



AUSTRALIAN LOCAL
GOVERNMENT ASSOCIATION

NATIONAL *State of the Assets*

A REPORT PREPARED BY JEFF ROORDA AND ASSOCIATES
FOR THE AUSTRALIAN LOCAL GOVERNMENT ASSOCIATION

2015

NOVEMBER 2015

Roads and Community
Infrastructure Report

JRA

JAC COMRIE PTY LTD



IPWEA

INSTITUTE OF PUBLIC WORKS
ENGINEERING AUSTRALASIA



ACELG

Australian Centre of Excellence
for Local Government

JEFF ROORDA AND ASSOCIATES

A technology**one** company



1896 Bullock Team

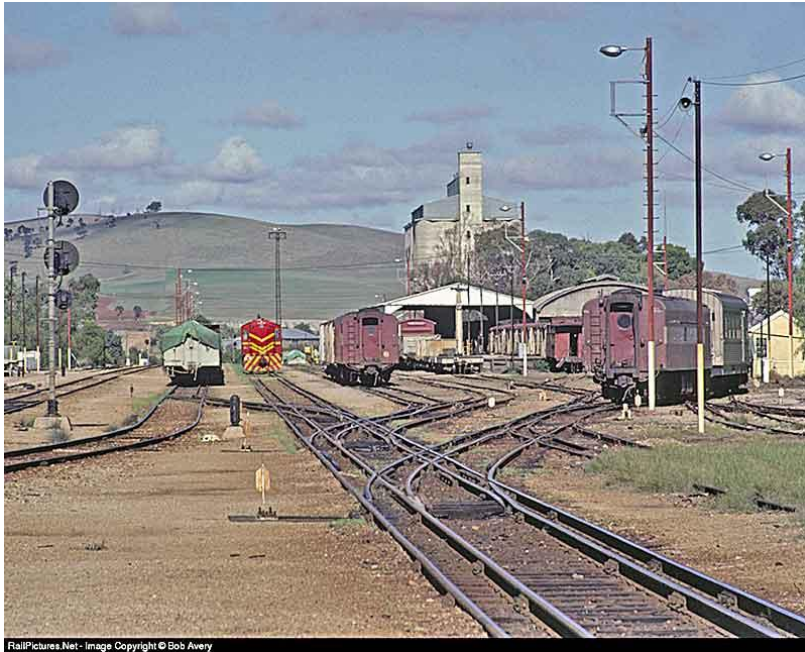
National State of the Assets – 2015



0-6-0 steam locomotive hauling wool in NSW, 1922

National State of the Assets – 2015

Infrastructure has a long life. Make sure there is a national plan before building, renewing or upgrading.



Rail gauges in Australia display significant variations, which has presented an extremely difficult problem for rail transport on the Australian continent for over 150 years. In the 19th century, each of the Colonies of Australia adopted their own gauges. However with Federation in 1901 and the removal of trade barriers, the short sightedness of three gauges became apparent. It would be 94 years before all mainland state capitals were joined by one standard gauge.

