

**Submission to:** COAG Road Reform Plan Secretariat

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## 1. Introduction

CRRP review came into being on the recommendations of the Productivity Commission, which implied that the current pricing system needed reforming in order to make a more efficient and productive road supply. However, we believe that COAG's first reform should be of the supply side agencies that deal with road provision and providing more access. We believe if the government can reform this important role in road provision, the heavy vehicle industry can improve its capability for efficiency and productivity.

CRRP has made it quite clear that it is in favour of distance-mass-location (MDL) charging regardless of evidence presented, what the industry proposes or what its research suggests.

The ATA sees little evidence that changing the system of road pricing will combat supply side issues and will increase the productive capacity of the heavy vehicle fleet.

There are doubts over whether supply side concerns have been addressed sufficiently by the road pricing reform, which affects the productivity of the fleet.

The ATA has pushed to rationalise regulation and to make government bodies serve constituents and the industry to the appropriate standard expected. The ATA has constantly come up against difficulties surrounding CRRP data, CRRP progress and even a lack of CRRP consensus.

The ATA disagrees with the rushed nature of CRRP process; deadlines are being set at the expense of real progress.

Three departments are currently working on road pricing reform; the Productivity Commission, CRRP and the Henry Review. The fact the process isn't unique causes concern as there is little convergence or sharing or expertise on the matter. Each of these government entities should work together as a single body. Instead, there is a situation where there appears to be no coordination of information and no real desire to have consensus with the industry.

Conflicts of interest are apparent, with road agencies using CRRP to promote IAP. The reluctance to reform road supply is a prominent example of failure to look at the real issues surrounding road agency performance.

While MDL charging shows a desire to make prices closely aligned to road wear, reality will not reflect this because the MDL model is incomplete, poorly founded and lacks any industry backing.

In conclusion, the ATA fails to see how a partial, regressive and expensive system such as MDL charging would not have adverse affects on the industry. While at the same time, no more discipline is indicated for supply side reforms.

## 2. About the Australian Trucking Association

The Australian Trucking Association (ATA) is the peak body that represents the trucking industry. Its members include the state and sector based trucking associations, the Transport Workers Union, some of the nation's largest transport companies, and businesses with leading expertise in truck technology.

### 3. Recommendations

#### Recommendation 1

CRRP should ensure their outcomes fall in line with current tax reform policy objectives, of making the system support economic growth, fairness and simplicity.

#### Recommendation 2

CRRP should re-think how extra costs caused by MDL charging will affect the wider community – we predict increased costs of groceries, utilities and exports due to these being produced in regional areas, which will be penalised under MDL charging.

#### Recommendation 3

CRRP should find solutions that take the legitimate role of elected governments into account when discussing road provision.

#### Recommendation 4

CRRP should take into consideration human rights concerns in regards to intrusive government-monitored telematics.

#### Recommendation 5

CRRP should reform the supply side before attempting to change road user charging of the industry.

#### Recommendation 6

CRRP should improve accountability, transparency, external review, competition and monitoring in road provision.

#### Recommendation 7

CRRP should examine Infrastructure Australia's (IA) suggestions for road agencies as a guide for action to reverse decline in standards of road provision.

#### Recommendation 8

The ATA recommends an improvement in access for vehicles and more funds going to private road provision companies in the face of public service failures.

#### Recommendation 9

CRRP should move focus away from certainty of funds and flexibility for road provision to the real focus of supply side reform, accountability and transparency of decisions made by road agencies

#### Recommendation 10

CRRP should note the strength of the elasticities indicating lack of choice over route or vehicle switching and should make decisions based on the findings of these elasticities.

#### Recommendation 11

CRRP should reconsider its use of forward looking charges.

#### Recommendation 12

CRRP must present more concrete prices including reasoning for these prices to enable the industry to evaluate the extent of costs, and allow a realistic assessment of options.

**Recommendation 13**

CRRP should review its support for mass. Distance, location charging as other options may be more feasible for the industry.

**Recommendation 14**

The ATA recommends CRRP adopt a charging system that covers all heavy vehicles.

**Recommendation 15**

CRRP should note that telematics do not feasibly apply to the whole fleet. Benefits that are supposed to accrue to users won't happen as only a very small percentage of operators have the need for telematics in vehicles

**Recommendation 16**

The ATA recommends that CRRP review how they present data to the industry about mass distance location charging.

**Recommendation 17**

CRRP should acknowledge the fuel based charging model which shows that fuel burn reflects mass, distance and location without the complications and lack of values that MDL charging has.

**Recommendation 18**

CRRP should note that cross-subsidisation is acceptable and required in the many locations in Australia's road network.

**Recommendation 19**

CRRP should properly consider the engineering relationships of road wear in their deliberations and end the misconceptions of fuel based charges.

**Recommendation 20**

CRRP should consider the ATA's fuel based charging model on freight task costs, which indicate that price signals are inappropriate through MDL charging.

## 4. Institutional Realities

While the CRRP may have faith that institutional reforms will move in sync with the charging reforms there is little historical evidence to suggest the system will change for the better. Along with these doubts we point to government policy which indicates that CRRP outcomes run contrary to ministers' wishes.

## 5. Tax Reform

In the recent announcements by the Australian government, tax is going to be reformed<sup>1</sup>. The CRRP findings are out of step with the objectives of the tax reforms (which are prioritised over the CRRP findings) due to the political context of taxes. Failing to achieve what the tax reform sets out to do and failure to take these reforms into consideration will only set to embarrass the government and ignore the reality of the situation.

While the Tax Office is not in charge of this reform, they will be affected by whatever the CRRP instigate and we believe that the ATO would not have decided to implement a policy that contravenes simplicity, fairness and robustness of charges.

