected

Other actuarial roles
Management information, reporting

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IFRS 17 timeline

Area	2017		2018		2019		2020		2021		2022	
	H1	H2	H1	H2	H1	H2	H1	H2	H1	H2	H1	H2

IFRS 17 timeline

Final standard issued (expected)

IFRS 17 Live (01/01/2021)

IFRS 17 HY and FY reporting (including comparatives)

Illustrative implementation timeline

Opening BS   Half year   Year end

Impact assessment and plan (Phase II of the finance transformation)

Design, implementation & Remediation

Prepare Comparatives

Testing

Dry Runs YE 18/ HY 19

Speed Run YE 19

Speed Run HY 20

IFRS 17 live

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IFRS 17 Technical Overview

Overview:

- General measurement model known as the Building Block Approach (BBA)

- Simplifications exist for eligible contracts:
  – Premium Allocation Approach (PAA) for unexpired risk component
  – PAA with undiscounted expired risk

- Recognition of contracts - earliest of start of coverage and premium receipt (plus onerous contract test)

- Applies to outwards reinsurance too

- More granularity required

- Detailed disclosure requirements

There is also a fourth option, but very few insurers will be eligible

	Current IFRS/GAAP	BBA throughout	PAA*
Unexpired risk	UPR less DAC	Contractual Service Margin / Risk adjustment / Discounting / Best estimate of fulfilment cash flows	Akin to premium (less acquisition costs) unearned
Expired risk	Undiscounted reserves for past claims (including IBNR)	Risk adjustment / Discounting / Best estimate of fulfilment cash flows	Risk adjustment / Discounting / Best estimate of fulfilment cash flows

Size of boxes for illustrative purposes only. Specific conditions must be met for PAA (*)

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The Premium Allocation Approach (PAA)