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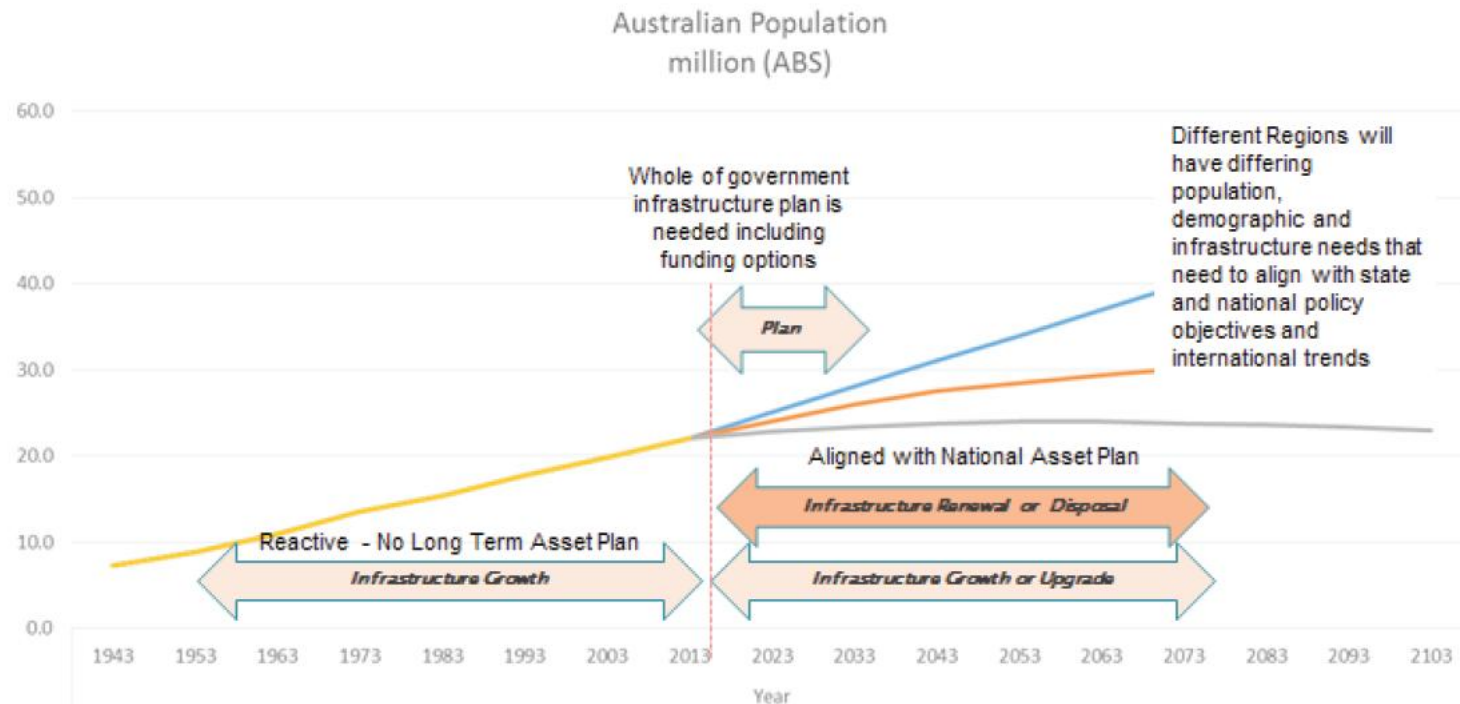
A Strategic Asset Management Plan (SAMP)

- ▶ Councils know how to manage assets (maintain and renew existing) – each Council must have their own SAMP that balances community need with available resources.
- ▶ Planning future infrastructure needs requires 3 levels of government to work together and plan ahead. Not just fund projects based on current need.
- ▶ Funding must be fair across 3 levels of government – it is not under current arrangements.

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Why do We Need a SAMP?

1 – Growth



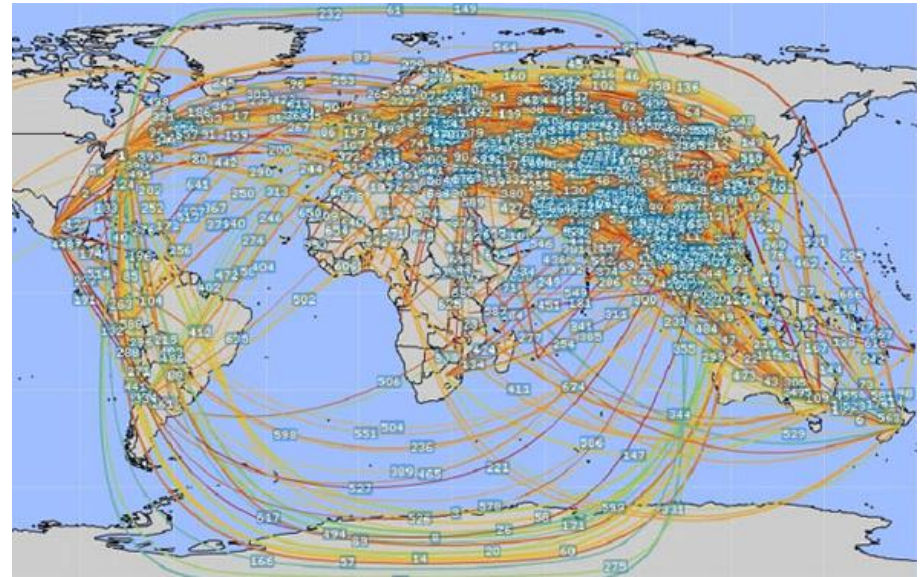
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Why ? 2 – Population Changes (demographic profile and movement)



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Why ? 3 – International Competition



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The Past

- ▶ New infrastructure - Reactive project driven response to need without strategic asset management plans = rail gauges different across states.
- ▶ Existing infrastructure – “calls for more money” but no supporting evidence based asset management plans.
- ▶ Asset management plans that did exist had little analysis of where our national transport network needed upgrading (function) growing (capacity) or shrinking (utilization).
- ▶ Nationally consistent reporting data “too hard” or not seen as important.