The tax reforms are built around 3 key elements:

1. Reform to make the economy stronger – the reforms call for tax to stop incentives for avoidance and evasion. It also states that reforms that improve incentives across the system can help deliver a stronger economy with more jobs and better wages for everybody.
2. Reform to make our tax system fairer - so that people are not burdened with taxes that are disproportionate to their situation. The cost of delivering quality public services is spread fairly among those with the capacity to pay.
3. Reform to make our tax system simpler – The government admit the complexity of the tax system imposes costs on tax payers because of the diverse nature of Australia. The report stated “This means there are real benefits to making the system simpler, when this sometimes also means it becomes less targeted.”

The CRRP does not sufficiently address each of these fundamentals. The introduction of a telematics based system will lead to operators trying to avoid paying more. The technology suggested to monitor operators is not infallible, and there is evidence that shows the technology is certainly not tamper proof. This will not make the economy stronger. We have seen with the increase in A-trailer charges that the system allows operators to register A-trailers as semi-trailers. These CRRP proposals will penalise those who abide by the law, and those who choose to circumvent it will be rewarded under this system.

The costs the charging system requires for compliance are so high that companies are likely to employ extra administration staff to manage the additional data that such a demanding system would produce. This is a misallocation of resources in the industry. It would simply increase the red tape and unnecessary expense that surrounds the industry.

These costs have consequences. Operators can either pass on the costs to customers (higher prices for customers), operators can absorb the costs (lower profits or running at a deficit) or they can leave the industry because of the extra financial burden placed on them.

*CRRP Proposal will not make the economy stronger*

Making the tax system fairer is a key statement. CRRP system states that those who use high maintenance cost roads will pay more. This will mean that rural and regional Australian roads will be more expensive to use. The CRRP system will have social effects that have not been considered in their evaluation. Operators who work in less developed areas of Australia, many of whom are farmers or subcontractors to mines, will have extra burdens. This system is not fair and we cannot see any government wanting to charge rural and regional operators more than urban operators.

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<sup>1</sup> The Australian government - Tax Forum – Discussion paper – Tax Reform, Next Steps For Australia 2011  
Submission – COAG Road Reform Plan  
Preliminary Findings Consultation Paper

The cross-subsidisation that occurs makes the current charges reasonable, as operators who use rural roads are subsidised for using higher cost impact roads, while at the same time paying for urban road strengthening so that urban operators can benefit.

*The CRRP proposal is not a fair system of tax*

The biggest failing is that the CRRP reforms will hugely complicate the system beyond what any road agency would be willing to do. Currently it is simple to pay a road user charge and registration, introducing three separate charges that change everyday is simply unfeasible for the agencies to cope with, it will be an overload of information. While the data rich information may help the road agencies pinpoint where the fleet goes, it would be a nightmare to administer and is based on doubtful foundations.

*The CRRP proposal is not a simple system of tax*

The current system works well as a charge; it brings in required revenue, it is not generally prohibitively expensive to administer, and does not cause adverse welfare effects. CRRP have not been clear whether proposed MDL charging fits well with the government's wishes for tax reform.

### **Recommendation 1**

**CRRP should ensure their outcomes fall in line with current tax reform policy objectives, of making the system support economic growth, fairness and simplicity.**

### **Recommendation 2**

**CRRP should re-think how extra costs caused by MDL charging will affect the wider community – we predict increased costs of groceries, utilities and exports due to these being produced in regional areas, which will be penalised under MDL charging.**

## **6. Political Objectives**

Politicians are elected on promises of providing better infrastructure for their constituents. While CRRP may like to believe they can remove a minister from the decision of road funding, it is unlikely this will ever happen. This democratic procedure serves a justified purpose; if voters want a road and push for it, it will be built. CRRP process makes no mention of this totally justifiable method of road provision; after all, roads are public goods and ministers represent the wishes of the public.

Heavy vehicle costs are greatly reflected in charges to customers. Increases in charges or costs (the CRRP proposal suggests large administration costs) will only increase the average cost of groceries for families. If these costs can be avoided then they should be in the light of these social costs, and another policy should be considered.

Nationwide and regional political policies are likely to dictate which infrastructure is built and maintained. The environmental concerns about indigenous fauna and flora now mean projects are delayed or re-valued due to these considerations. While these costs are considered in a tender, project costs and construction times still spiral well above government estimates.

This point indicates that concerns over accountability of road agencies and the decisions are legitimate; nothing CRRP has suggested addresses this.

Introducing a road pricing system will bring out just as many political concerns as providing roads. There are previous examples where invasive monitoring of motorists have been politically sensitive include Hong Kong. When in the 1980s a scheme of automated electronic charging was abandoned over concerns regarding the collected data. Similar concerns have also been raised in London and Oregon over privacy concerns<sup>2</sup>. While heavy vehicle operators are outnumbered by light vehicles, many people (voters) will not want to be monitored to the degree that CRRP is proposing. It is encouraging a big-brother society and could be disputed on human rights. Ministers may not feel comfortable pushing this policy, once fully appraised of these issues.

<sup>2</sup> Page 40, Infrastructure Partnership Australia – Urban Transport Challenge: A Discussion Paper on a Role for Road Pricing in the Australian Context

Ultimately, the problem CRRP is going to face is whether COAG is happy to sign off on an agreement that sets to strip ministers of their ability to implement their policies, along with having competing opinions from the Henry Tax Review and the Productivity Commission that disagree with the administration of their charges.

**Recommendation 3**

**CRRP should find solutions that take the legitimate role of elected governments into account when discussing road provision.**

**Recommendation 4**

**CRRP should take into consideration human rights concerns in regards to intrusive government-monitored telematics.**

## 7. Supply Side Reform Concerns

Supply side reform should come before all other issues. We do not believe that a new pricing system is needed in order to reform road provision. CRRP concedes the success of their pricing reforms depends heavily on the government addressing the huge concerns the industry has regarding:

- accountability;
- transparency;
- decision making;
- external review;
- competition;
- monitoring; and
- the appropriateness of charges.

The matter that urgently needs more work is improving the accountability of the system; CRRP has recognised this<sup>3</sup>.