The premium allocation approach is **a simplification** that can be used as an alternative to the building block approach. It only applies over the coverage period, not over the settlement period. Use of the premium allocation approach is **an option which is permitted for contracts with coverage of one year or less** or otherwise where the insurer can **demonstrate it is a reasonable approximation to the building block approach.**
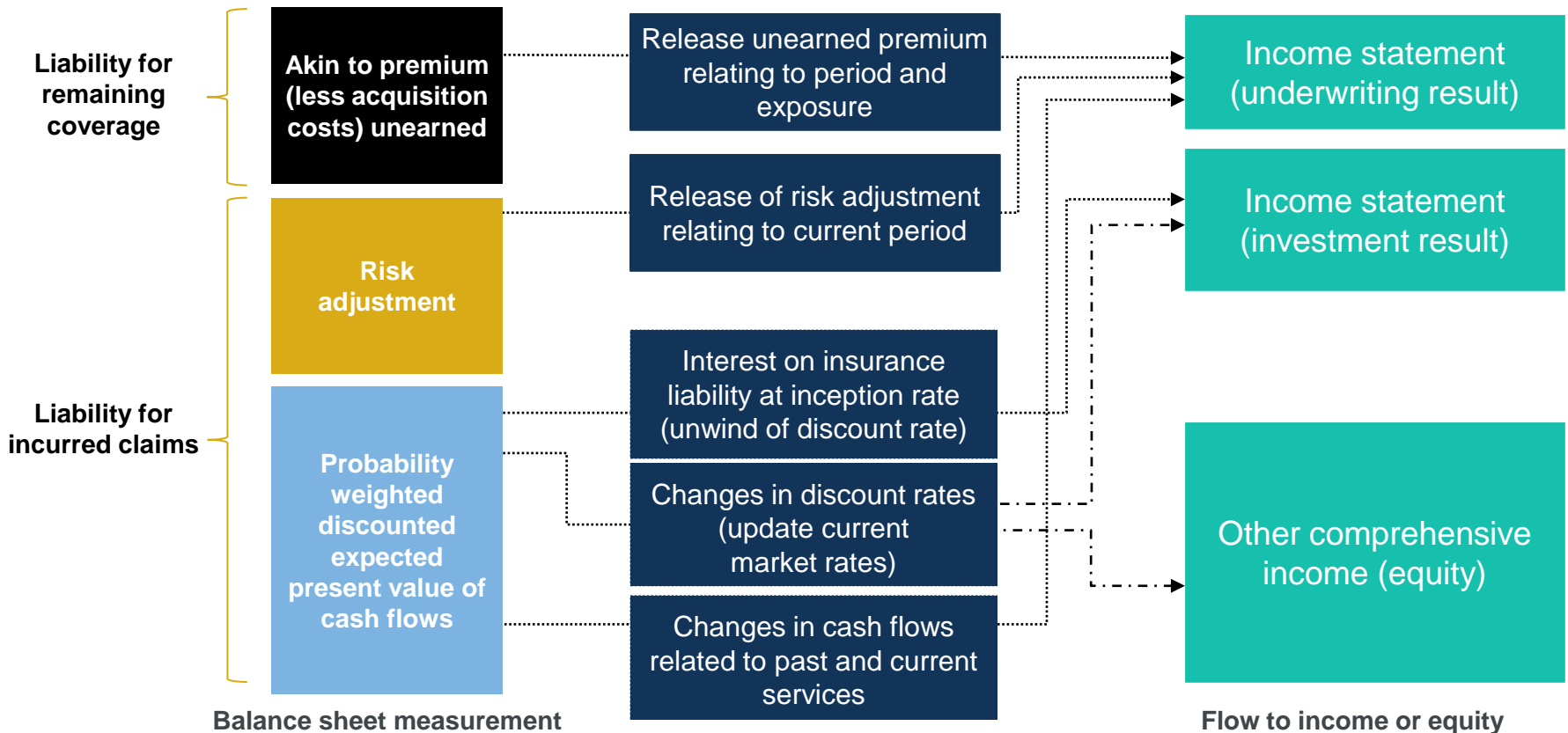
Liability for remaining coverage	**Akin to premium (less acquisition costs) unearned**	On initial recognition: **record a liability at the PV of premiums received, less acquisition costs, plus any onerous contract liabilities** (if sum of future cash flows > 0) and record an asset as the PV of premiums receivable. Subsequent measurement: **reduce the liability for passage of time ±** any changes in onerous contract liabilities from the previous period, reduce asset for receipt of premiums
Liability for incurred claims	**Risk adjustment**	An adjustment to reflect uncertainty in the estimate of future cash-flows. **No prescribed method** but confidence level needs to be disclosed.
	Discounting	Discount rate **not prescribed** but based on characteristics of the insurance liability (updated each reporting period) and consistent with observable current market inputs for instruments with similar cash flow characteristics.
	Best estimate of fulfilment cash flows	The estimates of cash flows used to determine the fulfilment cash flows shall include **all cash inflows and cash outflows** that relate directly to the fulfilment of the portfolio of contracts. These estimates shall be explicit, unbiased, probability-weighted and are updated at each reporting period.

Size of boxes for illustrative purposes only.

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Technical - Revenue recognition: PAA

Liability for remaining coverage

Liability for incurred claims

Akin to premium (less acquisition costs) unearned

Risk adjustment

Probability weighted discounted expected present value of cash flows

Release unearned premium relating to period and exposure

Release of risk adjustment relating to current period

Interest on insurance liability at inception rate (unwind of discount rate)

Changes in discount rates (update current market rates)

Changes in cash flows related to past and current services

Income statement (underwriting result)

Income statement (investment result)

Other comprehensive income (equity)

Balance sheet measurement

Flow to income or equity

⊶ ⊶ → Elected options

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The Building Block Approach (BBA)

