

The \$28.4b question: What does the Outstanding Claims Liability mean for ACC?

Jonathan Nicholls
Head of Actuarial Services ACC

30 September 2013

Chatham House Rules



Aung San Suu Kyi at Chatham House. Creative Commons Photo by Leoboudv



Contents

- What does ACC do?
- What is the Outstanding Claims Liability?
- What are the key drivers of the OCL?
- What insights can we get from the OCL?

What does ACC do?

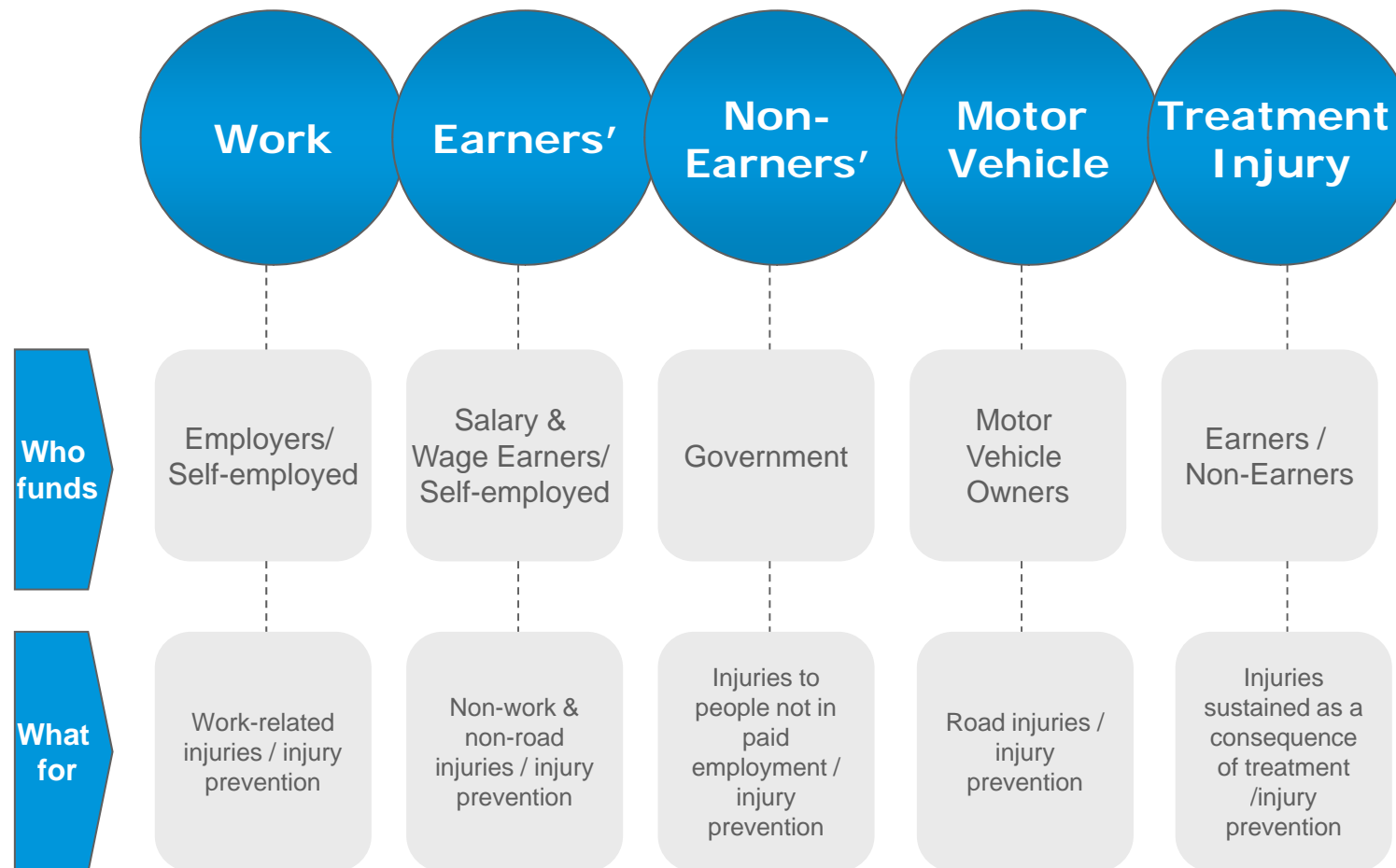


About ACC

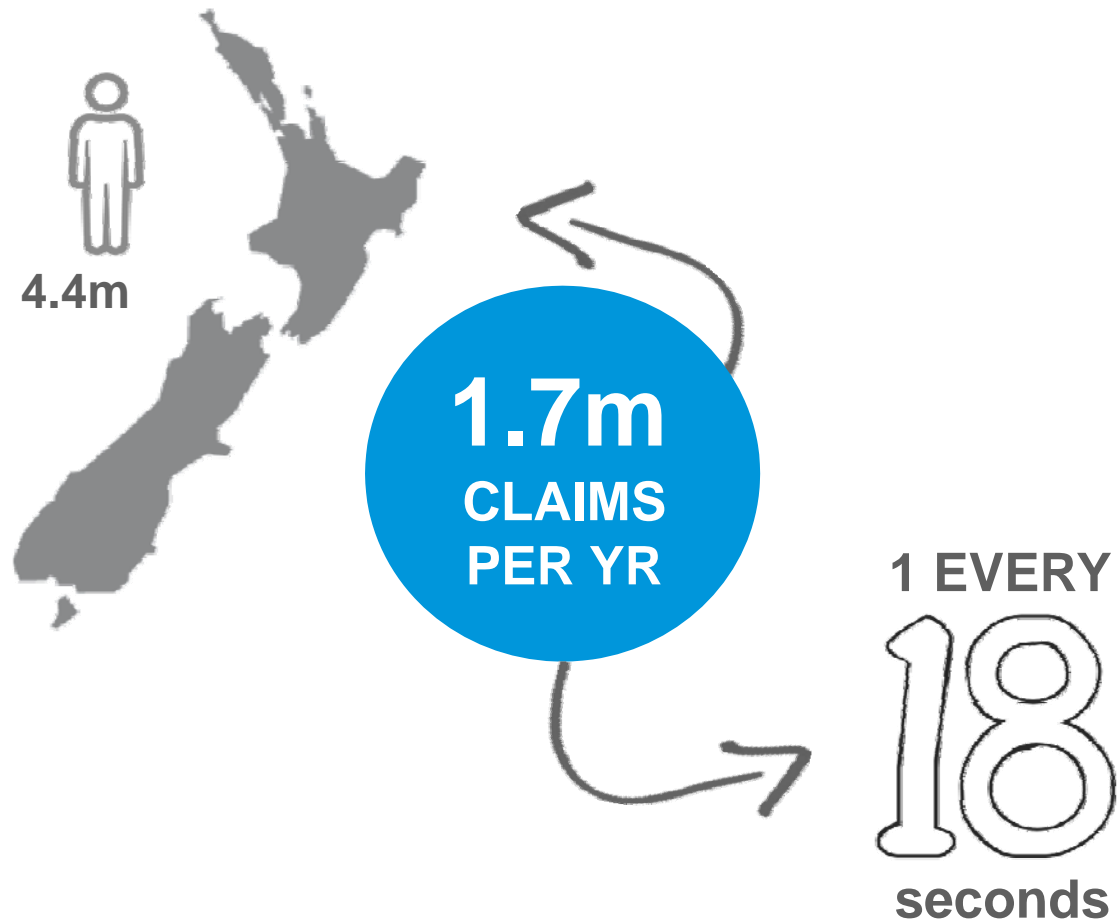
- Governed by the Accident Compensation Act 2001
- Comprehensive, no-fault personal injury cover for all New Zealand residents and visitors to New Zealand
- Funded by New Zealanders through five accounts



Cover is managed under five accounts



Claims volumes



*Correct as at May 2013

Impact of ACC

- Immediate treatment for injuries without worrying about treatment and legal costs.
- “Can do” culture



What is the Outstanding Claims Liability?