*Simply introducing more direct road use charges is insufficient in and of itself to provide incentives to road providers to provide services beneficial to heavy vehicles<sup>4</sup>.*

Infrastructure Australia (IA) has also expressed concerns over the lack of action in supply side reform and calls for strong reform in order to make the system work efficiently. The lack of dedication and inaction on fixing supply side mechanisms gives us no indication that CRRP will take the IA comments into consideration.

IA has made submissions to COAG for the past 3 years and each submission has stated the failure of governments to provide efficient road provision. The most recent report states there is ‘continuing weakness in infrastructure investment and planning.’<sup>5</sup>

The IA states flaws that have not changed since its last report in 2010:

*Progress in improving infrastructure planning, policy development and project evaluation has been slow.<sup>6</sup>*

*Inaction in reform*

IA Complains that the infrastructure sector seems to think it is insular and too complex in its actions that national reform can’t be considered<sup>7</sup>. Along with this, IA calls the government to “embrace the need for reform.”<sup>8</sup>

<sup>3</sup> Table 3.4 Preliminary Finding 9, CRRP, Preliminary Findings Consultation Paper, 2011

<sup>4</sup> Page 5, CRRP, Preliminary Findings Consultation Paper, 2011

<sup>5</sup> Page 8 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>6</sup> Page 2 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>7</sup> Page 19 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>8</sup> Page 6 Infrastructure Australia – A report to the Council of Australian Government 2011

There are real concerns that there is a failure to address the lack of action of institutional reform and this has exacerbated the decline in productivity. IA state there is an urgent need for action and that the government “cannot be complacent or self confident”<sup>9</sup>

This supports the industry’s concerns that reform is well overdue and slow progress suggested by IA says is evident in the lack of a concise plan for action in reforming road agencies. The fact that IA recognises that productivity has been stalled by the poor performance of road agencies also supports the ATA calls for greater access for more productive vehicles.

#### *Lack of planning*

Planning procedure and planning knowledge of road providers has been criticised and IA states the projects “being presented to IA that do not align well with the proponents own strategic decision and plans”.<sup>10</sup>

IA has provided seminars in improving provision planning. We see no reason to believe that if it has come to this critical stage of intervention by the IA without due cause. How can the industry have faith that road agencies would do an adequate reform job even with IA involvement?

#### *Bad governance*

IA makes the point that if the current system of governance is broken in terms of providing efficient outcomes then there should be acknowledgement there needs to be a change.<sup>11</sup> IA questions the reliability of councils and committees involved with provision decisions.

Failings in infrastructure have come primarily from poor leadership, and the fact that government and business have failed to debate this very important issue because they wish to avoid difficult topics of discussion according to the IA. This is a very damning verdict and confirms what the ATA and industry have known for a long time; there needs to be a streamlining in governance.

#### *Lack of contact with voters and industry*

*The transparency to the industry and the community of progress and results of some committees is an area that needs attention.*<sup>12</sup>

The industry has not been consulted on what it needs, leading to access issues, and poorly targeted maintenance.

IA calls for reform in line with a number of the ATA’s proposals:

#### *Improved access for vehicles*

IA calls for greater access for high productivity vehicles. “The productivity benefits that come from going to high performance vehicles is striking.”<sup>13</sup>

The ATA believes this should be improved in order to access greater productivity of the fleet.

#### *Greater consultation with the industry*

“Greater contact with the industry and its customers on location, priority and scope of improvements on some roads.” is what IA calls for. This is in line with the Henry Tax Review and Productivity Commission’s view on improving communication.<sup>14</sup>

#### *Encourage private sector funding*

IA suggests a strong line of reform to allow more private financing to happen in order to achieve better outcome than what is currently happening<sup>15</sup>.

<sup>9</sup> Page 2 Infrastructure Australia – A report to the council of Australian government 2011

<sup>10</sup> Page 20 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>11</sup> Page 22 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>12</sup> Page 22 IA – Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>13</sup> Page 55 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>14</sup> Page 54 Infrastructure Australia – A report to the Council of Australian Government 2011

<sup>15</sup> Page 54 Infrastructure Australia – A report to the Council of Australian Government 2011

If agencies cannot provide roads at a competitive nature then this is justifiable as an unbuilt, over budgeted road, is a loss for the Australian economy.

These problems and solutions to supply side reform suggested by IA have confirmed the issues the ATA and the industry knew existed, and the IA report gives little hope that supply side reform will come willingly from road agencies. It also gives a stronger indication of what should be done rather than anything CRRP has suggested.

CRRP reform is totally hypothetical and the reality of the situation does not fit. If CRRP is serious about reforming supply side incentives it should look closely at what IA have suggested and give a clear indication of what the ATA and the industry expect in supply side reform.

***Recommendation 5***

**CRRP should reform the supply side before attempting to change road user charging of the industry.**

***Recommendation 6***

**CRRP should improve accountability, transparency, external review, competition and monitoring in road provision.**

***Recommendation 7***

**CRRP should examine Infrastructure Australia's (IA) suggestions for road agencies as a guide for action to reverse decline in standards of road provision.**

***Recommendation 8***

**The ATA recommends an improvement in access for vehicles and more funds going to private road provision companies in the face of public service failures.**

## **8. Examination of CRRP Supply Side Reform Details**

The greatest concern of CRRP is the certainty of funds. We agree that road provision needs to be revised so road providers can make better decisions. However this, and improving the competitive nature and 'impartial oversight' of road provision, should already have been happening. As supply side issues are attached to pricing reform, it should have a more prominent role given the level importance or even giving a general idea of how it might be improved. Stating these issues need to be addressed and their wish for a suitable end result of the pricing system without a plan is not sound.

Poor road construction and maintenance compounds the wear caused by weather and heavy vehicles. However, heavy vehicles bear the costs of poorly constructed infrastructure and the industry is expected to pay for those poor provision decisions. Heavy vehicles are incurring costs greater than the fair attributable costs due to higher costs of repair and maintenance on these roads

CRRP suggests providing more funds and that increasing those funds will address poor road provision decisions. The benefits described in this paper, such as better maintenance, lowering life cycle costs of rehabilitation and road surfaces, will not materialise without stronger oversight and accountability of road agency spending decisions.

