**ARTC Submission** 

**Productivity Commission Issues Paper** 

**National Transport Regulatory Reform** 

**July 2019** 

# ARTC





# **Productivity Commission Issues Paper**

National Transport Regulatory Reform

July 2019

# **Contents**

ARTO	C Submiss	sion		1					
Produ	uctivity Co	mmissior	n Issues Paper	1					
Natio	nal Trans	port Regu	ılatory Reform	1					
July 2	2019			1					
1	Executiv	e Summa	ary	3					
2	Australia	ın Rail Tra	ack Corporation Ltd (ARTC)	5					
3	Introduct	ction							
4	Safety Regulatory Model								
	4.1	Rail Co-	regulatory Model	6					
	4.2	ONRSR	Perspectives	7					
		4.2.1	Positive Impacts of ONRSR	7					
		4.2.2	Challenges for ONRSR	8					
		ONRSR Administration and Activities							
		Investigation Focus							
		Rail Saf	ety Work	8					
		4.2.3	Key Development Opportunities	9					
5	Sector Reform								
	5.1	Rail Reforms							
	5.2	Road Sector							
	5.3 Access Frameworks								
6	National	Transpor	rt Reforms	11					
7	Producti	vity Refor	m	12					
	7.1	Innovati	on	14					
8	External	ity Cost to	the Australian Economy	14					
	8.1	Safety		15					
9	Regulato	Regulatory Neutrality16							
10	Economic Impact								





National Transport Regulatory Reform

**July 2019** 

# 1 Executive Summary

Australian Rail Track Corporation (ARTC) welcomes the opportunity to comment on the Productivity Commission's (PC's) Issues Paper on National Transport Regulatory Reform. ARTC is a member of a number of Industry Organizations such as the Australasian Railway Association (ARA) and Australian Logistics Council (ALC) who are also making submissions to this process. Whilst ARTC has provided input to these papers, this submission should be considered ARTC's primary input into the review.

#### **ONRSR**

ARTC is strongly in favour of the co-regulatory rail safety model and believes that the formation of the Office of National Rail Safety Regulation (ONRSR), and the move towards nationally consistent regulation, has reduced the regulatory burden on its business. ARTC considers that the establishment of ONRSR has decreased the administration and organizational effort in dealing with regulators and allowed the focusing of safety resources on more value-add activities. The improved safety focus that has developed within ARTC, delivering a vastly improved safety and operational performance, has developed independently of ONRSR; although the administrative savings arising from ONRSR have assisted the development of that culture.

However, the journey is not complete and ARTC believes that the following are key areas of further development for ONRSR to focus on:

- Developing full alignment and consistency across all states; and
- Realigning its focus from enforcement and investigation to assisting industry proactively address safety issues.

#### **Productivity**

ARTC notes the review is broader than ONRSR and believes a renewed focus on rail productivity, and the alignment of commercial and regulatory frameworks for road and rail, are critical to maximizing the benefits of the freight transport industry in Australia.

The rail structural reforms of the mid 1990's created a rail market with a commercial and regulatory framework that promoted private investment into the sector. The development of the rail freight market in the 1990's was coincident with a heavy government focus on productivity, along with the development of Australian Transport Commission (ATC) targets for rail performance, the commitment to government investment in the rail network from the late 1990's along with the formation of ARTC as the facilitator of that investment.

This framework has been critical to the performance of an industry where parties are focussed on their own commercial performance. There is, however, no body responsible for overall industry productivity which constrains rails ability to deliver the next wave of productivity reforms.





The road sector, however, has no commercial framework, no safety risk allocation and no pricing mechanism allowing the direct charging of costs to Users (including a return on and of capital). It does, however, have a Productivity focus as defined in the remit of the HVRR.

The consequent commercial framework arising from the structural rail reforms clearly allocate the safety risks between rail sector participants. This allocation has been critical to the safety performance of Rail. Therefore, the ability for rail's co-regulatory risk system to operate is reliant on the commercial framework underpinning the sector's performance.