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The Present

- ▶ NSoA demonstrates Local Government can provide policy data for all infrastructure.
- ▶ Leadership by ALGA, Infrastructure Australia, IPWEA building government capacity and policy knowledge.
- ▶ IPWEA NSW Road and Bridge Benchmarking study 2015 illustrated the problem of unfair infrastructure distribution. Great dividing range + high rainfall + poor soils + growing traffic + old local timber bridges.
- ▶ NSoA focusing communities. Community health and wellbeing, transport safety,

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The Future - An Action Plan

▶ Local Government

- provide the systems and data for decision support.
- Maintain and renew assets guided by asset management plans within available resources to align with regional strategies.
- Report on areas of high risk.
- Capacity to spend money quickly and efficiently.

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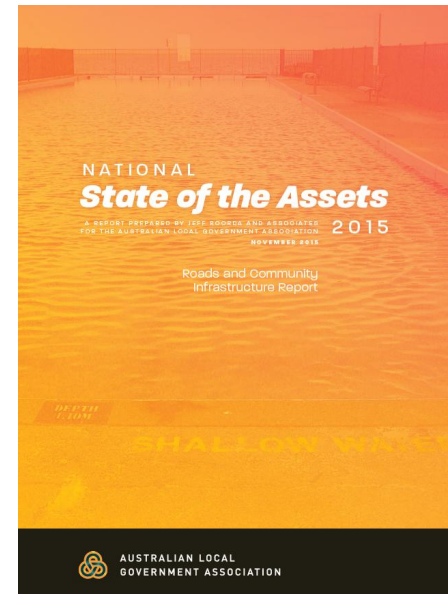
It is Possible

► So far...

- 230 Councils have provided condition function and capacity data for all community infrastructure.
- 396 Councils have provide condition function and capacity data for roads and bridges.

► Next

- Greater involvement by State and Australian Governments
- Include all Councils - system and data improvement
- Communicate the need – a map of investment needed



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Key Elements for NSoA 2015

A National Infrastructure Strategy

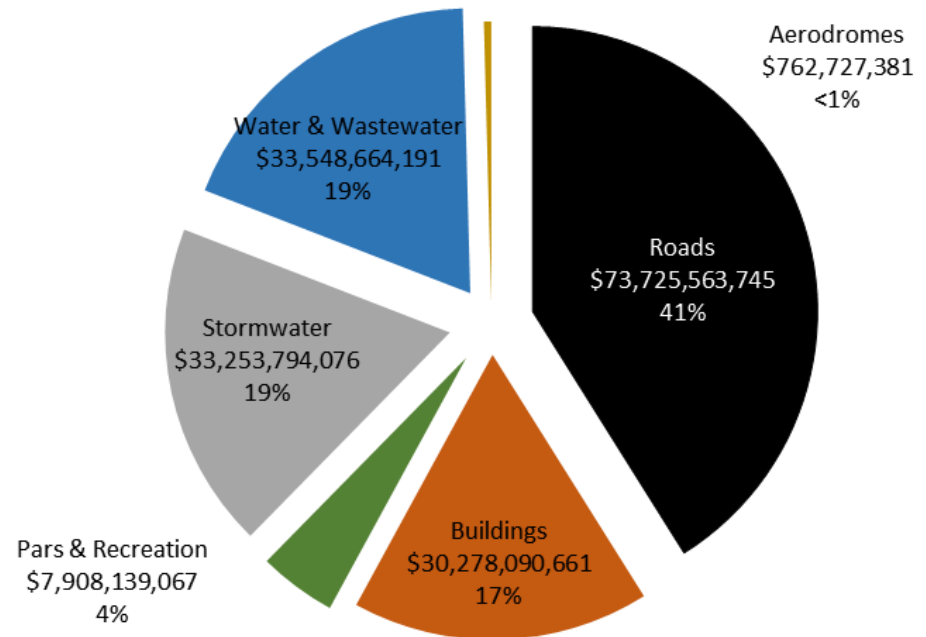
- ▶ *Infrastructure trends, risks and opportunities (JRA & IPWEA)*
 - Condition
 - Function
 - Capacity
- ▶ *Social equity and role of Local Government in service delivery in a whole of government context (ACELG's work on Why Local Government Matters)*
- ▶ *Wise and Fair Allocation of Responsibility - Taxation and funding (John Comrie's work with Deloitte Access Economics)*

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Investment

230 councils are managing a total of \$180 billion in infrastructure for six asset groups with Road assets representing the greatest proportion at \$73.7 billion.