Flexibility for road providers needs to be explained more. Road providers should be under the same examination as any other public body. The lack of transparency and appeal over road manager decisions is the biggest concern the ATA has regarding the supply side reform.

By flexibility we assume CRRP means in budget, construction time and outcomes. This is contrary to the benefits stated above. This will not discipline road providers and will certainly not lower the life cycle rehabilitation costs and construction time to what is optimal. Public decisions should be reviewable by the public.

The case study provided about cost efficiency on improving funding certainty is inconclusive. It states an example in Western Australia but doesn't give evidence of the outcome, whether the certainty of funding continued, or even if it was a success.

How can charging a more direct heavy vehicle charge to a subset of the fleet have a greater affect on road provision incentives? This will not improve road provision for the whole fleet because only those vehicles in the opt-in scheme will be providing data for analysis.

The inclusion of gross benefits from more targeted investment of \$2.7 to \$7.5 billion in present value terms over 30 years is a useless sum as it does not include costs. This is a one sided presentation and of no value.

We fail to understand how this paper claims it has calculated benefits from road investment. The calculated improvements for the effects of selecting more productive heavy vehicles and that road providers cost efficiencies due to better certainty; is disputable.

The problem associated with efficient road provision funding according to CRRP is a trade off between light and heavy vehicle funding provision. The ATA states that initiating a fund that allocated funds from revenue collected from heavy vehicles solves this problem.

The ATA fuel based charge model encourages a dedicated road fund to be set up; this is in line with what CRRP are suggesting. While CRRP has some questions about the details of such a fund we have addressed them.

1. The objective of the fund

We see the objective as being to give funding to road providers.

2. Whether the fund is nationally or juristically based

We would have all heavy vehicle charges collected and allocated centrally

3. Criteria to guide allocation decisions

We have this in the framework of our model.

4. The governance and institutional arrangements for the road fund including:

An independent advisory board would provide advice to ministers about the way funds should be distributed.

- a) The makeup of the board responsible for making fund allocation decisions (i.e. independent members, ministers, etc ;)

We believe it the heavy vehicle industry must be central, as the funds are derived from our actions; we have an interest to see no misuse of the funds.

- b) Whether there should be scope for the fund to save and/or borrow funds to finance planned investments; and

We would anticipate the fund make an appropriate contribution to the total required funds.

- c) The entities that can claim funds (e.g. road agencies, local governments and other transport agencies);

We would allow road agencies and local governments to claim funds; we might consider other transport agencies.

5. Arrangements for oversight of the fund.

All the intended benefits of reforming the system can be achieved with a dedicated road fund and the ATA model has explicitly pointed out all the benefits of our system.

The public utility model is less cohesive in its aims. The model indicates little accountability as money is given to road providers on the terms of network use; therefore those with a larger network are simply receiving more money.

Funding for road provision exists now. Our concern is they need to be efficiently spread and spent.

The report states that charges will accrue to the state where the charges are collected and how this revenue is transferred to road providers is another issue. There seems to be no real haste to reform the supply side of the transport sector. Allowing jurisdictions to hoard revenue will not lead to better road investment, and will have maintenance issues. There is no evidence the RTA manage these funds appropriately. NSW RTA already receives funds as CRRP is proposing.

The CRRP's result will have dramatic effects on legislation; therefore institutional government reform for the supply side should add minimal impediments to the situation.

The CRRP has included that the new national framework should 'be flexible to allow for the adoption of alternative charging systems including opt in schemes where there are mutual benefits from using technologies'. This suggestion indicates technology based charging options are to be considered above all others, and that technology, if not adopted now, will be present in future charging methods.

When discussing the importance of maintenance and investment, which goes towards the road user charge. CRRP includes the sentence "given that road are used by both heavy and light vehicles, the benefits from heavy vehicle funding reform alone are likely to be more limited." If this is the outcome that CRRP expects, why is the effort being directed towards a poor result? Wouldn't it be wiser to spend effort considering a model that will work?

Finally, the ATA stated in our last submission that benefits of implementing a new charging system will exceed costs when the 'opportunity to improve incentives for maintenance and investment provision are realised'. Supply side reform is the only way road reform pricing will ever meet the objectives of COAG.

### ***Recommendation 9***

**CRRP should move focus away from certainty of funds and flexibility for road provision to the real focus of supply side reform, accountability and transparency of decisions made by road agencies**

## **9. Heavy Vehicle Industry Impacts and Behaviour**

New vehicle technologies, like road friendly suspension (RFS), have allowed increased mass on heavy vehicles whilst limiting the amount of impact these heavy vehicles have. In fact the impact of heavy vehicles with road friendly suspension operating at higher mass limits is the same as the same heavy vehicle with non-RFS operating at General mass limits.

The axle mass or axles mass distribution is a good indicator of ESA, and CRRP appears to be confused when it states charges are differentiated according to mass of vehicles. This indicates that it is mass per se and not mass per axle that is being examined. ESA is a better indicator of road impact. The NTC ESA calculation is inaccurate, and the ATA has corrected ESAs to reflect the cost per 1,000 tonnes.

Volume, not mass, play a larger role in freight. The efficient loading of heavy vehicles needs clarification – what exactly is efficient loading? Efficiency of spacing or efficiency of weight? There are different weight limits which are the legislative efficient level of loading; a pricing reform system does not change those regulatory matters.

Efficiency of the fleet cannot be achieved with a more direct road pricing system. The industry already operates at its most efficient level by using the road network accessible and fleet mix.

CRRP asks what are the chances of opportunities for the "charges to provide incentives for more efficient use of the road network". There are limited opportunities for more efficient use of the road network due to the constrained choice of routes. The industry is making the best use of available routes and while agencies continue to deny access, efficiency improvement in this area are restrained.

Behavioural changes in the industry are not likely to happen and the CRRP research shows that the likelihood of that occurring is very small.