The building block approach is the standard measurement model

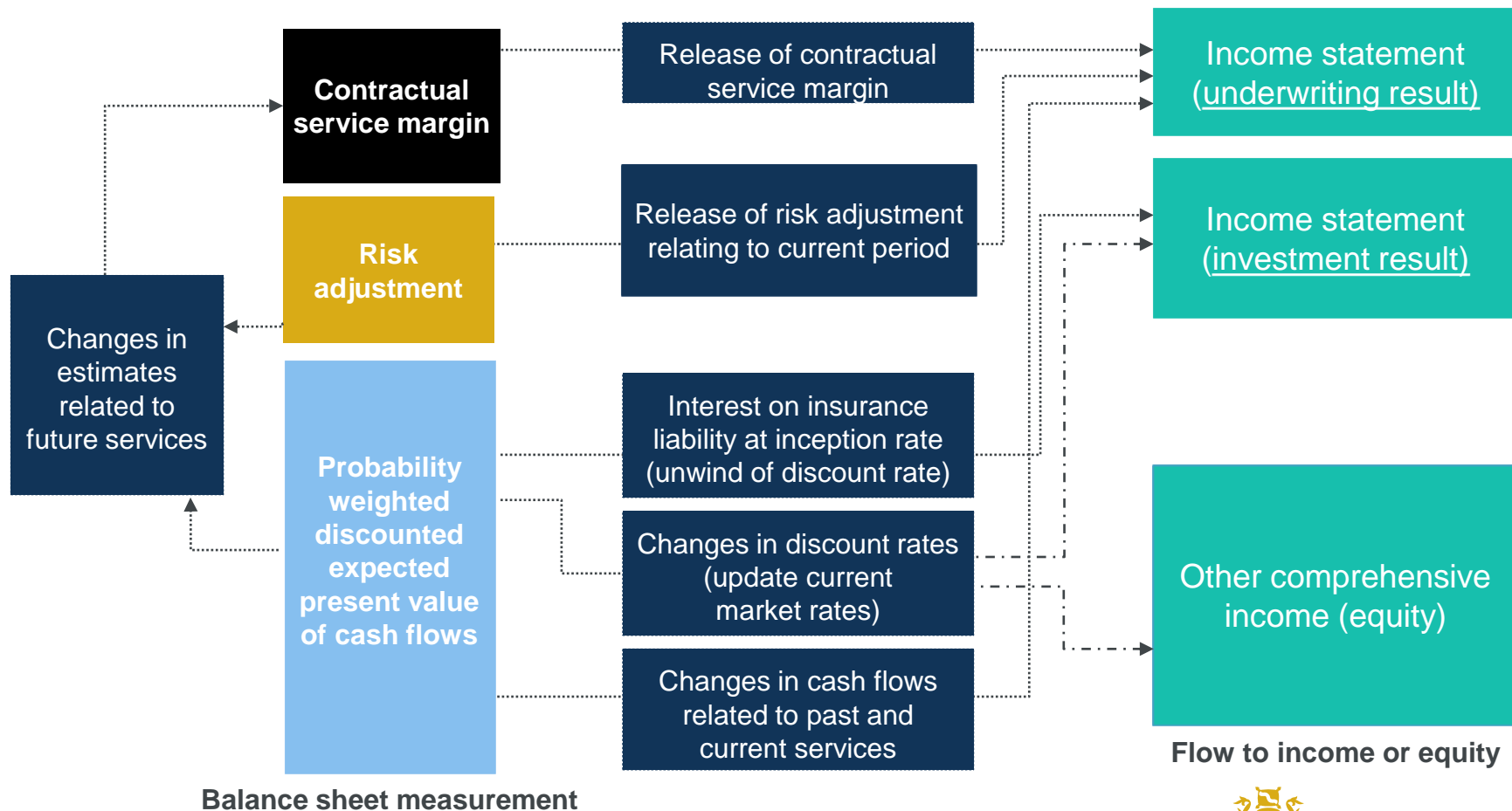|		
Unexpired risk only	**Contractual Service Margin**	Contractual service margin (CSM) **eliminates the recognition of any future accounting profit at inception.** CSM cannot be negative, i.e. the present value of losses must be charged immediately to profit or loss. Amortised over remaining coverage period in a straight line.
Expired and unexpired risk	**Risk adjustment**	An adjustment to reflect uncertainty in the estimate of future cash-flows. **No prescribed method** but confidence level needs to be disclosed.
	Discounting	Discount rate **not prescribed** but based on characteristics of the insurance liability (updated each reporting period) and consistent with observable current market inputs for instruments with similar cash flow characteristics.
	Best estimate of fulfilment cash flows	The estimates of cash flows used to determine the fulfilment cash flows shall include **all cash inflows and cash outflows** that relate directly to the fulfilment of the portfolio of contracts. These estimates shall be explicit, unbiased, probability-weighted and are updated at each reporting period. Includes **onerous contract liabilities.**