Water & Wastewater	\$33.5 b
Stormwater assets	\$33.3 b
Buildings	\$30.3 b
Parks & Recreation	\$ 7.9 b
Airports	\$ 0.8 b



**Extrapolated to all local governments,
gross replacement cost in excess of \$438 billion**

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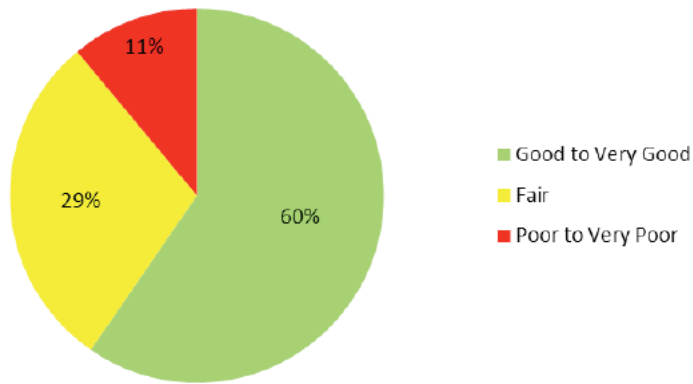
Performance – all local government

Poor condition needs renewal to control life cycle cost

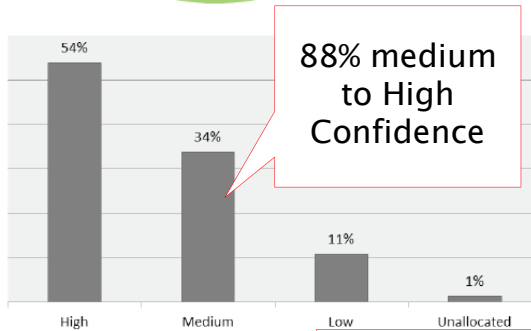
Poor function needs upgrade to meet future needs

Poor capacity needs additional assets to meet future needs

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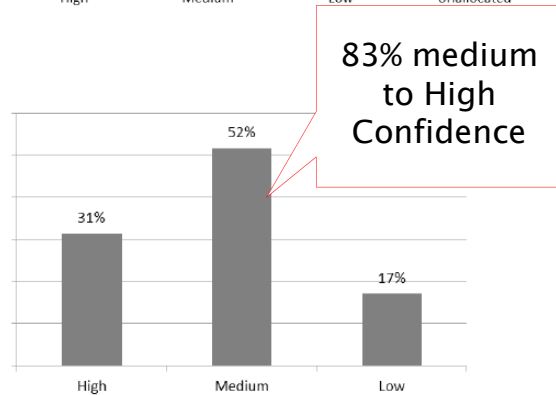


- **Condition** – the physical condition of the infrastructure that allows it to meet the intended service level. 11% or \$47 billion is in poor condition and require renewal or upgrade. (moderate confidence)