- Freight travel on freeways and arterial roads is nearly 3 times less responsive to changes in heavy vehicle charges than travel on local roads.
- 11% of travel on local roads can be done on an alternative route, 25% on freeway routes.
- 1% increase in heavy vehicle charges decreases the number of vehicle kilometres by at most 0.18%

CRRP research indicates that changing driver and operator behaviour is limited to how flexible Australian roads are to the demands that are made of the heavy vehicle industry. When origins and destinations are fixed, there is little scope for route changing. Any suggestion idea that this is possible is only referring to at best 11%-25% of roads.

Vehicle switching has an incredibly low incidence of happening, operators use what they have and will make economical decisions which is likely to lead to switching to cheaper to run heavy vehicles at replacement; in this case switching from articulated heavy vehicles to rigid heavy vehicles is a real risk. CRRP is aware of the NTC A-trailer registration increase, which is having adverse affects on the fleet mix in terms of safety, productivity and efficiency. Operators are simply parking up A-trailers due to the costs and using semi-trailers instead. Operators are now wary of investment that can be taken through large increases in charges.

We are likely to see lack of investment in new capital, and operators changing combinations on replacement to avoid the A-trailer increases.

Freeway travel is especially less responsive to changes in heavy vehicle charges compared to local roads. There are no alternative routes in the majority of cases meaning that heavy vehicle behaviour will not change and so the benefits (from reduced wear costs) of direct pricing on those roads are small.

CRRP ignores its own research and figure 4.1 of estimated potential benefits is counterintuitive to the above findings, and it appears CRRP is disputing its own evidence.

There is little chance of switching to larger vehicles for those who cannot afford it. Benefits arising from fleet management due to in-cab technologies are controversial and limited in their implementation. The safety benefits that are supposed to come from heavy vehicles driving less kilometres is spurious in its correlation, as we are likely to see bunny-hop operations where freight is simply passed from vehicle to vehicle, as was seen in the past.

The under provision of access for modern prescriptive modular combinations limits route selection available. This is something that regardless of the pricing reform should be resolved. Better asset management would have allowed these productivity enhancing measures.

### ***Recommendation 10***

**CRRP should note the strength of the elasticities indicating lack of choice over route or vehicle switching and should make decisions based on the findings of these elasticities.**

## **10. CRRP Proposed Options Have Pitfalls**

The options CRRP are proposing are not well supported via empirical and consistent evidence.

CRRP appear to believe the ATA fuel based charging model is disadvantaged as it involves averaging across the model on some vehicle types. The CRRP solutions also involve a significant amount of averaging.

CRRP points out that minimising averaging in the mass distance, location model is important, yet in the previous sentence states that when “considering practicalities of the model some averaging will happen”. We anticipate far more errors to arise through the CRRP model than with the current PayGo model.

The language used to describe the charging principles is of concern to the ATA.

- Recover the efficient cost of providing, maintaining and operating roads for use by heavy vehicles.

CRRP state they need to consider how remaining heavy vehicle allocated costs of road provision and maintenance are recovered. The MDL charging proposals would indicate it is not just marginal costs that are to be charged to the industry.

- Be forward-looking and provide incentives for efficient and effective ‘life-cycle’ road provisions and maintenance.

We do not expect to give money for unknown future projects; we pay for the damage caused, not expected to be caused.

Be determined with reference to:

- The marginal cost of road provision, maintenance and operation.
- The transaction costs associated with the charge.
- The extent that heavy vehicle road users are able or likely to respond to price signals.
- Minimising distortions to the efficient pattern of use of the road network.

Road users do not respond strongly to road signals. Shortest distance is usually what makes the difference. Pricing a road, which is not a competitive entity, will not create choice for users. What are the 'distortions' CRRP are referring to?

- Be developed through a continuously improving transparent and public process

This should be at the forefront of CRRP's action list. The success of the pricing scheme depends heavily on road agencies having accountability and transparency.

It is not identified how mass-distance-location charging satisfies these principles better than fuel based charging.

CRRP notes the cost of administration and the complexity of charging system will mean benefits will not outweigh the costs. However, there is no evidence of cost calculation, only benefit analysis. This task is missing a vital complement; people do not buy a product based purely on the benefit the product offers, the cost of the product is also a significant factor in the purchasing decision.

The section relating to costs of introducing a more direct road charge is poor; the discussion regarding the information framework on which the system will exist as having an influence on the outcome is a major understatement.

Preliminary finding 13 states there is enough evidence to economically and feasibly support charging based on static mass, actual distance and location. Where is this evidence provided in the report?

#### *Mass charging*

There needs to be clarification on exactly what mass is being measured. The mass types referenced are dynamic, operator nominated mass and static mass. The apparent intended measurements are inconsistent with sound engineering. Dynamic mass is rejected, as it is too difficult to measure, and therefore static mass measurement is stated. The measurement of weight used is average gross mass and is taken from a static mass measure of mass.

However, the term dynamic mass appears throughout the paper. Mass critical loads are said to be measured by dynamic mass. How can the charges incorporate this unique weight measurement and what does the mass critical load definition mean for operators, are they expected to be able to adapt between measuring dynamically and statically? CRRP need to clearly identify which method of mass measurement is meant.

When CRRP requests input on how to measure mass, most of the suggestions are averages, and indeed the one it primarily chooses, that of static average gross mass, is an average. How will the averaging per vehicle actually work – fully laden, unladen, actual loads, average of commodity by vehicle, fleet wide by class (same as PayGo).

If heavy vehicles are charged on the basis of mass, how will this promote competition between road freight providers and provide an efficient road network?

The mass charging section is untidy. The best way to determine impact of road use is ESA and the numbers of trips as an indication of impact.

#### *Distance charging*

CRRP states that actual distance travelled is a better reflection of road costs than fuel based charges, as alternative fuel vehicles will pay their way. The ATA model intends capturing alternative fuel vehicles on equal terms through the energy density of fuels.