Same as expired risk for PAA
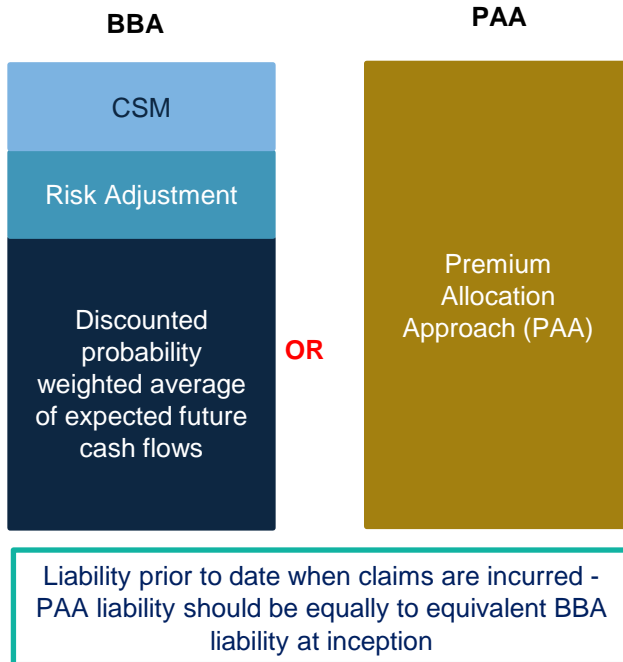
Size of boxes for illustrative purposes only.

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Technical - Revenue recognition: BBA

Balance sheet measurement

Changes in estimates related to future services

Contractual service margin

Risk adjustment

Probability weighted discounted expected present value of cash flows

Release of contractual service margin

Release of risk adjustment relating to current period

Interest on insurance liability at inception rate (unwind of discount rate)

Changes in discount rates (update current market rates)

Changes in cash flows related to past and current services

Income statement (underwriting result)

Income statement (investment result)

Other comprehensive income (equity)

Flow to income or equity

- - - - ► Elected options

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BBA or PAA?

PAA is permitted for annual (or less) contracts, or when the PAA provides a reasonable approximation to the BBA

BBA

| CSM |
| Risk Adjustment |
| Discounted probability weighted average of expected future cash flows |

OR

PAA

Premium Allocation Approach (PAA)

Liability prior to date when claims are incurred - PAA liability should be equally to equivalent BBA liability at inception

- Permitted for all contracts with maximum coverage of 1 year.
- Not permitted for contracts where there is a risk of high variability of future cash flows in the pre-claims period.
- There are differences to treatment of acquisition costs in PAA compared with current UPR.
- Still need to apply BBA to post claims liabilities.
- The PAA method allows firms to make changes to existing UPR process rather than implementing new measurement model.

PAA provides a practical option to reduce implementation costs for general insurers

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Unit of Account and Onerous Contracts

Step 1: Identify portfolios
= *insurance contracts subject to similar risks and managed together as a single pool*

Contracts in different products lines would be in different portfolios.

Step 2: Divide each portfolio into groups:
- *contracts issued within the same 12-month period*
- *information about the contracts' resilience*
- *consistent with internal reporting*
- *exemption for regulatory pricing*
- *group not reassessed after inception*

Onerous contracts	(A) Contracts that are onerous at inception, if any	A loss is recognised in P/L
Non-onerous contracts	(B) Contracts that at inception have no significant possibility of becoming onerous subsequently, if any	Unearned profit is recognised as liability and is released as insurance services are provided
	(C) Other profitable contracts, if any	

Impact:

- Current AURR requirements consider businesses 'managed together' => broad groupings with profitability of underlying lines of business offsetting each other and reducing the likelihood of needing an AURR.