The Inter-Governmental Agreement that underpinned the National Transport Reforms leading to the creation of ONRSR and the Heavy Vehicle Road Regulator (HVRR) reflected a focus on productivity developments for Road and Rail. However, in the final legislation, that focus was not delivered for Rail, unlike Road, which lapse limits the ability for Rail to maximize its economic benefit, exacerbating the benefit road receives from the lack of a defined access and regulatory framework.

#### **Industry Structure**

These structural disparities embed a competitive and regulatory advantage for Road over Rail imposing a significant cost on the Australian economy. They ensure the major economic benefits arising from avoided externality costs due to modal shift of freight onto rail are not realized. Further, the advantages incentivize modal shift to road, increasing the externality costs. The disparity in frameworks therefore not only imposes an opportunity loss on benefits foregone but increases the actual cost of externalities.

Analysis of these externalities highlight economic savings over a 20-year period from the addition of just 1 train path over a year arising from a modal shift to rail would deliver economic benefits in excess of \$100m – over 2.5 times the total forecast benefits from the creation of ONRSR. The disparity in the benefits of modal shift versus the national safety approach highlights the areas of future focus; notwithstanding that the continuation of delivery of a consistent co-regulatory model is a critical ONRSR focus.

The distortion in the regulatory and access frameworks plus focus on sector productivity that exists between road and rail therefore results in governments prioritizing road investments over rail imposing substantial externality costs on the Australian economy, delivers far worse safety outcomes and constrains the innovative growth of the rail sector.

ARTC therefore strongly recommends that this disparity be addressed by:

- The development of a Productivity focus for the rail sector which may be through the creation of an oversight body noting the productivity focus of the HVRR but not ONRSR. Given the interrelationships between the road and rail sectors this could be an overarching body responsible for the Productivity of all freight; and
- The development of a commercial regulatory framework for Road that clearly allocates risks between participants and creates a market for road freight.





# 2 Australian Rail Track Corporation Ltd (ARTC)

ARTC was created in 1998 through an Inter-Governmental Agreement (IGA) signed by the Commonwealth, Victoria, South Australia, NSW, Western Australia and Queensland and is a company under the Corporations Act, whose shares are held by the Commonwealth of Australia. The formation of ARTC was a key plank in the significant focus on rail freight productivity in the late 1990's which also included the creation of Australian Transport Commission targets and significant government investment to enhance the rail network's performance.

ARTC was established as a consolidated interstate rail track owner to create a single process for access. ARTC's charter is to:

- Improve performance and efficiency of interstate rail infrastructure;
- Increase capacity utilization;
- Listen, understand and respond to the market;
- Operate on sound commercial principles; and
- Provide shareholders with a sustainable return on capital invested.

ARTC currently has responsibility for the management of around 8,500 route kilometres of standard gauge track, in South Australia, Victoria, NSW and Western Australia which includes the interstate freight network in those states as well as the Hunter Valley Coal Network in NSW. In Queensland, ARTC leases the section from the Queensland Border to the Acacia Ridge Terminal. Over these corridors, ARTC is responsible for, inter alia, the operational management and infrastructure maintenance of the network.

ARTC's rail operations therefore cover all mainland states.

#### 3 Introduction

ARTC welcomes the opportunity to comment on the Productivity Commission's (PC's) Issues Paper on National Transport Regulatory Reform. ARTC is a member of a number of Industry Organizations such as the Australasian Railway Association (ARA) and Australian Logistics Council (ALC) who are also making submissions to this process. Whilst ARTC has provided input to these submissions, this submission should be considered ARTC's primary submission.

In respect of the effectiveness of the changes to safety regulation arising from the National Transport Reform process, ARTC is strongly in favour of co-regulation and believes that the role of ONRSR has been positive; however, the journey is not complete and there is more work to do. As outlined in the section above, ARTC operates rail networks in all mainland states and is therefore well placed to provide comment on the positives arising from the formation of ONRSR, and of areas that would benefit from further focus.