Fuel burn varies with load. Distance does not provide any data on road impact, merely what road use is and the distances that industry is driving. Data on distances can be provided in other ways in order to help road provision and should be budgeted in road agencies tasks; there should be no need to monitor the heavy vehicle industry to obtain this data.

CRRP says that distance charges will give a signal to users about the cost of road use; this will be a poor indicator as the choice of roads is available to heavy vehicles limited in Australia.

The inclusion of utilities as an example of applying for access is not comprehensive. Utilities have three costs – a connection charge, a standards charge and a step up charge for extra units used. This will only encourage the problems we have seen in WA with local heavy vehicle operators getting contracts while out of state operators are ignored and pushed out.

#### *Location*

CRRP says it is not feasible to charge by location. However, location is still discussed ignoring the negatives of this specific charging. There would be a large amount of averaging present with location charging as it is based on a static average mass measurement estimates and average road costs. Distortions in the measurement due to the wrong mass inputs would have incorrect inputs into this element of the charging.

CRRP classifies roads using the NTC local and arterial road classifications; however PayGo uses the same classification, therefore CRRP classification is not an improvement on the representation of different number of road conditions that drivers encounter. We can see wrong recovery as a result of this lack of road variation. The charges will be based on poor foundations.

#### ***Recommendation 11***

**CRRP should reconsider its use of forward looking charges.**

#### ***Recommendation 12***

**CRRP must present more concrete prices including reasoning for these prices to enable the industry to evaluate the extent of costs, and allow a realistic assessment of options.**

#### ***Recommendation 13***

**CRRP should review its support for mass. Distance, location charging as other options may be more feasible for the industry.**

## **11. The Target of Charges**

CRRP comes to the conclusion that the first trial of the proposed scheme would affect multi-combinations and heavy combination trucks, which have the best level of efficient outcomes and costs involved.

Without comparison to rigid heavy vehicles how can a proper value judgement be made? We fail to see the logic in this decision.

Rigid heavy vehicles are discarded (except 4 axle rigid heavy vehicles) from any of the analysis. How will the charges affect the classes? We can only assume the costs of the new system will be passed onto them even if they do not come directly under new charges. Preliminary finding 13 also adds to the confusion over where CRRP stands on rigid heavy vehicle charging, as it states that heavy rigid vehicles are technically and economically feasible to charge.

How can mutual benefits arise from an opt-in scheme for the use from technologies; CRRP should be more forthcoming about what those mutual benefits would be. Larger operators may be the only ones available to opt in, and are a minority; this policy does not appear to have been well considered.

The ATA does not support a partial solution to charging. Charging only multi-combinations is not a solution to charging reform. The CRRP system would indicate that 3 charges would co-exist at the same time; that of direct pricing, fuel based road user charge and vehicle registration.

CRRP should be aiming for a policy that will work fleet wide and nationwide that is easy to implement. We are curious to know how charging revenue being kept by jurisdictions fits with the COAG principle of a national registration model.

Charging the most mass laden and longest distance vehicles – articulated heavy vehicles; may have adverse effects as these vehicles are some of the most productive and safest in the fleet.

If this project is not cost effective and far too complicated, then serious reconsiderations should be taken before any further steps are made in order to prevent the crippling of the Transport industry with ineffective and selective charges.

CRRP appears to ignore that direct user charges for multi-combination heavy vehicles will have more implications than simply ‘existing heavy vehicle charges and funding flows.’ It will have far reaching impacts on heavy vehicle investment and on inefficiencies due to system costs.

#### **Recommendation 14**

**The ATA recommends CRRP adopt a charging system that covers all heavy vehicles.**

## **12. Telematics**

The push for the use of technology in the new pricing creates unease because technology can be fraught with accuracy issues as well as the economical feasibility of such technologies.

While some of the technologies mentioned in the report already exist in the fleet, adding IAP technologies parallel to systems already in place is a bigger issue than CRRP is acknowledging. Many operators will not want to incur extra costs when there is limited benefit. Operators that already use telematics would not switch over to the government system; it would involve a huge programming project, huge costs of implementation and extra monthly and yearly costs on top of those. This is not a cost effective method for the industry.

Investing in telematics as part of an operator’s fleet management system will only be of any use if the operator wishes to use it, and was already considering it anyway. Systems in place already provide real time inventory data to customers, a government installed IAP is not necessary with a sensible pricing reform.

Any implementation that costs the industry a large amount per heavy vehicle is not justified, and we believe the industry should not have to pay for poor policy implementation.

Stating that the costs of technologies can be shared across additional uses does not justify implementation; it would be a first if a policy was implemented in order to offer management support.

We are perplexed by the statement that because the implementation of such systems hasn’t been in the feasibility report that it is therefore more feasible. We find this an unacceptable illogical conclusion. IAP has been implemented in NSW without a CBA being publicly undertaken, and there is no evidence that its current use is feasible or of any benefit to anyone, government included.

The statement that any implementation of a system has to be aware it does not “foreclose on current technology in use or the use of information for other beneficial purposes beyond charging that might arise over time” is a very real risk. If the government is providing IAP there will be little incentive for a competitive market to gain ground and lower prices for telematics to operators. It costs a telematics operator over \$280,000 to become a certified IAP service provider along with exorbitant costs if the IAP service provider then wants to alter the system. These costs limit the ability for strong competition and also increase costs to operate due to cost recovery required by the IAP service provider.

The cost of IAPs will either have to come out of the heavy vehicle operator’s pockets or will be offset with future payments – and technology isn’t static, it is constantly updating, and this innovation cannot be factored into the price.

CRRP appears determined to impose an extra tax on an industry where profit margins are around 3% per annum. The estimates of \$5,000 to \$10,000 per rigid vehicle and \$5,000 to \$17,000 for articulated heavy vehicles are excluding installation costs for telematics, which would expand these numbers significantly.

The system the CRRP wants to implement is data rich. What is the cost of all this data processing? Listing technologies that would be implemented without giving an estimate of costs, especially not giving an indication cost for rigid and articulated heavy vehicles can not allow us to make a proper assessment. How can a feasibility study be presented without any valuing being compared?