- Under IFRS 17 onerous contracts need to be identified at initial recognition and offsetting profitable contracts with unprofitable ones is not permitted. This is far more granular than the current onerous contracts test **=> *significantly increases the likelihood of requiring an onerous contract reserve***

Key choices for General Insurers

		Balance Sheet	Income Statement
1	**Premium Allocation Approach or Building Block Approach**	Insurance contract liabilities – unexpired (aka "UPR") Reinsurance assets - unexpired	Insurance contract revenue Reinsurance expense
2	**Risk Adjustment – policy, method and assumptions**	Insurance contract liabilities – • expired coverage • unexpired when BBA used • onerous contracts (unexpired on PAA and unincepted) Reinsurance assets	Insurance contract revenue Reinsurance expense
3	**Discounting – managing asset and liability mismatches**	Insurance contract liabilities • expired coverage • unexpired when BBA used • onerous contracts (unexpired on PAA and unincepted) Reinsurance assets Financial Assets	Insurance contract revenue Reinsurance expense Discount unwind expense – through profit and loss Changes in discount rates – through OCI

IMPACT		
Data, systems, processes and controls	Financial: balance sheet and profit	Understanding and communication

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IFRS 17 project timeline

The ideal timeline for implementing IFRS 17 will depend on the complexity of the changes required to the underling systems and processes for financial reporting.

Focus for 2017

- Identify and agree key design decisions

- Deep dive in operational and financial impact of key design decisions

- Define systems and data requirements

- Design target state operating model and gaps from current state

- Develop implementation plan and business case

Don't forget lessons learned from Solvency II…

Silos need to be broken - Actuaries need to be integrated and integral to Finance process	Leaving things to the last minute can be expensive and painful	Technical issues can be surprisingly time consuming
Controls and documentation need to be updated	Reconciliations can be time consuming	Train, train and train again

Big business decisions

Simplified measurement model (PAA)

Will all your products qualify? Even then, do you want to use it?

Systems implementation

Can you leverage your current systems? Save time, effort and costs now by integrating IFRS 17 implementation plans into existing systems upgrades

Performance measurement

New KPIs will be critical for day to day business management right through to investor communications. What will they look like?

Financial reporting and disclosure

Greater level of detail (e.g. reconciliations and confidence level). How do you want to be seen to the market?

Actuarial, Risk and Finance Modernisation

Greater collaboration, understanding, knowledge sharing will be required. How streamlined are you?

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Get involved…!

How does this impact the company you work for?	What is the operational impact (data, systems, processes, people)?	Is there a working group already set up in your company? Who is on that?	Are there projects already underway to transform finance / actuarial processes? Are they thinking about IFRS17?

Stakeholder management *Knowledge*	• Increase awareness • Technical training

Impact studies *Identify hot spots*	• Financial and operational impact assessment • Assessment of system, modelling, data flow and process implications • Product assessment – establish PAA eligibility • Identify relevant existing and planned projects to leverage

Implementation planning *Plan for a plan*	• Identify key stakeholders and create project governance structure • Cost estimation for business case • Search for skilled resources • Detailed impact assessment across your business

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Where to find out more…!

- IASB website publishes lots of detail on Board deliberations, there is also a series of webinars delving into the different elements of the standard http://www.ifrs.org/Current-Projects/IASB-Projects/Insurance-Contracts/Pages/Insurance-Contracts.aspx

- IFoA working party papers, industry events:
    - GIRO 2016:
        - https://www.actuaries.org.uk/documents/plenary-4-managing-gi-business-it-becoming-different-ifrs-4-phase-ii-laura-barella-and-graeme
        - https://www.actuaries.org.uk/documents/a6-ifrs-4-phase-ii-will-you-be-ready-2021

- Standard to be published in May 2017…

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Questions

Comments

Expressions of individual views by members of the Institute and Faculty of Actuaries and its staff are encouraged.

The views expressed in this presentation are those of the presenter.