**July 2019** 



Due to the coincident internal structural reforms that have placed safety at the heart of ARTC's business and developed a network-based approach to safety management, it is not possible for ARTC to quantify the net cost impact of ONRSR on its business, therefore the detail below is provided on a qualitative (descriptive basis).

Following the summary of ARTC's experience with ONRSR, this paper will focus on the background of reforms in road and rail, ending with a comparison on the competitive impact of the regulatory differences and conclusions for areas of future reform.

# 4 Safety Regulatory Model

In this section, ARTC will highlight its strong support for the co-regulatory model whilst identifying areas for improvement that would deliver further benefits to the industry. Finally, a more detailed description of the impact of ONRSR on ARTC's business will be provided.

## 4.1 Rail Co-regulatory Model

ARTC is firmly in favour of risk based approaches and believes that the co-regulatory model has been a positive for the industry; although more work is required to ensure that the full benefits of a consistent national framework are realized.

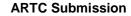
ARTC's understanding of co-regulation is that industry and ONRSR have a shared responsibility for safety and should work together to improve rail safety. The standards or rules for how operation are not prescribed. ARTC sets its own standards and rules to ensure that the railway operations undertaken are done so safely.

These co-regulatory arrangements are much improved compared to those in place prior to the establishment of ONRSR, but there are still improvements which can be made.

There has been a positive shift arising from co-regulation with ONRSR focusing more on assessing what ARTC has in place to address matters; rather than the State regulators approach of in-depth technical review with decisions based on an individual's opinion.

Despite these gains, ONRSR need to be less prescriptive in its monitoring of the regulations. This provides a further distinction between the HVRR and ONRSR in that the HVRR works with other agencies (such as the state police) in enforcing the regulations whereas ONRSR undertakes that policing role itself. This has a number of effects which impacts on ONRSR's ability to provide support to the industry:

- It utilizes scarce resources, imposing an opportunity cost on the industry through the inability of those resources to focus on data and trend analysis;
- It blurs the lines between the functions of ONRSR such that it is unclear whether engagements are in their policing role or the regulatory role this limits the





**Productivity Commission Issues Paper** 

National Transport Regulatory Reform

**July 2019** 

incentive of industry to openly share data with ONRSR further limiting their effectiveness in identifying and analysing potential safety risks; and

• It also creates uncertainty in the role of ONRSR in WHS investigations which creates a further limitation in respect of the ability for ONRSR to work with industry.

ARTC therefore believes that ONRSR could be more effective if it provided greater focus on assessing whether parties are within the guidelines; rather than the prescriptive inspecting approach they undertake. This would ensure that the freed-up resources could be applied to provide industry with the much greater value services of guidance and priority setting.

An example is where ONRSR undertakes its own drug and alcohol testing in addition to the extensive testing undertaken by industry. The ONRSR testing therefore adds no value but imposes a significant marginal cost on industry to comply and an opportunity cost on ONRSR through the utilization of scarce resources.

#### 4.2 ONRSR Perspectives

ARTC believes that the formation of ONRSR has been a positive for the industry (notwithstanding the difficulty in quantifying the benefits); but the journey is not complete. For the full benefits of a consistent national co-regulatory approach to be realized, ONRSR must itself fully adopt a consistent national approach and shift from an enforcement and investigative focus, to one of working with industry to analyse the safety data set and proactively recommend future guidelines to improve the industry's safety performance.

A summary of ARTC's interactions with ONRSR is provided below, separated into the areas where ARTC have had positive interactions with ONRSR, and those that highlight the challenges in need of future focus.

#### 4.2.1 Positive Impacts of ONRSR

- ONRSR is competent at what they do.
- ONRSR adds value through the limited advisory services they offer.
- The alignment across all states of ONRSR's ability to administer, audit and review the accreditation regime under the Rail Safety National Law has improved over recent years.
- The Notification of Change process has noticeably improved, with it now being streamlined and enquiries being around process rather than technical aspects of the change. The establishment of a main contact person to discuss issues and inconsistencies with has been clearly beneficial.
- Discussions on varying conditions imposed on ARTC's have been positive and ONRSR are working with us to determine the best way to approach a variation





**Productivity Commission Issues Paper** 

**National Transport Regulatory Reform** 

**July 2019** 

request to ensure a suitable outcome. Discussions on the accreditation plan for Inland Rail have also been positive and the process seems fair and efficient.