What is the Outstanding Claims Liability?

Estimate of the funds required now to meet the Scheme's future obligations.

It includes:

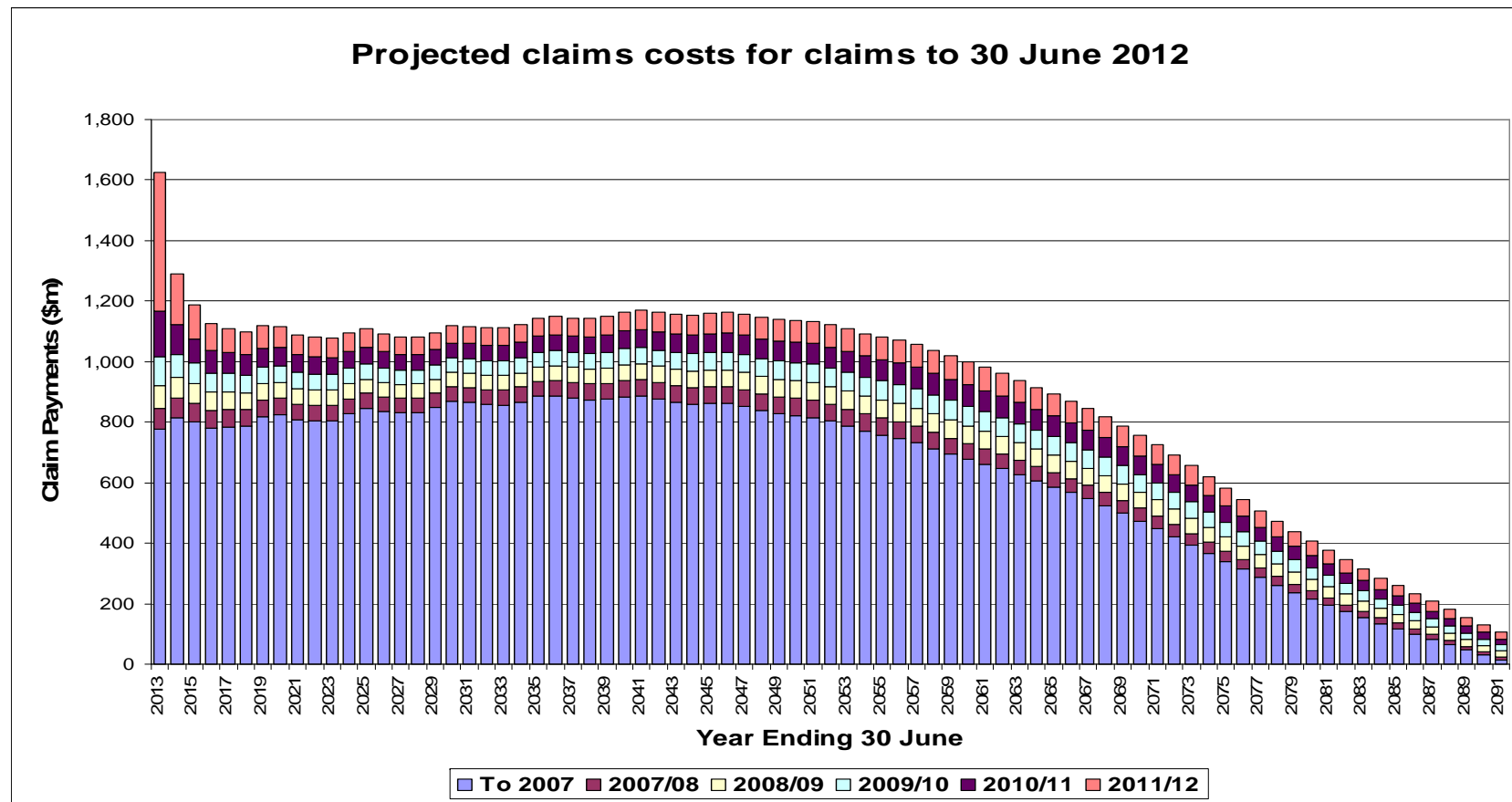
- all accidents up to the valuation date, including those not yet reported to ACC
- the possibility of 'closed' claims reopening
- allowance for future price/rate increases
- allowance for the 'time value of money'.

The OCL does not allow for possible legislative changes.

At 30 June 2012, OCL was \$28.4b.

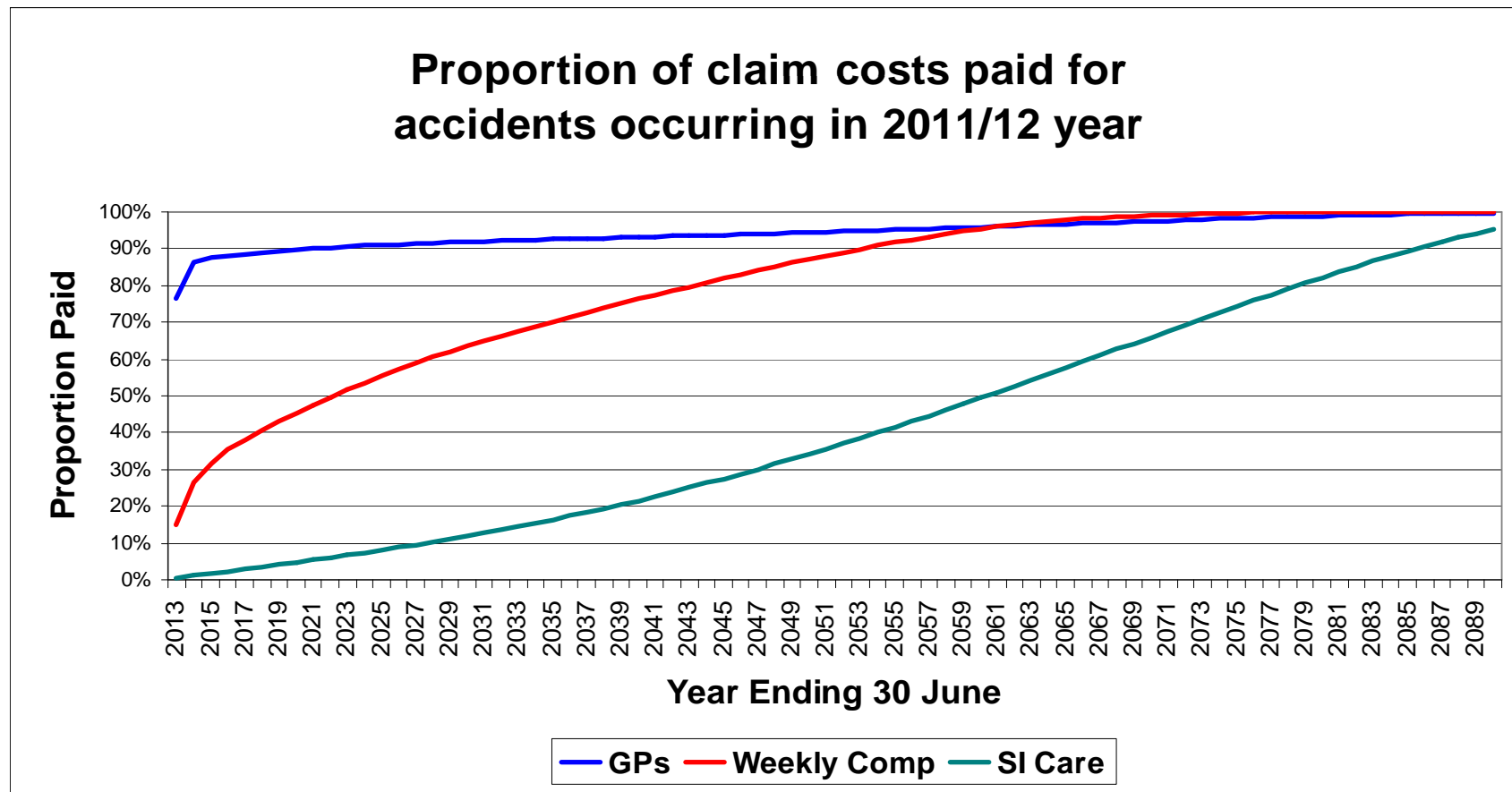
The Long tail of the OCL

- Runoff of OCL at 30 June 2012
- Can take over 80+ years before last payment made.