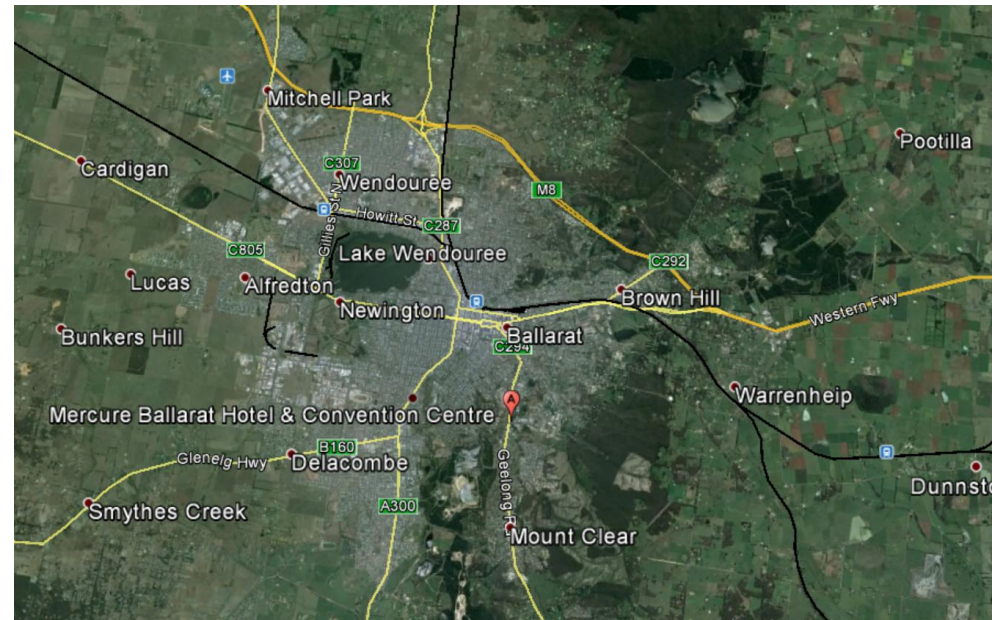
88% medium to High Confidence

Confidence Level – Sealed Roads

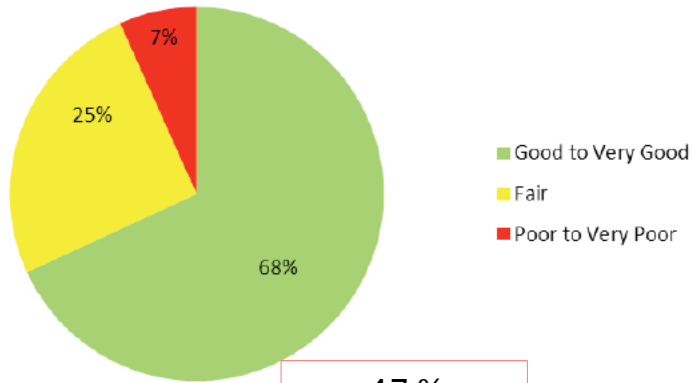


83% medium to High Confidence

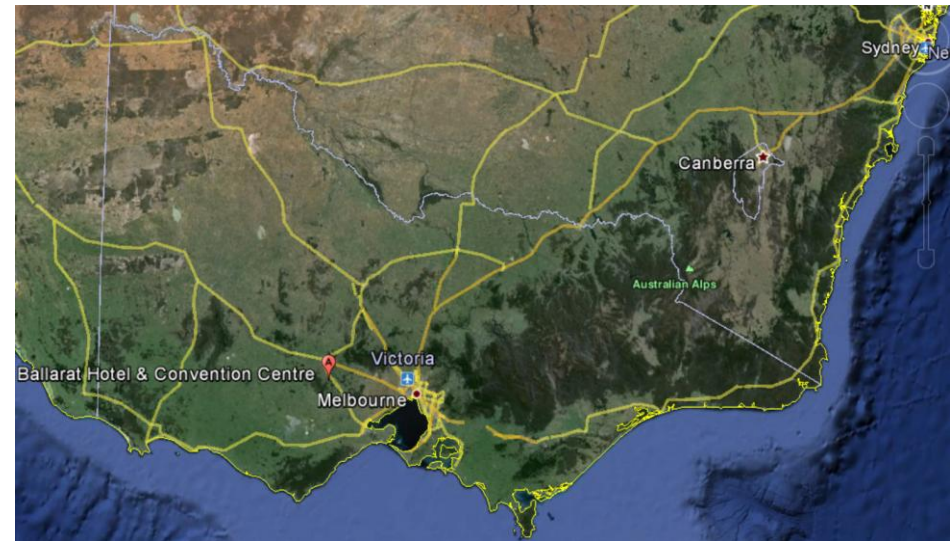
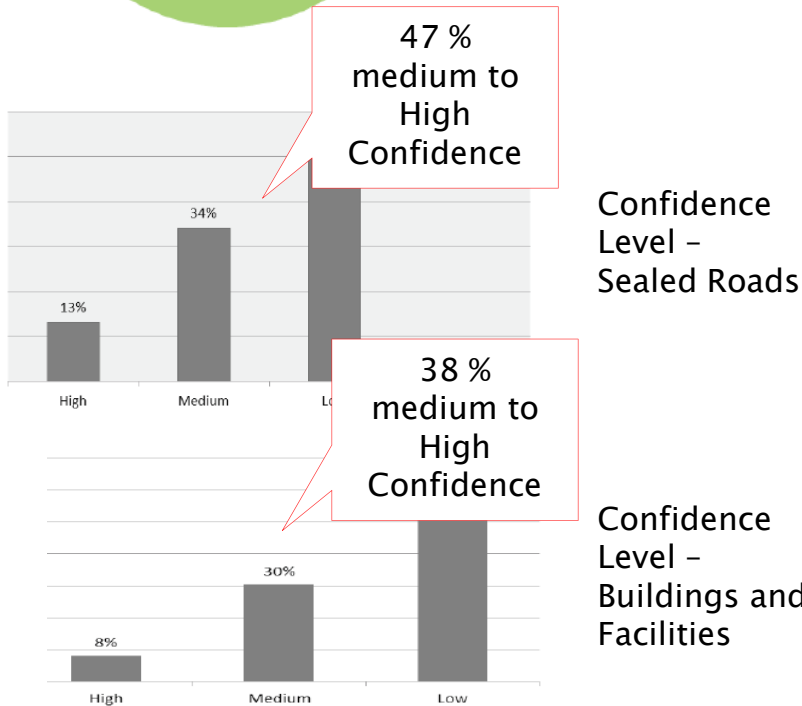
Confidence Level – Buildings and Facilities