- ARTC believes that the key focus areas ONRSR are targeting are welcome and we
  encourage the regulator to engage with industry to work towards improved solutions.
  ONRSR's Safety Improvement Program on Track Worker Safety is a worthwhile
  initiative that is fully supported by ARTC.
- ONRSR provides good service in respect of its role to provide, or facilitate the provision of, advice, education and training in relation to rail safety.

#### 4.2.2 Challenges for ONRSR

 The progress of the establishment of a single National Rail Safety Regulator has been slow, but ARTC believes this reflects state legislative progress rather than ONRSR.

#### **ONRSR Administration and Activities**

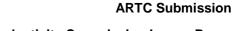
- Misalignment across all states still exists in respect of ONRSR's ability to administer, audit and review the accreditation regime under the Rail Safety National Law.
- More can be done in respect of ONRSR's role to conduct research, collect and publish information relating to rail safety. For example, the benchmarking of railway operators is something that could help all the industry
- Some of the value of requests made by ONRSR under its role to monitor, investigate
  and enforce compliance with Rail Safety National Law is questionable and ARTC
  would prefer to engage with the regulator on the significant events and on a planned
  audit basis more.

#### **Investigation Focus**

- ARTC does not see ONRSR playing its role as an "optimal" co-regulatory environment where the regulator is a trusted partner rather than a policeman.
- ARTC believes that ONRSR could focus less on the investigation of low risk events and more on significant ones. It could also, by undertaking less of a policing role, allow the organization to complete their own investigations.
- ONRSR should provide more information on how it develops its risk profile it uses to
  prioritise regulatory activities (based on both the nature of rail operations and
  performance) allowing industry to better contribute to the process by understanding
  how the high risks items are chosen

#### **Rail Safety Work**

- Resolution is required on the definition of rail safety work and this should be a focus for ONRSR.
- ONRSR should focus on railway safety and not branch into WHS matters.





**July 2019** 

#### 4.2.3 Key Development Opportunities

This above summary is consistent with a view that ONRSR have been a positive for the industry and are competent in their activities; but constraints on delivering a consistent national approach plus an overly prescriptive approached focused on matters with minimal marginal value limit the full value they can deliver.

The benefit of ONRSR adopting a less prescriptive approach and accepting industry's own investigations is to allocate scarce resources to analyse and interpret the information arising from the investigation. This would ensure the application of expert analysis to events and being proactive in the development of national solutions thereby allowing ONRSR to lead the industry on developing common safety improvement programs.

#### 5 Sector Reform

This section provides a summary of the reforms that have occurred in the Road and Rail sectors and highlight the distortionary impact that has resulted.

#### 5.1 Rail Reforms

Following from the initial recommendations of the Hilmer report in the mid 1990's to reform state-based monopolies, the rail industry undertook significant structural and investment reform that delivered substantial improvements in efficiency and productivity and therefore economy wide benefits.

These structural reforms not only introduced competition into the rail freight industry but created a rail freight market when none previously existed. The competition and access framework that derived from these reforms promoted the entry of private capital into the market. In turn, this has underpinned investment in both the capacity and capability of the network delivering a national standard of performance incorporating:

- Longer and heavier trains;
- Improved asset condition delivering greater reliability; and
- Decreased transit time to meet the market requirements.

The contractual and access framework that was created had the further benefit of clearly defining and allocating the safety risks and liabilities of network access; contributing to a much-improved safety focus and outcomes.

In addition, the resource boom heightened focus on improving the productivity of minerals networks. This focus was enabled by the supporting regulatory and commercial frameworks that underpinned these networks and has delivered substantial productivity improvements.



ARTC Submission
Productivity Commission Issues Paper
National Transport Regulatory Reform
July 2019

#### 5.2 Road Sector

From a road perspective, there have been no structural reforms undertaken to mirror those in rail, such that there is no road access market compared to the rail access market.