The Long tail of the OCL

Run off rate depends on payment type.



How is the OCL determined?

Determined by examining past claims experience (trends) and projecting into the future.

Allow for:

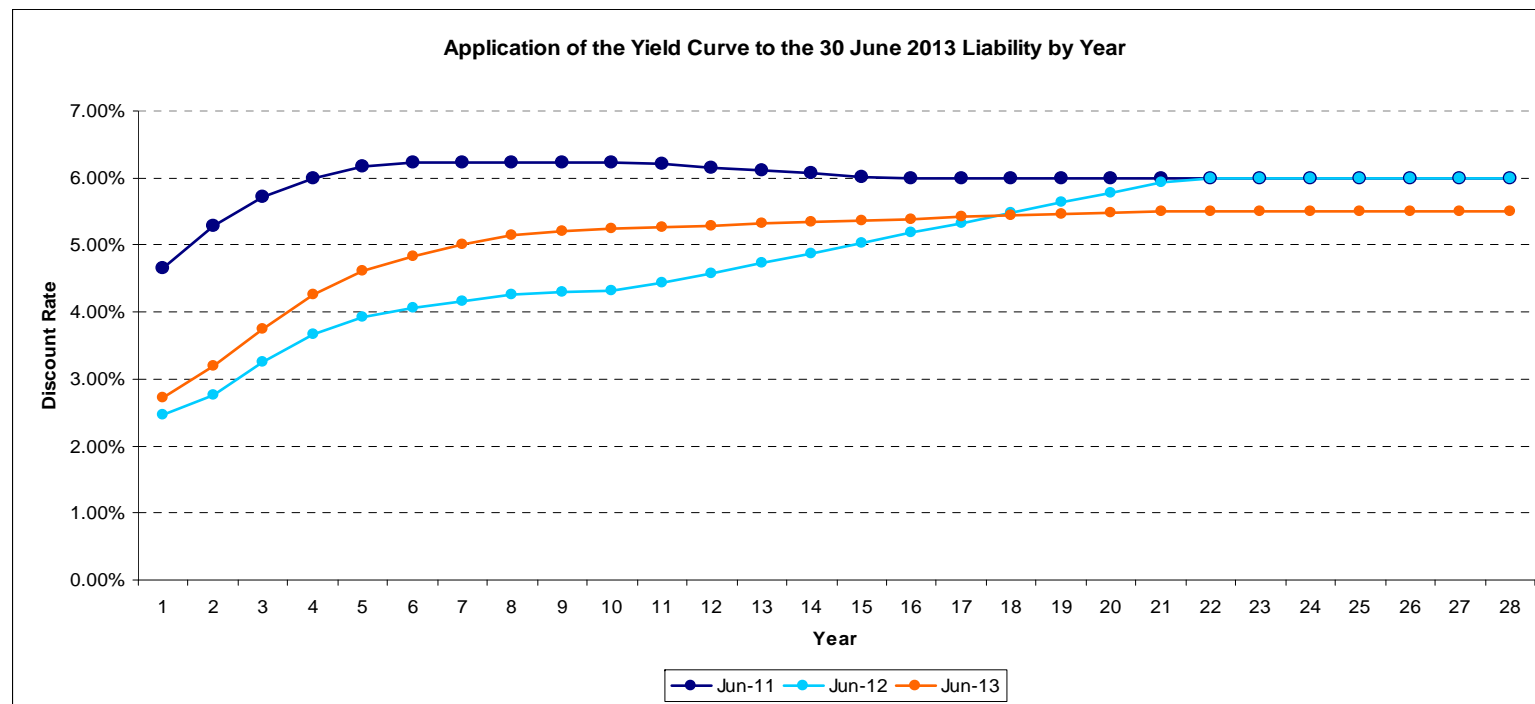
- Known changes to this experience (e.g. legislative)
- Development of claims (numbers and payments) = payment patterns
- Claim frequencies
- Seasonality
- Wage, price and superimposed inflation
- Discount rates
- Known changes to claims management
- Actuarial judgement.

Time Value of Money

- Funds held for a future obligation can be invested until they are needed
- For example, if we need \$100 in a year's time & earn 6% p.a. we only need to set aside \$94.34 now
- Much of the liability will not be paid for many years. 90% of the OCL will be outstanding in 2.5 years time. This has a very large impact on the provision required
- The future cash flow for \$28.4b liability at 30 June 2012 is \$82.8b, i.e. ACC needs to hold approximately \$34 now for every \$100 outstanding.

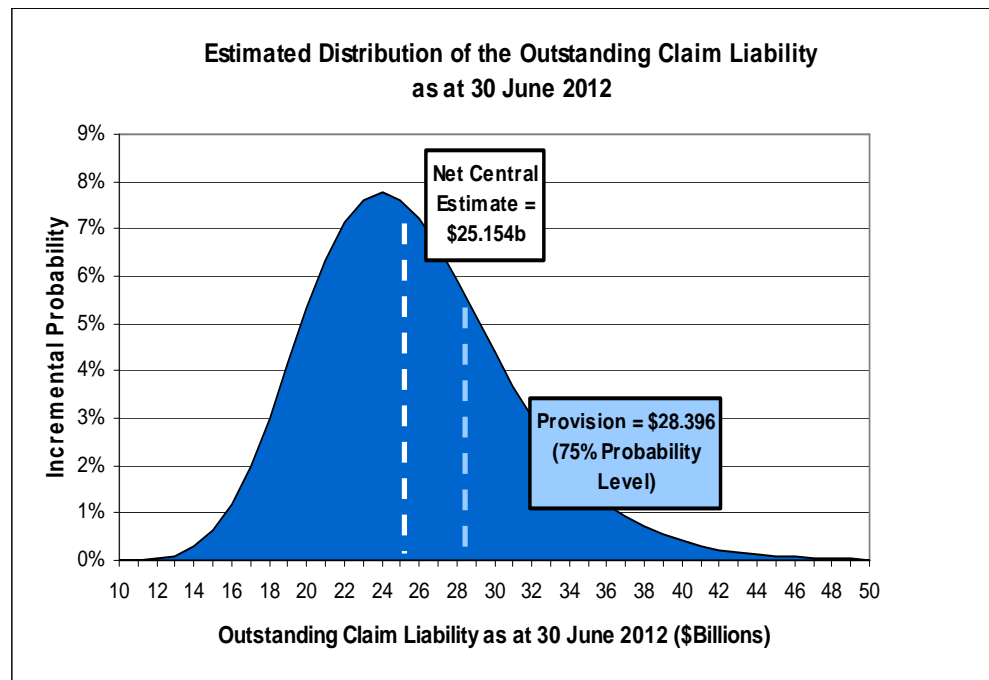
Discount Rates

- NZ IFRS 4 requires that we use risk-free rates (i.e. return from an investment with no chance of default)
- We use NZ Government Bonds as a starting point
- We follow Treasury guidelines.