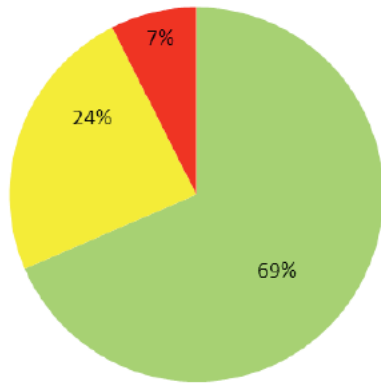
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- **Function** – the ability of the physical infrastructure to meet program delivery needs. 7% or \$31 billion is in poor condition with low confidence reflecting the need for a national asset management plan to target future infrastructure investment in asset upgrade.

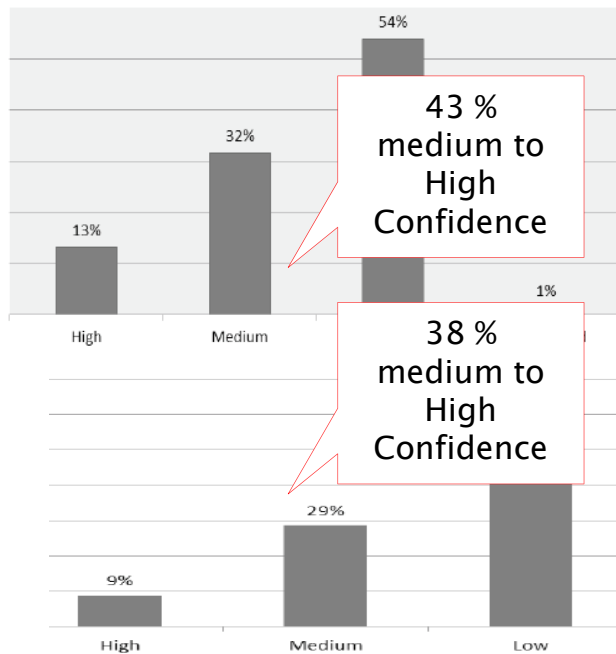


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■ Good to Very Good
■ Fair
■ Poor to Very Poor

- Capacity/utilisation** – represents the ability of the physical infrastructure to meet service needs. 7% or \$31 billion is in poor condition with low confidence reflecting the need for a national asset management plan to target future infrastructure investment in new assets and plan disposal of assets to align with national strategies and priorities.



43 %
medium to
High
Confidence

38 %
medium to
High
Confidence

Confidence
Level –
Sealed
Roads

Confidence
Level –
Buildings and
Facilities



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Findings of the 2014 NSoA (transport) that also apply to 2015 NSoA (all assets)

- ▶ Infrastructure is High Cost & High Risk
- ▶ Improving Asset Management is High Benefit
- ▶ Infrastructure is Concentrated in Local Government
- ▶ Local Government is Well Placed to Implement a National Asset Management Plan and have a 4 year forward program.

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Challenges

- ▶ Improving data and systems especially for function and capacity.
- ▶ Understanding and reporting effective service levels, impacts and risk.
- ▶ Community engagement.
- ▶ Low confidence in function (asset upgrade) and capacity (new or disposed assets)



Scarrabellottis Bridge at Byron Shire has low traffic but there is no viable alternate access to property. Renewal is estimated to cost \$2M because of difficult site conditions.

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Renewal and Maintenance Gaps Can Be Managed with R2R and Top Up.

The Roads and Bridges life cycle funding gap in NSW has decreased 38% from \$718 million in 2005 to \$447 million in 2014.

Road & Bridge Life Cycle Funding Gap (\$M/yr)



BUT.... Planning for Change Needs a Whole of Government Response

- ▶ Condition/utilisation - Don't renew underperforming assets
- ▶ Function - Plan upgrade to meet future needs – local, regional, national, international
- ▶ Capacity Plan new infrastructure to meet future needs – local, regional, national, international.
- ▶ Infrastructure funding is not fair across communities especially for areas with high infrastructure cost and adverse geographic factors.