There have been a multitude of reviews this century that have recommended structural reform of Roads and the introduction of an access framework and efficient pricing mechanisms for road access. To date, however, there has been no real progress beyond further reviews and recommendations for implementation at some point in the future.

#### 5.3 Access Frameworks

Although it is not in scope for this review, the review of freight productivity should include the application of a road pricing regime and a contractual access framework to roads for heavy vehicles. ARTC considers that the contractual access regime is critical to the economic and safety performance of an industry and has been a key contributor to rail's improved safety performance over time.

That is, the development of the contractual access framework was fundamental to the definition and allocation of risks (including safety risks) between below rail owners and above rail operators. In this fashion, the contractual liabilities and indemnities for the performance of the network have been defined and agreed, impacting on the safety performance of networks by clearly allocating responsibility for events. The access framework development therefore imposed a commercial, as well as a corporate social, incentive on parties to manage safety risks.

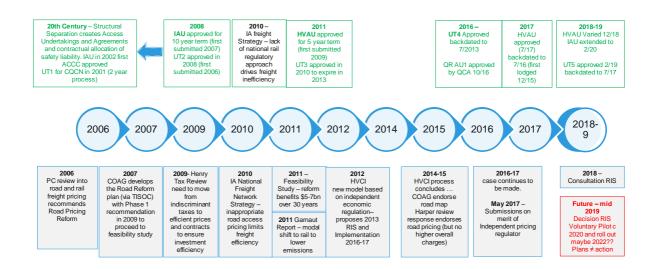
Further, this contractual allocation has been critical to allow the risk-based safety approach of ONRSR (as all parties are contractually aware of their obligations) compared to the prescriptive approach of the HVRR as defined by the legislation. That is, without clear contractual allocations defined in an economic access framework, it is not possible to move to the risk based approach being considered for roads by the National Transport Commission – as in the absence of contractual allocation, the risks must be prescribed in legislation and if they are not defined in legislation nor in contracts, a risk based approach cannot work as nowhere are the risk allocations defined and liabilities clear.

This is a question that the PC raises in Section 2 and ARTC would firmly conclude that risk-based approaches are preferred, but they are only possible if the risks are clearly allocated in a contractual access framework.

A comparison of the progress of regulatory access reform is highlighted in the chart below:



**July 2019** 



# 6 National Transport Reforms

The development of the National Transport Reforms formally arose from the July 2009 COAG meeting where it was agreed to implement national regulation for maritime safety, rail safety and heavy vehicles providing improved safety and reduced costs and regulatory burden for Australian transport companies.

In August 2011, COAG executed the Inter-Governmental Agreements underpinning the national transport reform. COAG welcomed the execution of these agreements for Rail, Road and Maritime regulation and emphasised the importance of continuing to pursue ambitious competition and regulatory reform.

The IGA's drove the introduction of the specific Rail and Heavy Vehicle enabling legislation in South Australia for Rail and Queensland for Heavy Vehicles. The outcomes from the IGA's were defined as highlighted below:

Rail IGA Outcomes - Clause 12	Heavy Vehicle IGA Outcomes - Clause 11
The Agreement will contribute to the following outcomes for the rail industry:	The Agreement will contribute to the following outcomes for the heavy vehicle industry:
(a) promotion of safety and safety improvement in the delivery of rail	a) removal of inefficiencies from inconsistent jurisdictional requirements;
transport;	b) lessened regulatory burden and a reduction
(b) improved productivity and	in the costs of compliance; and
efficiencies from consistent national requirements; and	c) enhanced safety, productivity and efficiency.
(c) decreased regulatory burden.	





The 2011 National Transport Reforms therefore contained a productivity focus; yet it was only NHVL that specifically addressed productivity. Further, this was stated as a step on the road for further competition and regulatory reform; of which there has been none in either road or rail.