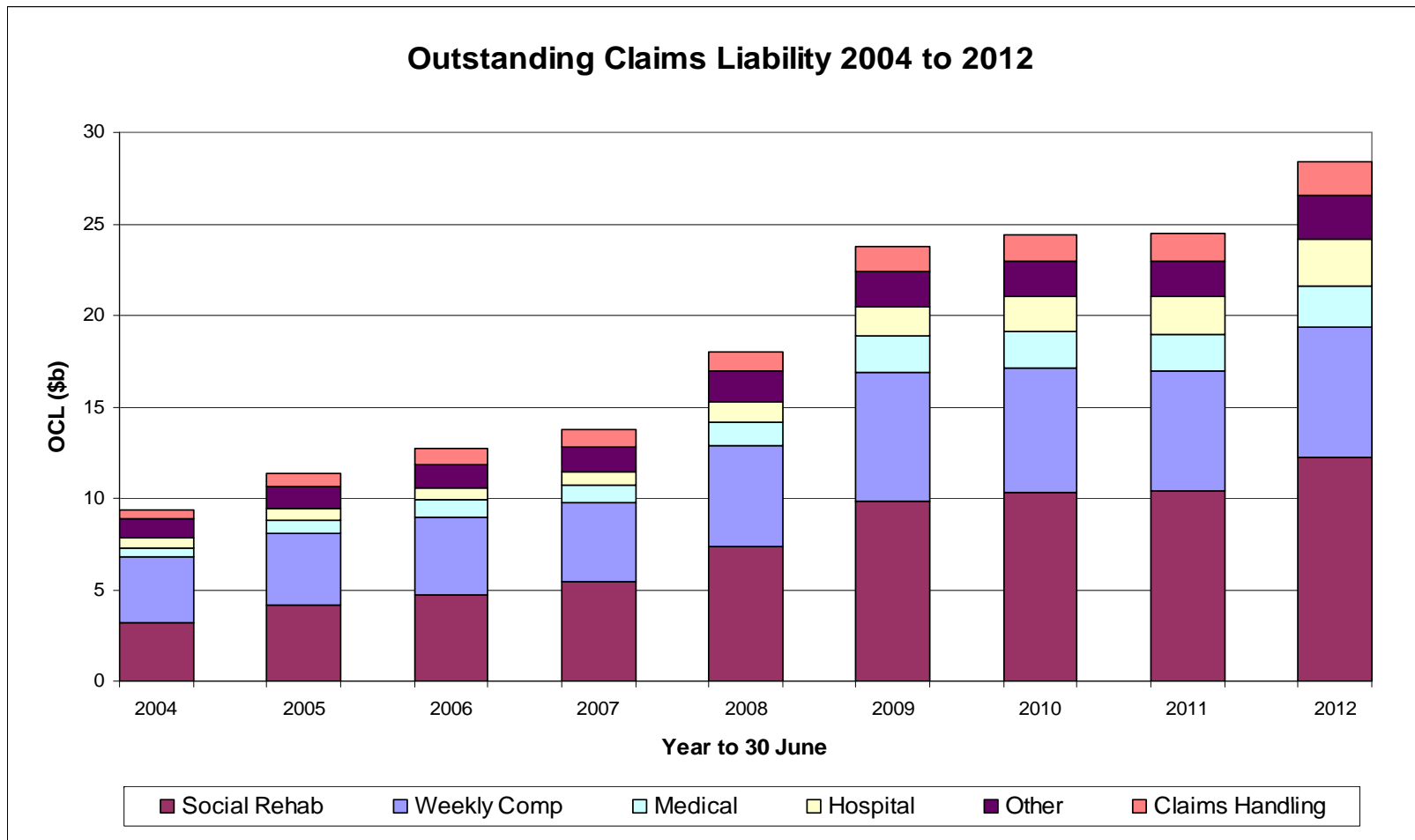


Risk Margins

- Start with an unbiased central estimate (50% chance of being too low, 50% chance of being too high)
- Required to add a buffer so that the OCL is expected to be sufficient in 75% of all scenarios.