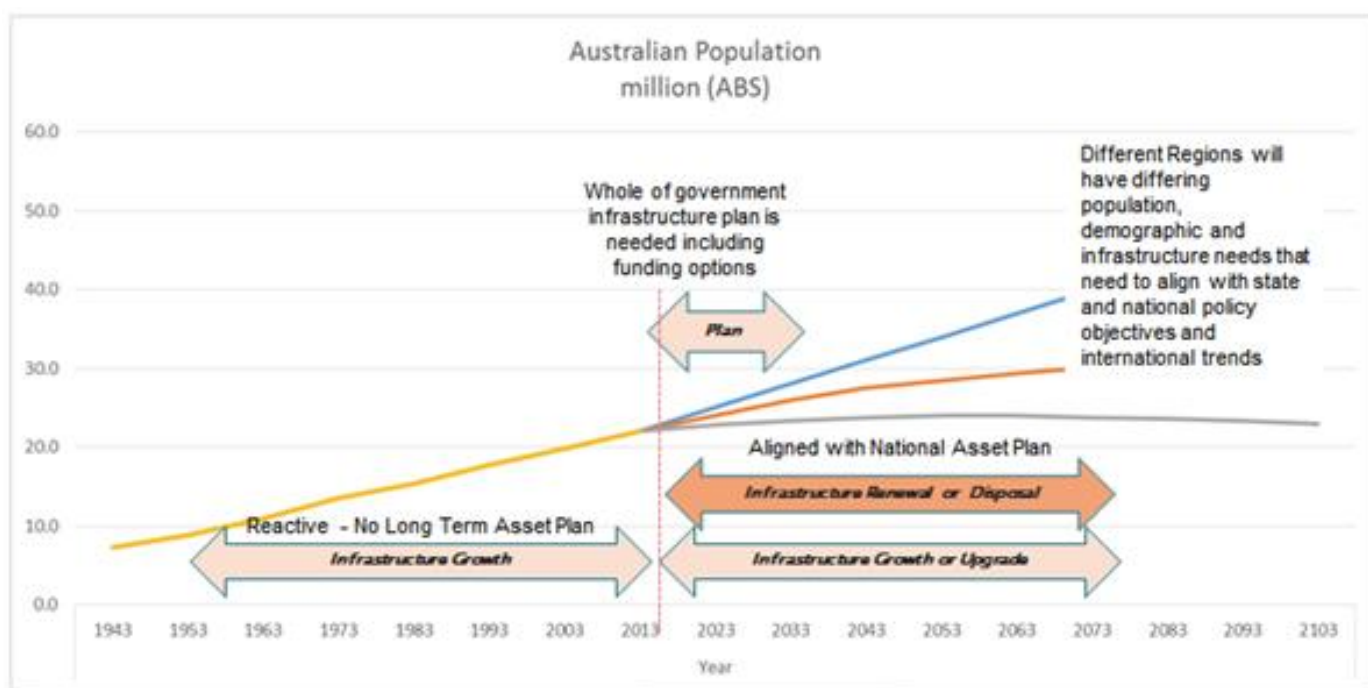
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ALGA is building an improving evidence base

- ▶ 1998 – National Local Roads Data System commences
- ▶ 2010 – Funding Gap Report
(\$1.2b shortfall to maintain services)
- ▶ 2012 – National State of the Assets Pilot
11% Poor to very poor condition – 55 councils
- ▶ 2013 – National State of the Assets Report- Transport
12% Poor to very poor condition – 344 councils
- ▶ 2014 – National State of the Assets Report - Transport
12% Poor to very poor condition – 396 councils
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12% Poor to very poor condition – 396 councils

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The infrastructure needed for the next 30 years will be very different to the past. Funding and planning must integrate for 3 levels of government. National asset management planning across 3 levels of government. Councils can't set function and capacity measures and targets without alignment to state and national strategy.



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Opportunities

- ▶ We have the tools.
- ▶ Improved asset registers.
- ▶ Greater focus on an evidence based approach.
- ▶ We can demonstrate financial sustainability is achievable.
- ▶ Community engagement.
- ▶ Promotes best practice financial and asset management principles.
- ▶ Alignment with state and national reporting frameworks.

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Recommendations

1. Develop a National Infrastructure Strategy
2. Improve and enable international competitiveness
3. Ensure fairness for all communities

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- Report on areas of high risk.
- Develop capacity to spend money quickly and efficiently.
- A map of investment opportunity with State Govt.

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The Future - An Action Plan

- ▶ State Government – work with local government on nationally consistent regional asset management plans and not repeat the “rail gauge problem”
 - Working with councils on developing consistent SAMP’s for each council.
 - Developing 4 -10 year regional infrastructure investment plans to meet service targets.
 - Map of investment opportunity for economic, environmental, social and cultural objectives.

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The Future - An Action Plan

▶ Australian Government –

- Leadership for consistent governance and strategy.
- Work with enabling, capacity building and policy advisory groups ALGA, IPWEA, ACELG, Infrastructure Australia.
- A fairer way to fund all infrastructure. Some Councils are unfairly affected by shifts in population, trade, growth and geography (climate, topography and costs)
- Encouraging consistent collaboration by State Governments

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Key Messages - 1

- ▶ There is an overlap between assets in poor condition, function and capacity that provides an opportunity to better target investment of community wealth guided by a national asset management plan involving the 3 levels of Australian Government.