This creates a fundamental distortion in the competition for freight between road and rail placing rail at a significant competitive and investment disadvantage:

- Road has a body responsible for a Productivity focus (the HVRR), but there is no equivalent in Rail, and
- Rail has undergone structural and commercial reforms but road has not.

The disadvantage arises from rail investments being driven by participants based upon their commercial realities, whilst road investment and regulations have no commercial lens with costs not directly allocated to participants.

The structural reforms undertaken to create and improve the Rail industry have ensured that the micro economic benefits available from that reform have been exhausted. The next phase of structural reform therefore needs to be at the macro level focused on productivity of freight investments. This will be addressed in the section below.

The National Transport Reforms commenced in 2009 therefore ensured Road received the benefit of a macro level Productivity focus in the absence of any micro structural and access reforms; whilst Rail has undergone substantial micro structural and access reforms but suffers from the absence of a macro Productivity focus.

The result of this sectoral distortion is inefficient road investments imposing a cost on the Australian economy.

## 7 Productivity Reform

Road and Rail are both substitutes and complements. That is, rail freight competes with road freight, so they are substitutes. Yet rail freight relies on road transport for the pickup and delivery leg to transport the freight to the destination. Therefore, given this reliance, road is complementary to rail freight. In addition, a related impact of modal shift to rail from road is less trucks on the road, increasing road capacity availability, lowering emissions and improving safety standards. Improved rail market share therefore creates economic benefits in road usage, as well as delivering lower costs for freight transport.

The interrelationship between rail usage and road costs ensures that the distortion in productivity focus between road and rail has a significant impact on the Australian economy. The focus on road and not rail increases the substitution effect (to road) which reduces the road benefits available from greater rail market penetration. The value of this impact is defined further below in the assessment of externalities; but the opportunity loss



ARTC Submission
Productivity Commission Issues Paper
National Transport Regulatory Reform
July 2019

from allowing Rail's productivity agenda to lapse whilst promoting it in Road, is extensive and far outweighs any benefits created from the National Transport Reforms and the creation of ONRSR.

The failure of the enabling National Transport Reform legislation to deliver a Rail Productivity focus, despite its inclusion in the IGA, has therefore imposed significant costs on the economy and is a clear policy oversight that needs addressing. This modal competitive distortion is further exacerbated by the lack of structural reforms undertaken in the road industry.

The interrelationships between rail market share and road costs are critical to assessing the economic impact of sectoral distortions. That is, a key benefit of improved rail productivity is improved road productivity through the creation of more capacity and reduced externalities by removing trucks from the road. This complementarity suggests that independent consideration of Road and Rail Productivity could lead to sub optimal decisions as the recommendations would be at cross purposes. Ideally a single body could assess the economy wide benefits of improved freight productivity; however even a separate body assessing Rail productivity would be an improvement on the current distorted position of no rail productivity focus at all.

The HVRR has an explicit focus on productivity of freight movements by road, the primary driver for which is to reduce the indirect costs of truck usage on roads, including (inter alia):

- Increased safety and lower accidents;
- Lower emissions; and
- Lower congestion for other road users.

These costs are referred to here as indirect because they are not directly charged for or recovered from road users. Therefore, whilst the HVRR can make recommendations in respect of making road freight more productive, nowhere are the true economic costs of these recommendations assessed. Nor are the alternative methods of achieving the same reductions in externalities addressed. That is, if freight shifts from road to rail, the broader economic impact of this modal shift is a lowering of the externalities associated with road transport. Consequently, the benefits of improved rail service and hence market share do not appear in the rail sector, but rather in road.

An example of the impact of this was the recommended move to longer and heavier trucks to make truck hauls more efficient. This has placed Australia at the forefront of international benchmarks in respect of truck weights and is designed to effectively use less trucks to carry the same freight. However, by making trucks more efficient, and therefore more competitive versus rail, any gains from lower truck numbers for the given freight task, would be offset by market share gains by road and an increase in trucks. Recent changes



**July 2019** 

announced by the Queensland Minister for Transport and Main Roads on the reduction of the regulatory burden on truck permitting only enhance these effects.