Appendix

A comparison of different reporting bases
Worked examples

Different bases

Basis	Features
Current IFRS	• Wide variety of methods in current accounting treatment • Unearned Premium Reserve + Claims Outstanding* (including IBNR) (+ Equalisation Provision + Additional Unexpired Risk Reserve) • Usually undiscounted • Not necessarily a best estimate basis
Solvency II	• To provide enhanced security to policyholders • …by ensuring insurance companies have a robust approach to risk management • …and hold sufficient capital (based on those risks) to reduce the probability of failure to at least 1 in 200 in a one-year timeframe across the EU • Immediate recognition of profit • Best estimate basis, discounted cashflow approach • Claims provision + premium provision + risk margin
IFRS 17	• To ensure that the presentation of the accounts for insurance companies is consistent with the approach used for other non-insurance companies globally • …and thus to enable investors etc. to compare all types of companies on a like-for-like basis • No gain on policy inception but losses must be recognised immediately => recognition of profit deferred until earned • Best estimate basis with an allowance for risk

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IFRS 17 vs Solvency II

Topic	IFRS 17	Solvency II
Recognition	Earliest of start of coverage and premium receipt (plus onerous contract test)	Date party to contract
Measurement model	Building Block Approach (BBA), or Premium Allocation Approach (PAA) for eligible contracts	No choice
Discount Rate	Company specific, principles based	Prescribed
Risk Allowance	Risk Adjustment - no prescribed method	Risk Margin - prescribed 6% cost of capital
Contractual Service Margin	Eliminates day-one gain (measure of unearned profit)	No similar concept
Other Comprehensive Income (optional)	Removes impact of discount rate changes from P&L	No similar concept

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PAA - worked example

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- A claim is expected at the end of each year of coverage => i.e. uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum (assumed not to change)*
- Investment return of 5% per annum on the premium that is invested

*This example does not assume any changes in the discount rate. If there were changes in the discount rate, the insurer could choose to present the changes in the investment activity that are related to the effect of the changes in the discount rate in other comprehensive income.

Source: http://www.ifrs.org/Current-Projects/IASB-Projects/Insurance-Contracts/Documents/2015/Insurance-Contracts-without-Participation-Features-March-2015.pdf

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Liabilities (PAA)

On initial recognition, the liability for the remaining coverage = premiums received under the contract, less any acquisition costs paid.

For t_1 = - (A + B) / 2 since it is half way through the contract and so release half now to P&L (assuming uniform risk).

For t_1 = fulfilment cashflows of 444 /2 (i.e. half of the t_1 fulfilment cash flows from BBA which related to the expired exposure).

Recognised in total comprehensive income = 3% of balance at beginning of period (i.e. unwind of discount).

For t_2 = - (A + B) => remainder is released to P&L.

Coverage period has ended => balance is zero from here.

Liability for remaining coverage	t_0	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period (A)	-	(500)	(258)	-	-	-
Interest accretion (B)	-	(15)	(8)	-	-	-
Amounts recognised in profit or loss	-	258	265	-	-	-
Balance at end of period	(500)	(258)	-	-	-	-

Liability for incurred claims	t_0	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period (C)	-	-	(222)	(458)	(471)	(485)
Interest accretion	-	-	(7)	(14)	(14)	(15)
Claims incurred (D)	-	(222)	(229)	-		-
Balance at end of period	-	(222)	(458)	(471)	(485)	(500)

Insurance Contract Liability	t_0	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period	-	(500)	(480)	(458)	(471)	(485)
Balance at end of period	(500)	(480)	(458)	(471)	(485)	(500)

Total interest accretion (=interest expense)	t_0	t_1	t_2	t_3	t_4	t_5
Interest accretion	-	(15)	(14)	(14)	(14)	(15)

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Profit and Loss (PAA)

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Assets	t_1	t_2	t_3	t_4	t_5	Total
Balance at beginning of period	500	525	551	579	608	500
Interest accretion	25	26	28	29	30	138
Balance at end of period	525	551	579	608	638	638

Premium is invested and earns 5% interest per year.