Technologies nominated for location charging are fraught with problems. An electronic tag system is ruled out because it would need gantries which are too expensive to provide. GPS technology has its own problems and user nominated location has compliance issues.

#### **Recommendation 15**

**CRRP should note that telematics do not feasibly apply to the whole fleet. Benefits that are supposed to accrue to users won't happen as only a very small percentage of operators have the need for telematics in vehicles**

### **13. Chart and Data Evaluation**

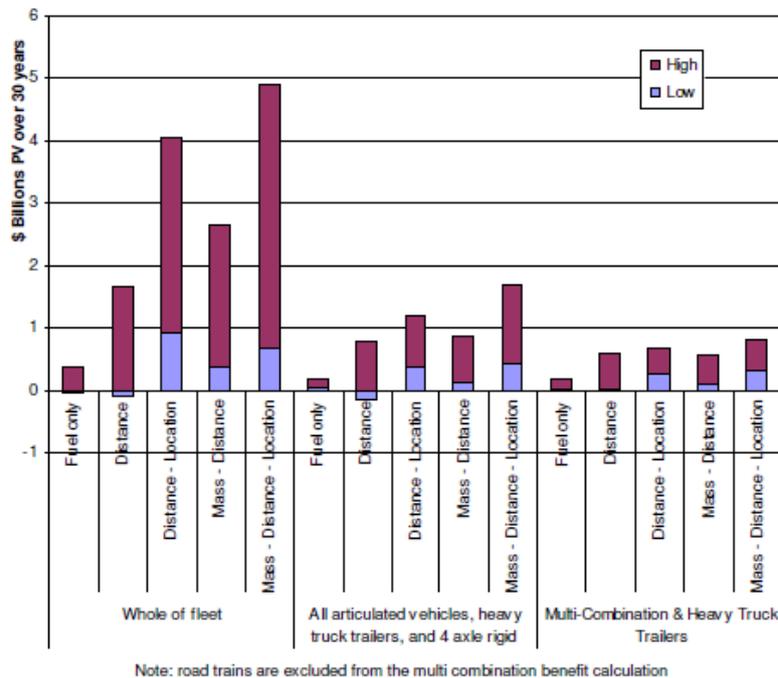
*“High level results supports the introduction of more direct heavy vehicle road charges based on a measure of static mass of the vehicle, actual distance travelled and its location on the road network.”*

Throughout this paper the charts used are not comprehensive in their nature. We have not been given any raw data on how these charts were created. We have no indication as to where this data has come from and it appears to have been created for CRRP purposes. For example:

1. Whole fleet – Does this include rigid heavy vehicles?
2. All articulated truck vehicles, heavy truck trailers and 4 axle rigid – Why has a rigid heavy vehicle been included with all articulated heavy vehicles when it is obviously of a different nature in its use and impact?
3. Multi-combinations and heavy truck trailers – why have heavy truck trailers been included twice in the classification?
4. Exclusion of road trains – Why are road trains excluded from figure 4.4 and 4.1 but must go into the calculations for figures 4.3?

CCRP Figure 4.1

Figure 4.1: Benefits from charging options alone by vehicle segmentation (\$2011 present value)



- Why are road trains excluded from this calculation? As multi combinations are the first vehicles to have the CRRP charges upon them, it is confusing to see that an important subset of multi-combinations has not had proper analysis carried out on road trains:
- Why are articulated and 4 axle rigid heavy vehicles in the same category, while there is no separate explanation for rigid heavy vehicle benefits?
- More explicit explanation of the high and low benefits should be done.

The results presented are counter-intuitive to what we have previously read in the CRRP paper. The statements accompanying the chart illustrate the accuracy and concerns we have about the inclusion of these charts.

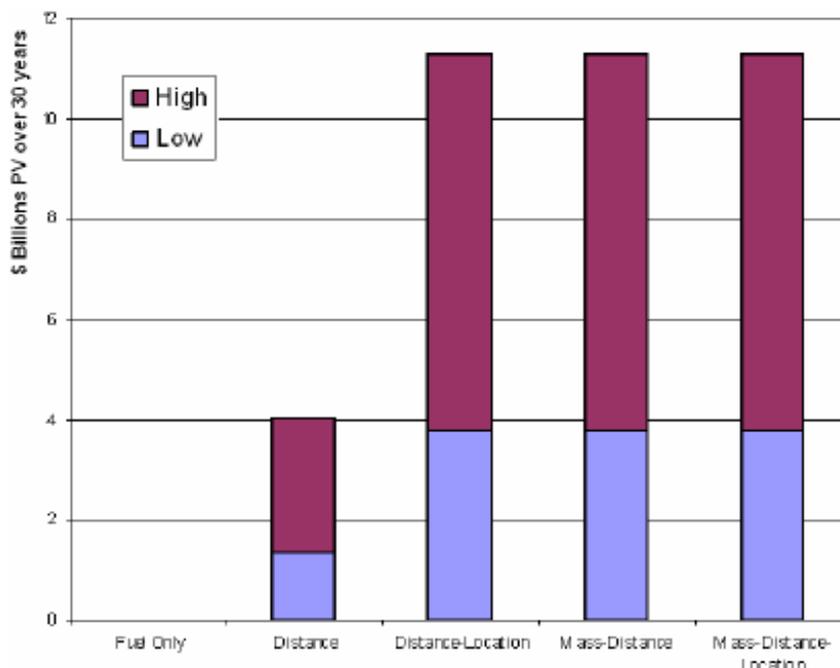
The use of dynamic mass as a measure within the CRRP’s data is confusing and misleading. If CRRP have previously advised industry that dynamic mass is not feasible and will not be included, why is it now included in CRRP documentation?

The accusation that the ATA’s fuel based charging model and the distance measure use more averages than the other models does not make sense. The dynamic mass model doesn’t involve averaging but if the model is not going to happen, why include it in the first place?