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Key Messages - 2

- ▶ A national asset management plan integrated with state asset management plans is essential to enable local government to plan infrastructure into the future. Assets in poor condition that are likely to have reducing utilisation and demand can be decommissioned with community consultation and support.

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Key Messages - 3

- ▶ International, regional and local competitiveness requires high cost infrastructure to be managed as a national portfolio aligned with strategic targets at lowest possible life cycle cost, not as separate and disconnected capital projects or groups of assets within each council.

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Key Messages - 4

- ▶ Assets in poor condition that are essential to national and state strategies should be upgraded and augmented. Without an integrated plan at the national, state and local level, opportunities for smart infrastructure investment will be lost and funding will be reactive, responding to areas of highest perceived local benefit or risk limited by current resources.

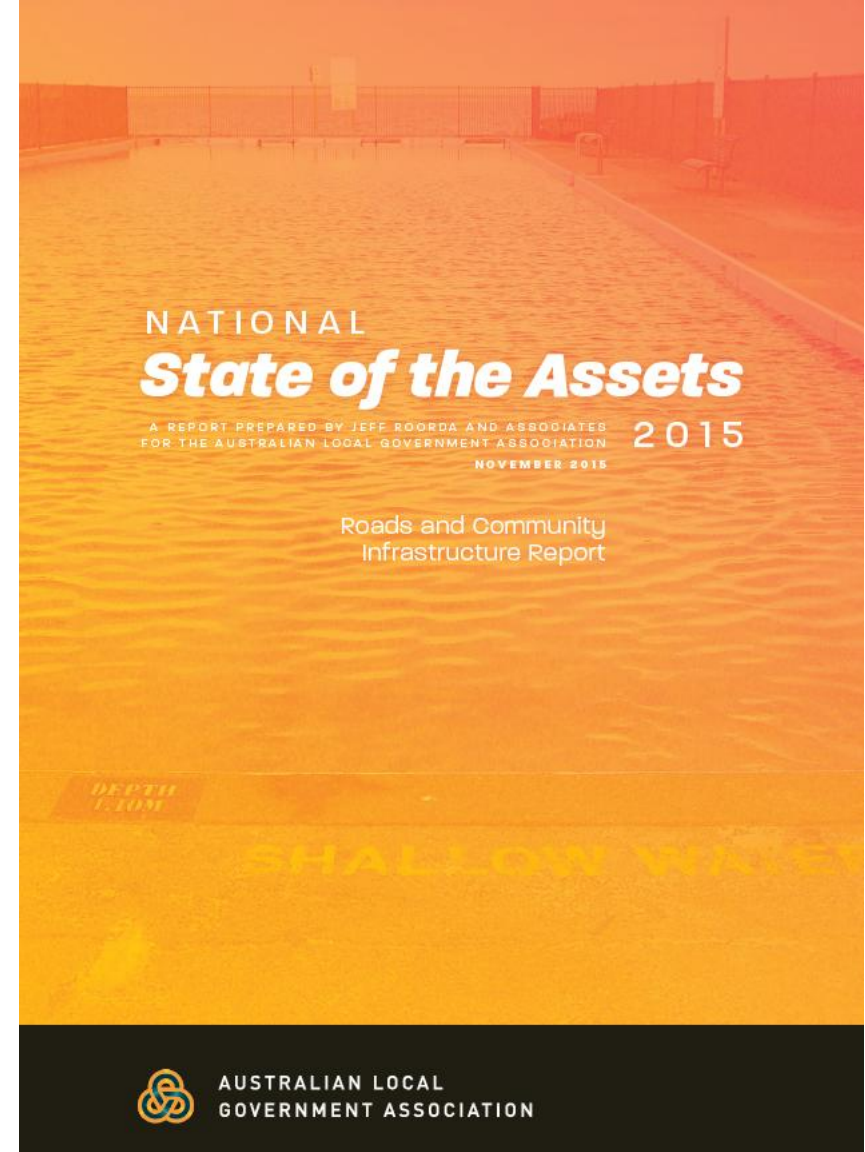
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Key Messages - 5

- ▶ Current asset management planning requires further development that encourages community engagement on service level and risk scenarios to balance revenues and service levels in the coming 10 to 20 year planning period. Funding and revenues have to be fair across 3 levels of government and aligned with a national infrastructure plan.

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**ALGA – continuing to lead
in partnership with State
Associations, peak groups
and other levels of
government.**



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