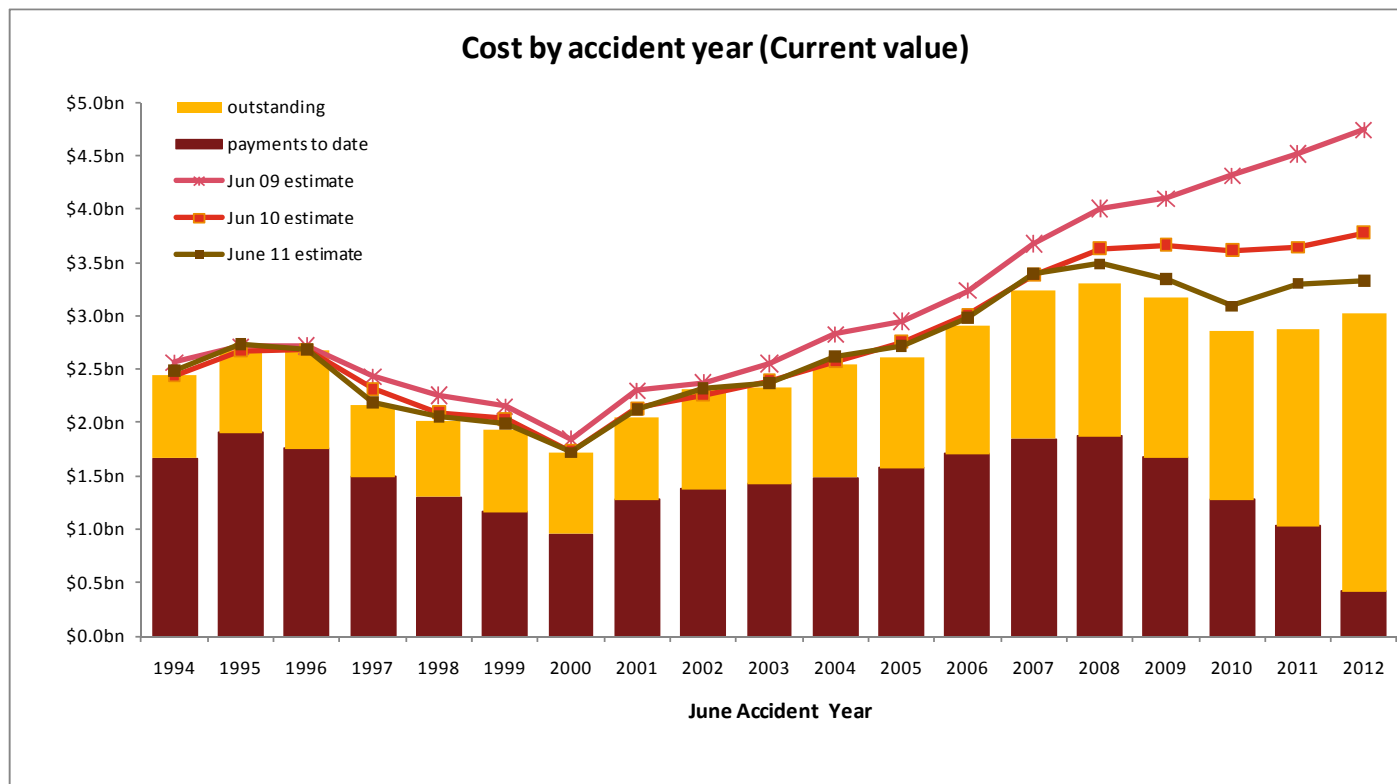


Change in OCL over time

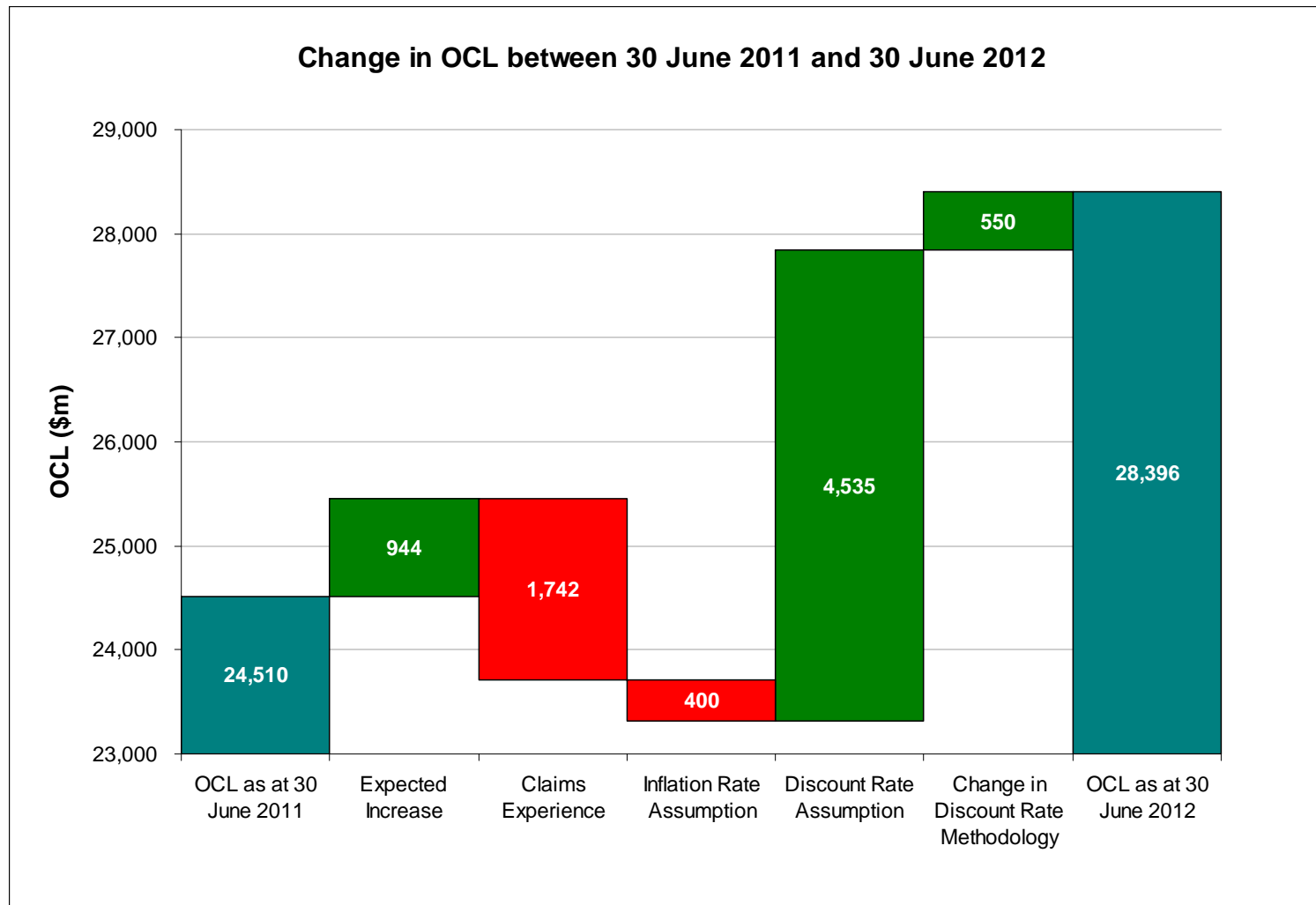


Change in OCL over time

Claim Incurred by Accident Year



Change in OCL during financial year



Key assumptions that impact the OCL

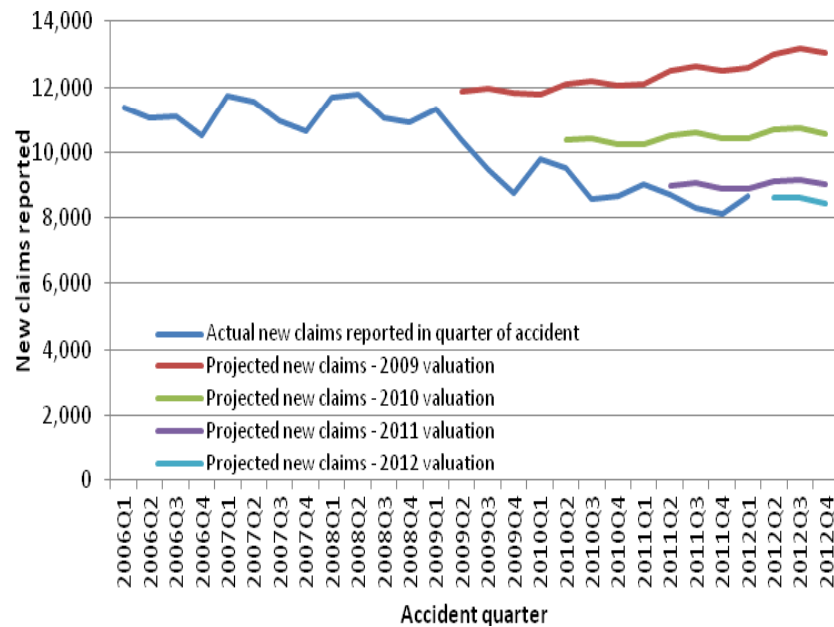
Factor	Scenario	Provision as at 30 June 2012
	Provision	\$28,396m
Discount rates	Increase of 1%	-\$3,792m
	Decrease of 1%	\$5,000m
Inflation rates	Increase of 1%	\$5,131m
	Decrease of 1%	-\$3,946m
Long term gap between discount rates and inflation rates	Increase of 1%	-\$1,314m
	Decrease of 1%	\$1,643m
Discounted mean term	+1 year	-\$855m
	-1 year	\$882m
Growth in care packages - social rehabilitation for serious injury	Increase of 1% after 2 years	\$2,554m
	Decrease of 1% after 2 years	-\$1,883m
Superimposed inflation - excluding social rehabilitation for serious injury	Increase of 1%	\$1,055m
	Decrease of 1%	-\$800m
Long term continuance rates for non-fatal weekly compensation	Increase of 1%	\$872m
	Decrease of 1%	-\$724m

What are the key drivers?

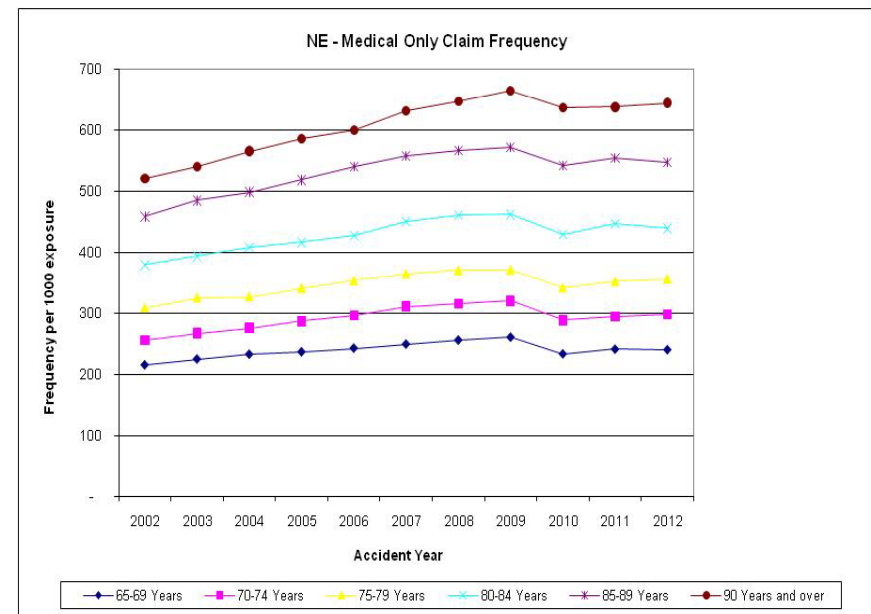
Key drivers of claim experience which impact the OCL

Claim utilisation rates (new claim rates)