Profit or loss	t_1	t_2	t_3	t_4	t_5	Total
Insurance revenue	258	265	0	0	0	523
Claims incurred	(222)	(229)	0	0	0	(451)
Underwriting result	*35*	*36*	*0*	*0*	*0*	*72*
Interest income	25	26	28	29	30	138
Interest expense	(15)	(14)	(14)	(14)	(15)	(72)
Investment result	*10*	*12*	*14*	*15*	*16*	*66*
Profit or loss	**45**	**48**	**14**	**15**	**16**	**138**

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BBA - worked example (scenario A)

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- A claim is expected at the end of each year of coverage => i.e. uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum (assumed not to change)*
- Investment return of 5% per annum on the premium that is invested

*This example does not assume any changes in the discount rate. If there were changes in the discount rate, the insurer could choose to present the changes in the investment activity that are related to the effect of the changes in the discount rate in other comprehensive income.

Source: http://www.ifrs.org/Current-Projects/IASB-Projects/Insurance-Contracts/Documents/2015/Insurance-Contracts-without-Participation-Features-March-2015.pdf

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At inception immediately before premium is paid (BBA)

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Premium to be paid immediately after inception.

Component	Nominal amount	Present Value
Expected inflows	500	500
Expected outflows	(500)	(431)
Net expected cash flows		69
Risk adjustment		0
Fulfilment cash flows		*69*
Contractual Service Margin		(69)
Insurance contract asset/liability		*0*

£500 of claims expected to be paid immediately after end of year 5 discounted back to start of coverage period (i.e. 500 * 1.03^-5).

Assumed to be zero in this example.

No profit can arise at inception, it is instead recognised over the coverage period when the service is provided.

At inception, before premium is due, the value of the insurance contract is zero. For onerous contracts, there would be no CSM and a loss is recognised instead.

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At inception immediately after premium is received (BBA)

Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Immediately after the contract is issued, the first premium is received. Assets and liabilities both increase by 500.

Component	Nominal amount	Present Value
Expected inflows	0	0
Expected outflows	(500)	(431)
Net expected cash flows		(431)
Risk adjustment		0
Fulfilment cash flows		*(431)*
Contractual Service Margin		(69)
Insurance contract asset/liability		*(500)*

Premium has been paid.

As calculated previously.

Difference between what the insurer has received and what it still needs to provide, i.e. received £500 cash but hasn't provided any service or paid any claims.

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Subsequent measurement (BBA)

£500 total expected claim discounted back to each point in time. The expected cash flows equal the fulfilment cash flows, because the risk adjustment equals zero.

Recognised in total comprehensive income = 3% of balance at beginning of period (i.e. unwind of discount).

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Fulfilment cash flows	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period	(431)	(444)	(458)	(471)	(485)
Interest accretion	(13)	(13)	(14)	(14)	(15)
Balance at end of period	(444)	(458)	(471)	(485)	(500)

£500 paid immediately after end of year 5.

For t_1 this is as per previous slide.

For t_1 = - (A + B) / 2 since it is half way through the contract and so release half now to P&L (assuming uniform risk).

Contractual Service Margin	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period (A)	(69)	(35)	0	0	0
Interest accretion (B)	(2)	(1)	0	0	0
Amounts recognised in profit or loss	35	36	0	0	0
Balance at end of period	(35)	0	0	0	0

Recognised in total comprehensive income = 3% of balance at beginning of period (i.e. unwind of discount).

For t_2 = - (A + B) => remainder is released to P&L.

Insurance Contract Liability	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period	(500)	(480)	(458)	(471)	(485)
Balance at end of period	(480)	(458)	(471)	(485)	(500)

Zero CSM after end of coverage period.

Total interest accretion (=interest expense)	t_1	t_2	t_3	t_4	t_5
Interest accretion	(15)	(14)	(14)	(14)	(15)

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Profit and Loss (BBA)

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims of £500 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Assets	t_1	t_2	t_3	t_4	t_5	Total
Balance at beginning of period	500	525	551	579	608	500
Interest accretion	25	26	28	29	30	138
Balance at end of period	525	551	579	608	638	638

Premium is invested and earns 5% interest per year (same as under PAA example).