#### 7.1 Innovation

The impact of the distortion in regulatory and productivity frameworks is most keenly felt where road and rail compete. In this environment, given the uneven competitive field, it is difficult for individual companies to invest in innovation that applies across the entire industry. Limited gains in innovation have been therefore been achieved in the rail freight market. However, the possible innovation gains from a Productivity focus in rail can be seen by observing developments in a closed system – where a single entity is responsibility for the productivity of the network and there is no intermodal competition. Such a system exists in the Iron Ore Networks in the Pilbara where innovations such as full train automation have been introduced, resulting in substantial productivity gains.

# 8 Externality Cost to the Australian Economy

The cost to the Australian economy through the regulatory and productivity distortions that underpin freight modal choice are clearly demonstrated by way of an example of assessing the economic externality benefit of a modal shift that adds 1 extra train path per annum.

The June 2018 Principles and Guidelines for Economic Appraisal of Transport Investment and Initiatives published by Transport for NSW define the externality unit costs for freight vehicles (at p 283) as below:

Table 63 Externality unit costs for freight vehicles (cents per kilometres travelled)

	Urban			Rural		
Externality type	Light vehicle	Heavy vehicle	Rail	Light vehicle	Heavy vehicle	Rail
Air pollution	6.03 4.47 - 9.92	12.46 6.05– 15.25	10.74	0.00	0.12 0.06 - 0.15	0.00
Greenhouse gas emissions	1.88 1.74 – 1.97	2.77 1.39 – 4.85	0.98	1.88 1.74 – 1.97	2.77 1.39 – 4.85	0.98
Noise	1.03 0.72 – 1.43	2.08 1.38 – 2.77	4.56	0.00	0.21 0.14 – 0.29	0.00
Water pollution	0.90 0.67 – 1.49	1.87 0.62 – 2.29	0.33	0.01 0.01 - 0.02	0.75 0.38 - 0.92	0.33
Nature and landscape	0.67 0.67 – 1.30	0.20 0.20 - 0.42	2.60	0.01 0.01 – 0.01	2.08 2.08 - 4.16	2.60
Urban separation	0.98 0.58 – 1.39	1.39 0.69 – 2.08	2.60	0.00	0.00	0.00
Upstream and downstream costs	6.26 4.47 – 8.04	11.10 9.71-12.48	n/a	6.26 4.47 – 8.04	11.10 9.71– 12.48	n/a

**Source:** Light and heavy vehicles from Guide to Project Evaluation, Part 4, Project Evaluation Data, Austroads, 2008. Rail from National Guidelines for Transport System Management in Australia, Part 3, Appraisal of initiatives. Australian Transport Council 2006.

Notes: Average load per vehicle is assumed based on ABS 2016 Survey of Motor Vehicle Use





These externalities exclude safety and congestion costs. It is assumed that in assessing rural impacts, the value of congestion is very low, therefore the below analysis is based on a rural example. This is therefore a conservative assessment.

In a paper by Deloitte (Deloitte Access Economics, Fatigue management: The impact of outer limits of service in the rail sector, August 2018), the cost of safety externalities is assumed to be \$0.11/vehicle km.

Therefore, the total externality cost of heavy vehicle freight, excluding congestion is \$0.28/vehicle km.

If reforms allowed the modal shift of freight from road to rail, this is assumed (based on ARA analysis in its August 2017 Value of Rail paper <a href="https://ara.net.au/value-of-rail">https://ara.net.au/value-of-rail</a>) to be the equivalent of removing 110 trucks from the road. Each truck is assumed to operate 300,000km pa.

Therefore, modal shift of just one extra train path pa, would result in the reduction of 33 million truck vehicle kms.

Based on the above assessment of externality costs, this would provide a benefit of some \$9.2m pa which would deliver an NPV of circa \$100m over a 20-year period (at a 7% discount rate).

As highlighted in the original cost benefit analysis for the creation of ONRSR, the assumed net benefit was, in Net Present Value terms, circa \$40m.