Non-fatal weekly comp – number of new claims by accident quarter

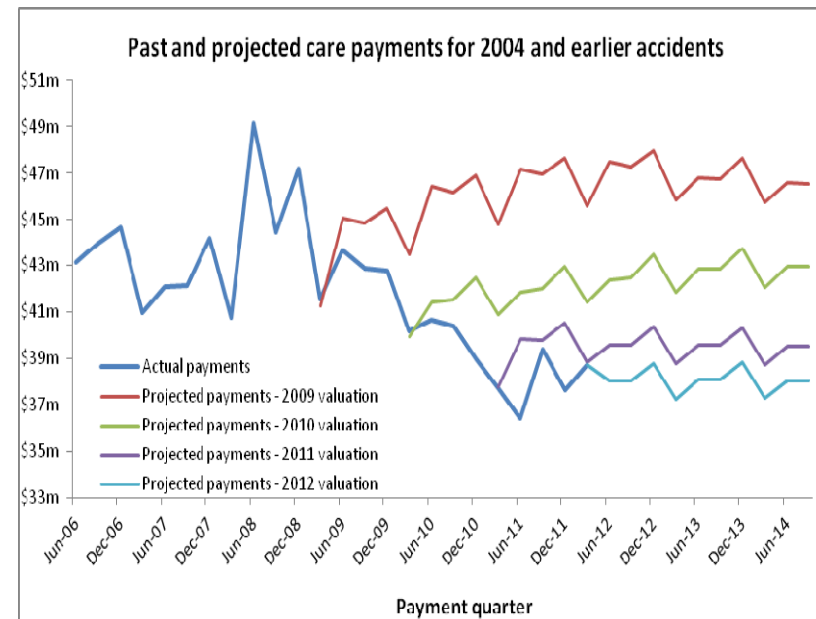
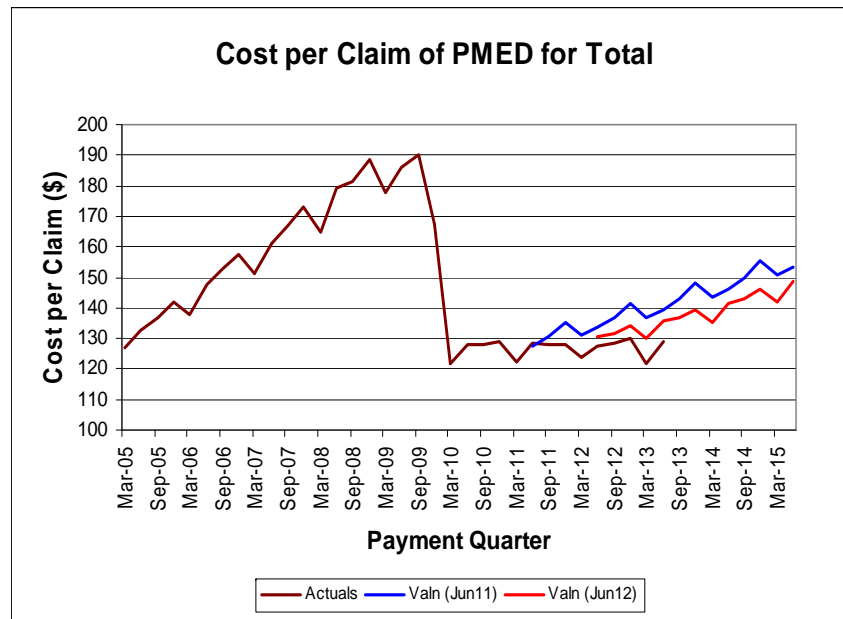


Claim frequency by age band for NE medical claims



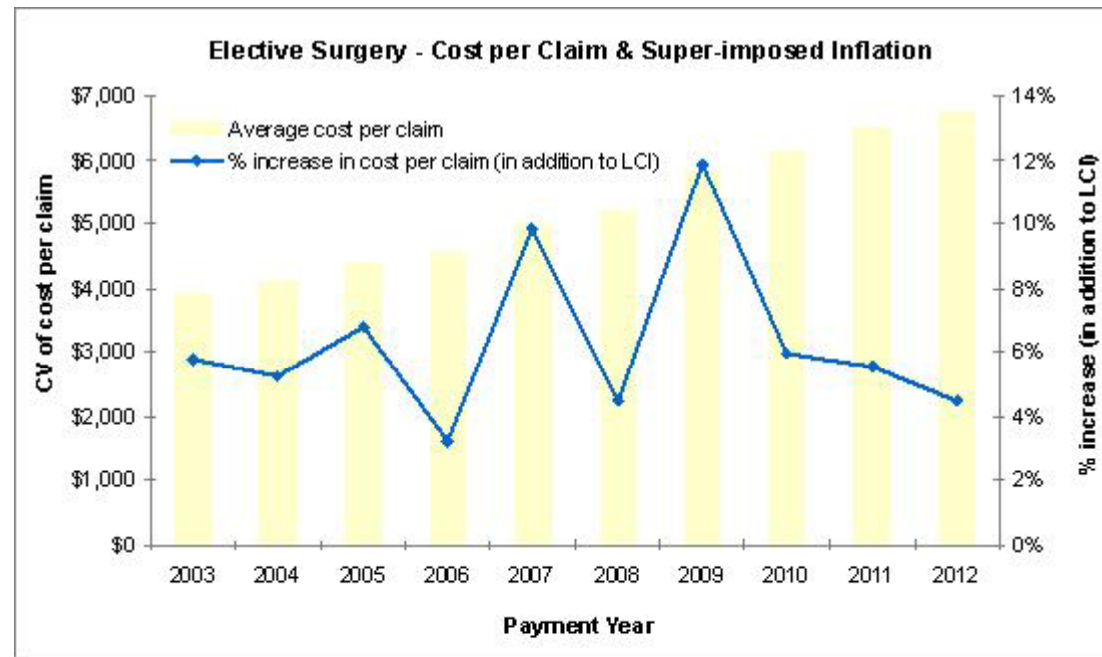
Key drivers of claim experience

Payments per claim



Key drivers of claim experience

Superimposed inflation – elective surgery

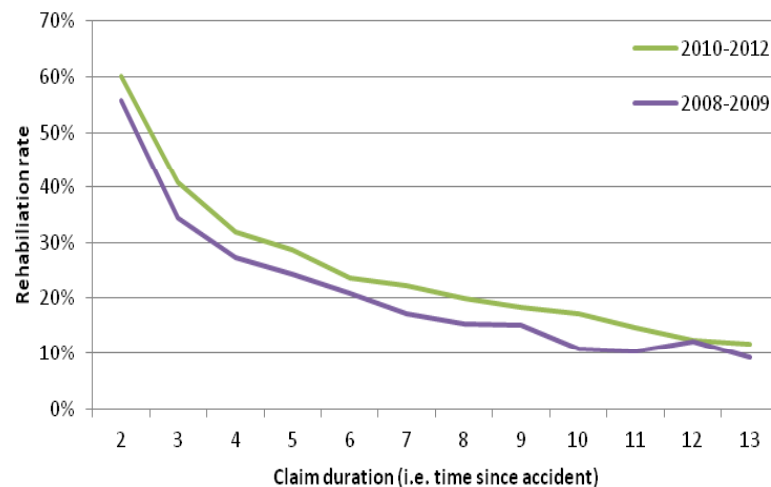


Key drivers of claim experience

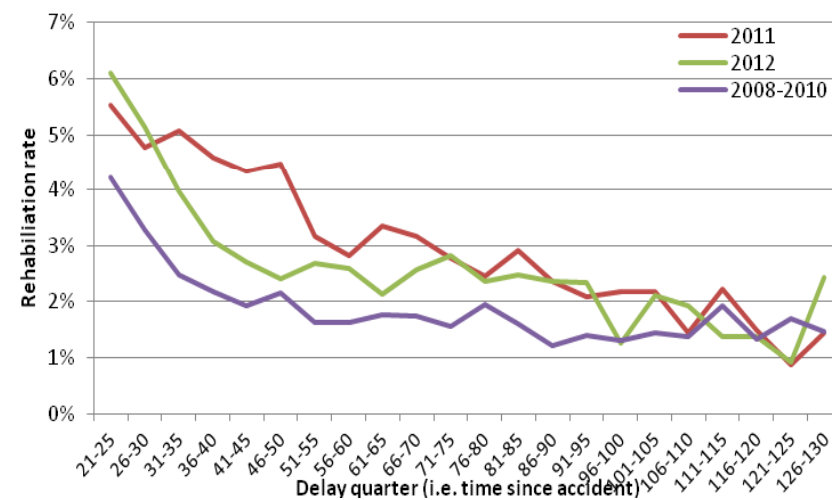
Rehabilitation rates

- Rehabilitation rates generally increased between 2008 and 2012
- Impact will be a reduction in OCL.

Non-fatal weekly compensation actual rehabilitation rates by year



Non-fatal weekly compensation actual rehabilitation rates by year



What insights can we get?