Profit or loss	t_1	t_2	t_3	t_4	t_5	Total
Underwriting result	*35*	*36*	*0*	*0*	*0*	*72*
Interest income	25	26	28	29	30	138
Interest expense	(15)	(14)	(14)	(14)	(15)	(72)
Investment result	*10*	*12*	*14*	*15*	*16*	*66*
Profit or loss	**45**	**48**	**14**	**15**	**16**	**138**

This is the release from the CSM during the coverage period.

Same result under BBA and PAA.

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BBA - worked example (scenario B)

Same as Scenario A except for **(a) a change in the expected cash flows <u>during</u> the coverage period** and **(b) a change in the expected cash flows <u>after</u> the end of the coverage period:**

a) Occurs shortly after the contract is written (during the coverage period) =>the insurer expects the cash outflows to be 530 rather than the initially expected 500 (i.e. an increase of 30, present value of 26).

b) Occurs immediately after the end of year 2 (after the coverage period has finished) => the insurer estimates an additional increase in the expected cash outflows of 20 (i.e. a further increase of 20, present value at the time of change equal to 18).

This example does not assume any changes in the discount rate. If there were changes in the discount rate, the insurer could choose to present the changes in the investment activity that are related to the effect of the changes in the discount rate in other comprehensive income.

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Liabilities (BBA)

Changes in estimates (a) during coverage period => fulfilment cash flows increase by 26 (discounted value of 30)

Change in estimates (b) after coverage period => fulfilment cash flows increase by 18 (discounted value of 20)

Interest accretion higher in all periods reflecting discount unwind on higher reserve amount.

For t_1 = - (A + B + C) / 2 since it is half way through the contract and so release half now to P&L (assuming uniform risk), resulting in a P&L recognition of 22 instead of 35 in the previous example.

For t_2 = - (A + B +C) => remainder is released to P&L.

The change in estimates (a) relates to future coverage, so the CSM will be decreased by 26. Consequently, a lower amount of the CSM is recognised in P&L than initially expected.

As the second change in estimates (b) occurs after the coverage period has finished there is no adjustment to the CSM, change is instead recognised immediately in P&L

Fulfilment cash flows	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period	(431)	(444)	(458)	(471)	(485)
Change in estimates	(26)	0	(18)	0	0
Interest accretion	(14)	(14)	(15)	(16)	(16)
Balance at end of period	(471)	(485)	(518)	(534)	(550)

Contractual Service Margin	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period (A)	(69)	(22)	0	0	0
Change in estimates (B)	26	0	0	0	0
Interest accretion (C)	(1)	(1)	0	0	0
Amounts recognised in profit or loss	22	23	0	0	0
Balance at end of period	(22)	0	0	0	0

Insurance Contract Liability	t_1	t_2	t_3	t_4	t_5
Balance at beginning of period	(500)	(493)	(485)	(518)	(534)
Balance at end of period	(493)	(485)	(518)	(534)	(550)

Total interest accretion (=interest expense)	t_1	t_2	t_3	t_4	t_5
Interest accretion	(15)	(15)	(15)	(16)	(16)

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Profit or Loss (BBA)

- Coverage period is 2 years
- Premium of £500 paid immediately after start of coverage
- Total claims expected:
  - At t_0: £500 paid immediately after end of year 5
  - At t_1: £530 paid immediately after end of year 5
  - At t_3: £550 paid immediately after end of year 5
- Uniform pattern of risk
- Risk adjustment assumed to be zero
- Expenses and acquisition costs assumed to be zero
- Discount rate of 3% per annum
- Investment return of 5% per annum

Assets	t_1	t_2	t_3	t_4	t_5	Total
Balance at beginning of period	500	525	551	579	608	500
Interest accretion	25	26	28	29	30	138
Balance at end of period	525	551	579	608	638	638

Premium is invested and earns 5% interest per year.

Profit or loss	t_1	t_2	t_3	t_4	t_5	Total
Underwriting result	22	23	(18)	0	0	26
Interest income	25	26	28	29	30	138
Interest expense	(15)	(15)	(15)	(16)	(16)	(76)
Investment result	10	11	12	13	14	62
Profit or loss	32	34	(6)	13	14	88

Under BBA this loss is a result of the change in assumptions (b) hits the P&L immediately.

Under BBA this is the release from the CSM during the coverage period.

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