Therefore, 1 extra train path per annum arising from modal shift is equivalent to 2.5 times the total benefit forecast for national safety reforms. This discrepancy in attributable value highlights the need for a renewed focus on productivity reforms to ensure road and rail compete on a balanced field and allows the benefits to be delivered to the Australian economy.

#### 8.1 Safety

In a press release dated 7 November 2018, the Freight on Rail Group (FORG) stated that recognition was required of the rail freight sector's significant contribution to reducing both accident costs and carbon emissions in Australia's transport supply chain. The statement highlighted that for every tonne of freight hauled, road freight produces 14 times greater accident costs. As above, this has been converted to a cost per vehicle km of \$0.11; however, the true cost of improved safety is immeasurable.

Given the safety focus of the PC's review, the safety impact of modal transfer to rail must be taken into account in any PC analysis – and the impediments to achieving this via distorted regulatory and access frameworks must be addressed; especially given the productivity distortion arising from the National Transport reforms perversely delivers worse safety outcomes.



**July 2019** 

# 9 Regulatory Neutrality

There is currently not regulatory neutrality. The table below highlights that the inconsistencies across regulatory frameworks are all to the benefit of road over rail; yet the economic benefits of improved rail performance over road when externalities are accounted for are substantial.

Area	Road	Rail	Comment
Body with Productivity Focus	With the HVRR	None	Allows recommended changes to road licensing to improve road's competitive positioning
Policing of Safety Legislation	Not by HVRR	By ONRSR	Imposes opportunity cost on ONRSR and Rail industry and reduces road cost as compliance cost is indirect to the industry. Improves road competitive position.
Driver accreditation	2 days	18 months	Greater supply of drivers for road, lowering costs of accreditation and wages conferring a competitive advantage on road
Access Framework	Via registration	Access Contract required	Rail allocates safety risk in the contact, clearly imposing liabilities on rail owner which require recovery through access fees.  Does not apply to road. Therefore confers competitive advantage on road.
Access Charges	Costs allocated to trucks recovered via licenses – capital costs sunk	Recovers direct and capital costs (where possible)	The increased capital formation costs of trucks in road development are not recovered and expectation is truck maintenance impact is undervalued. Lack of road user charging (and sunk capital) confers substantial competitive advantage on road
Economic Regulation	Not present	Mix of state and ACCC regulation with inconsistent frameworks and decisions	Imposes substantial regulatory burden on the rail industry none of which are present for road. Confers substantial competitive advantage on road.

ARTC notes that the issues of access frameworks and economic regulation of road and rail are not in the scope of this review; however, it does recommend that a follow up study be





**July 2019** 

undertaken by the PC to assess the full economic benefits available from a renewed focus on freight productivity across both road and rail. This study should also address recently highlighted state-based inconsistencies in the economic regulatory framework for rail by the ACCC and IPARTs recent request for a review of the NSW Rail Access Undertaking.

#### 10 Economic Impact

The distortion in the regulatory and access frameworks that exists between road and rail results in the government prioritizing inefficient road investments, imposing substantial externality costs on the Australian economy and delivering far worse safety outcomes.

Addressing the distortion and providing a consistent regulatory framework with a body prioritizing the substantial freight productivity reforms to deliver on the substantial economic benefits available from such an approach. This would include the avoidance of the imposition of significant externality costs on the economy which are currently arising from the focus on road productivity reforms only.

The current distorted framework therefore:

- promotes inefficient investment in freight infrastructure,
- imposes significant externality costs on the Australian economy;
- constrains the ability of road to capture the safety benefits of a risk based safety system underpinned by a contractual access framework; and
- constrains the development of industry wide innovation in rail.

To ensure the potential economic benefits that can accrue from an efficient freight industry are realized, ARTC therefore strongly recommends:

- The development of a Productivity focus for the rail sector through the creation of an oversight body. Given the interrelationships between the road and rail sectors this could be an overarching body responsible for the Productivity of all freight; and
- The development of a commercial regulatory framework for Road that clearly allocates risks between participants and ensures that pricing for heavy vehicle road usage accurately reflects the economic costs imposed