Business insights from the OCL

Reporting (Annual Report)

Consolidated statement of financial position

As at 30 June 2012

	Notes	Actual 2012 \$000	Budget 2012 \$000	Actual 2011 \$000

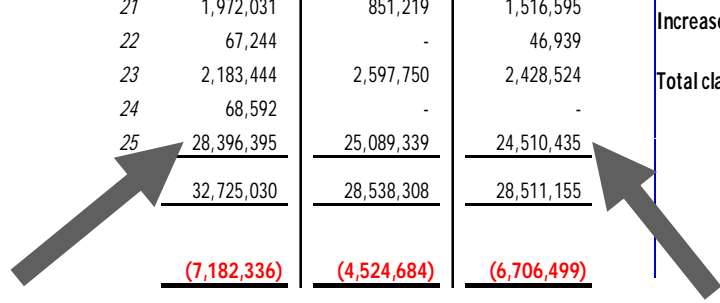
Total assets		25,542,694	24,013,624	21,804,656
Less liabilities				
Derivative financial instruments	15	37,324	-	8,662
Payables and accrued liabilities	21	1,972,031	851,219	1,516,595
Provisions	22	67,244	-	46,939
Unearned levy liability	23	2,183,444	2,597,750	2,428,524
Unexpired risk liability	24	68,592	-	-
Outstanding claims liability	25	28,396,395	25,089,339	24,510,435
Total liabilities		32,725,030	28,538,308	28,511,155
Net liabilities		(7,182,336)	(4,524,684)	(6,706,499)

Consolidated statement of comprehensive income

For the year ended 30 June 2012

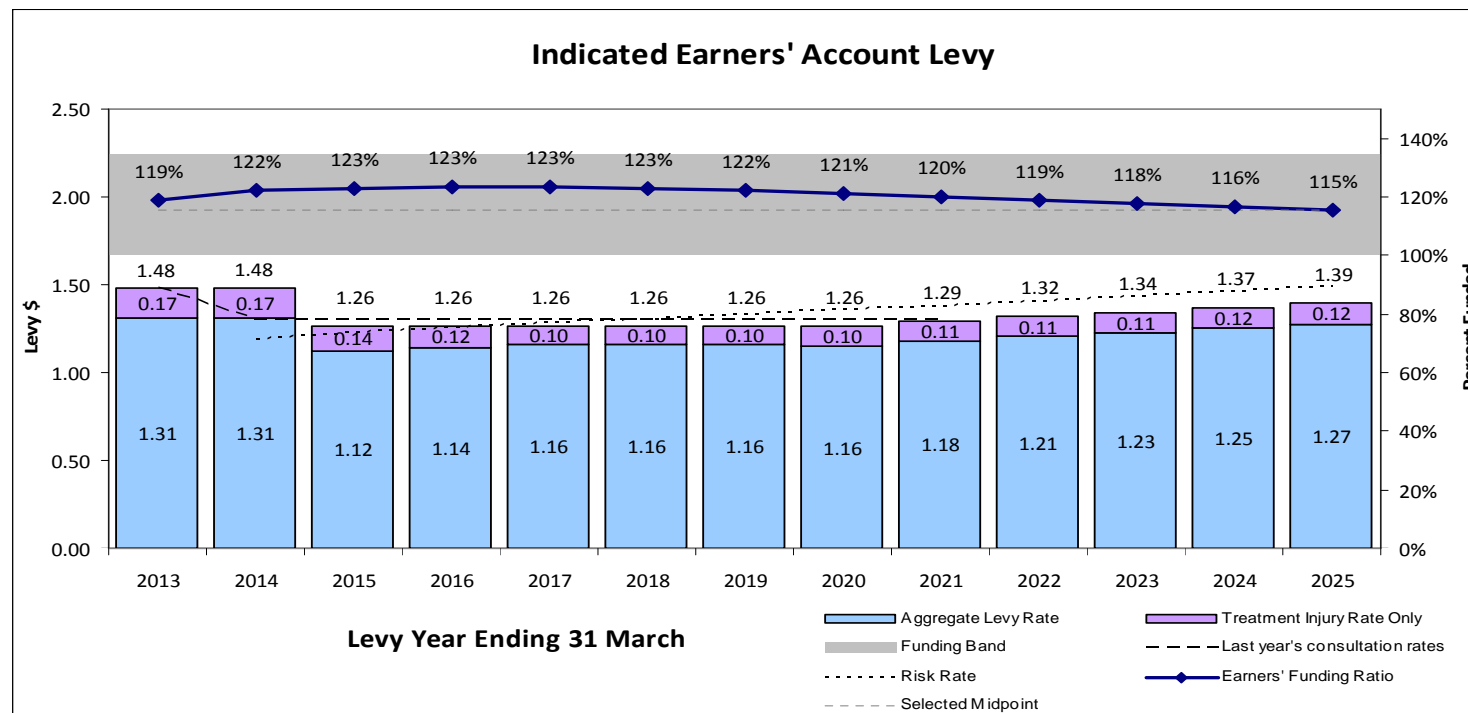
	Notes	Actual 2012 \$000	Budget 2012 \$000	Actual 2011 \$000

Total claims paid		2,603,009	2,811,219	2,588,220
Claims handling costs	8	315,260	322,946	307,343
Increase in outstanding claims liability	25	3,885,960	834,091	80,577
Total claims incurred		6,804,229	3,968,256	2,976,140



Business insights from the OCL

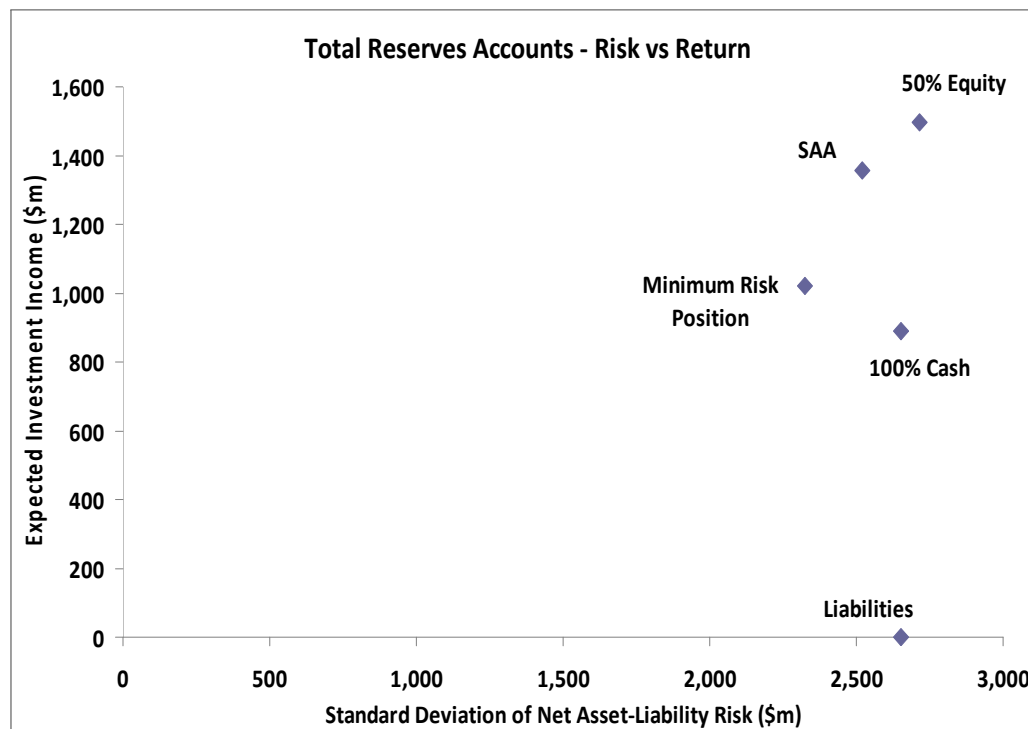
Pricing – OCL cash flows used to determine future claim costs and therefore levy rates



Business insights from the OCL

Asset/liability management

- Liability profile determines the nature of the assets being held
- Need to consider asset liquidity, long term inflation hedging and matching (cash flows, duration and/or variability).



This graph combines variability in OCL and investment assets to get net asset-liability variability

This allows us to see how different asset allocations alter the net asset-liability risk.

Business insights from the OCL

Injury Prevention Strategy Model:

- 1) Identify issue through risk and severity
- 2) Identify the causes
- 3) Implement IP initiative to target causes
- 4) Evaluate.

OCL used to determine:

- severity of claims
- measure the effectiveness of the initiatives.

Vehicle class	Current licence fee	Licence fee based on past claims experience	Licence fee if only considering motorcycle claims that did not involve other vehicles
Passenger vehicles	\$151	\$90	N/A
Motorcycles, 600cc or less	\$297	\$2,066	\$887
Motorcycles, over 600cc	\$397	\$3,837	\$1,671

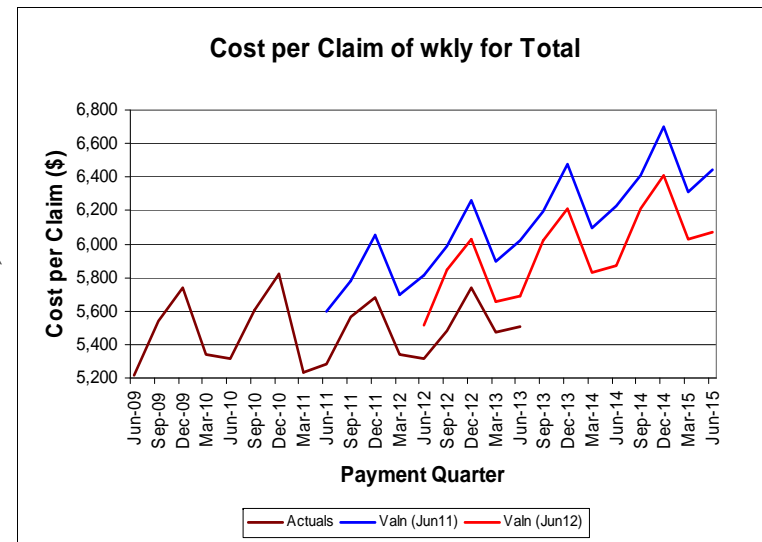
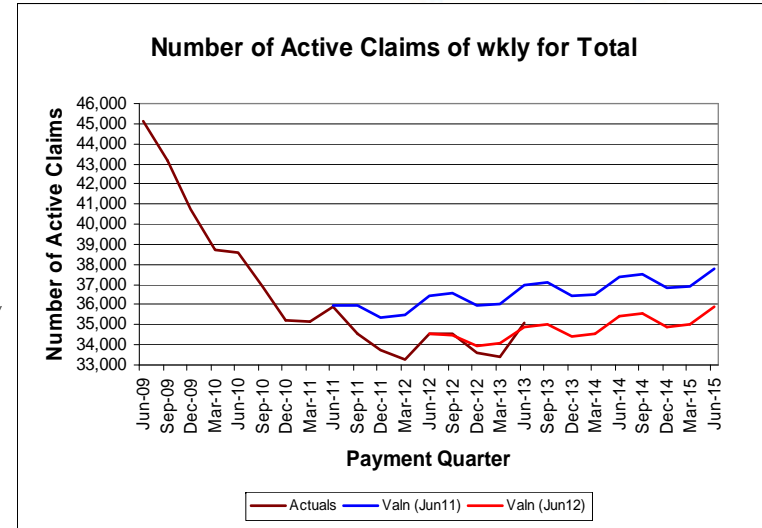
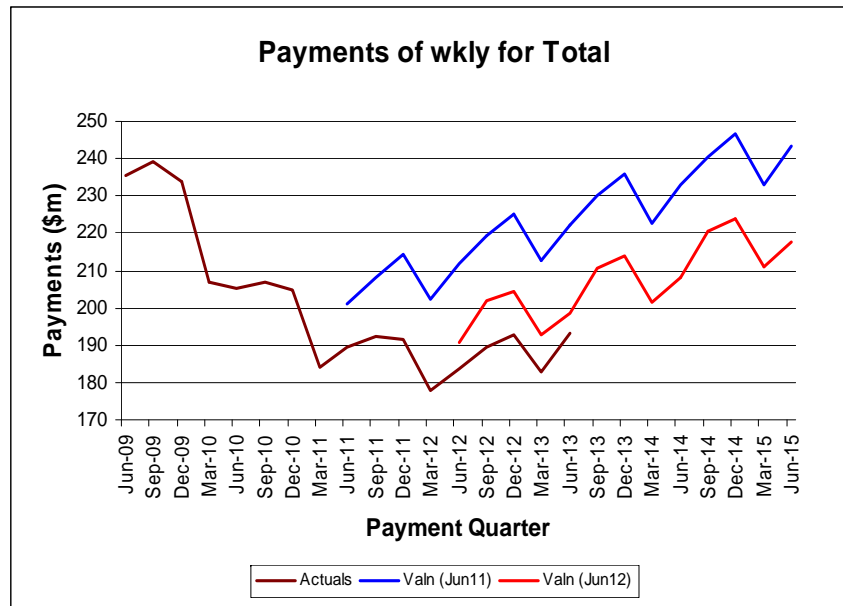
Business insights from the OCL

Investigations into trends (up/down) can give insight into:

- Financial sustainability of the scheme
- Whether clients are receiving appropriate levels of support
- Impact of legislative and/or claims management practices
- Identifying areas of focus.

Business insights from the OCL

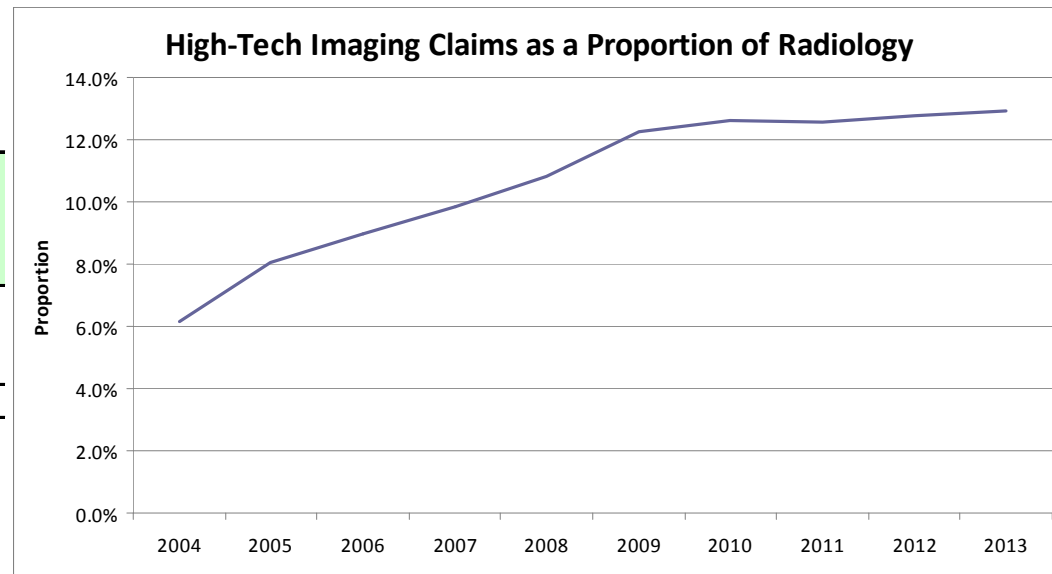
Monitoring – Comparing actual vs expected payments, active claim numbers and cost per claim.



Business insights from the OCL

Superimposed inflation – Radiology

Breakdown of growth in payments (above LCI) between 2004 and 2010 due to changes in PPACs	
Impact of	Annualised growth in payments
Growth in LTI PPACs	3.6%
Growth in HTI PPACs	-0.8%
Change in case mix	4.5%
Total PPAC growth	7.4%



Questions?