The statement that fuel and distance provide lower signals for the efficient use of roads is not sound as it does not provide any further detail about it.

CRRP Figure 4.2

Figure 4.2: Benefits from improving incentives for more efficient maintenance and provision of roads (\$2011 present value)

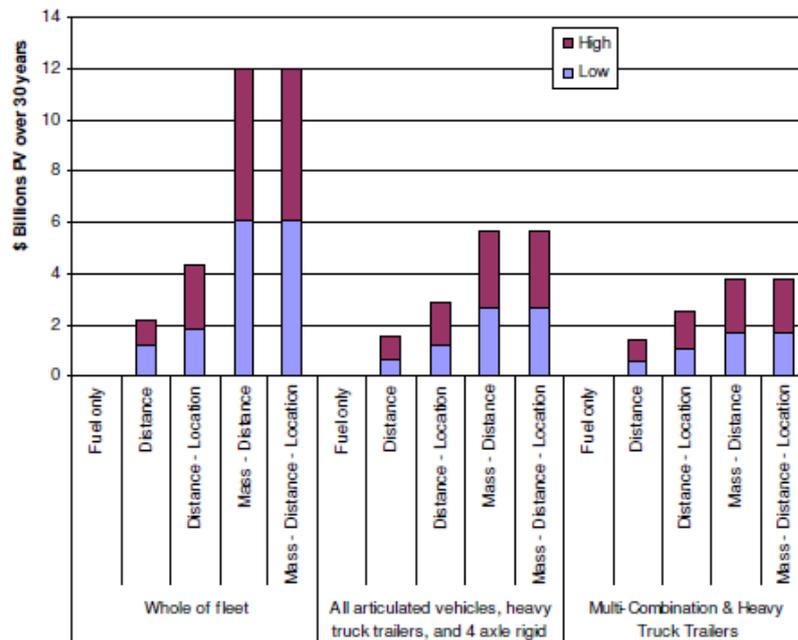


- This chart does not factor in how funds are disbursed; we cannot see how any of the suggestions can have measurable benefits, as they are so closely tied to how funds are actually distributed.
- Why is the collection method so related to the expenditure? We have no material so far that supports better expenditure options under the CRRP.
- The lack of fuel only inclusion is very frustrating, particularly as we included our fuel based charging model which clearly explained how incentives for maintenance and provision would occur. As there is no negative bar we can only assume that CRRP chose not to investigate the fuel only option. How, then can CRRP arrive at any conclusion regarding the ATA’s fuel based charging model, let alone a conclusion not supporting the model?
- Why is it that distance-location, mass-distance and mass-distance-location all have the same benefits? It is not legitimate to suggest this and then state the fuel only model has no benefits, particularly when the ATA’s fuel based charging model is not included in the analysis.

The CRRP options are supposed to give improved information on the location of vehicles within the network. We suggest that targeted road expenditure can be achieved without having to force IAP on to operators.

CRRP Figure 4.3

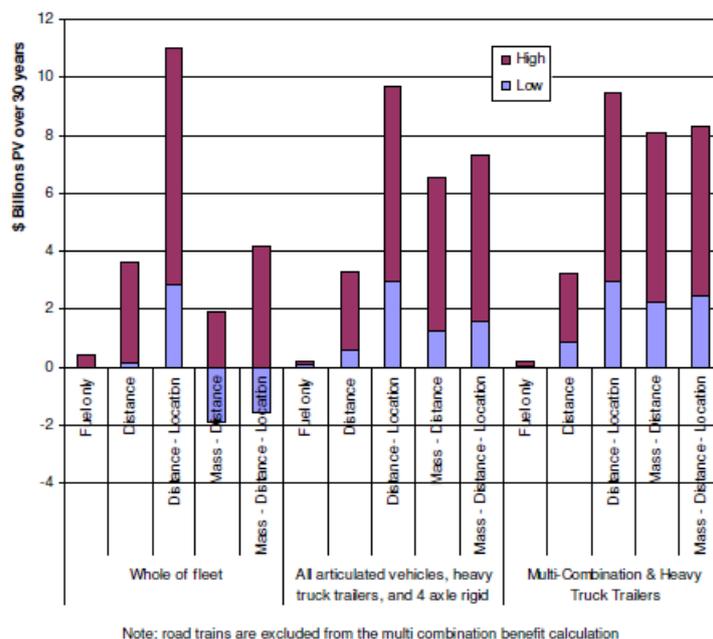
Figure 4.3: Estimated Cost by Vehicle Type (\$2011 present value)



- This chart lacks credibility as it does not include costs for developing billing systems, which could run into millions. This is a major cost omission.
- The costs include installing dynamic mass in each vehicle – if dynamic mass was declared by CRRP as unfeasible, why is it now valued?
- While the chart includes installation costs and compliance costs, we question the statement regarding extra registration costs. What are these?
- Installation costs are included in this chart, however in the beginning of the paper the costs of installing IAP in vehicle is estimated without installation. CRRP clearly have the cost of installation, why is it not included in this cost?
- The ATA’s fuel based charging model is the most cost effective, factoring all the issues discussed above. However, there is no mention of either in or after the chart.

CRRP Figure 4.4

Figure 4.4: Net Benefits of Introducing More Direct Road Use Charges and associated funding and expenditure reforms by Vehicle Type (\$2011 present value)



- Road trains are exempt from this benefit analysis, why?
- When looking at the whole fleet benefits, we see negative benefits for mass-distance and mass-distance location. Can you explain what these negative benefits are?
- The chart includes institutions in its benefit analysis; we see little evidence of any research into proposed plans for which made such conclusions possible.
- The statement that ‘without detailed costing, the benefits are too alike to indicate a preference of one over another’ is questionable. This is not a proper investigation.
- We find that CRRP appears confused about the definition of multi-combination and heavy vehicle trailers. It is not clear whether CRRP also include semi-trailers in their calculations as part of the other definitions?

**Recommendation 16**

The ATA recommends that CRRP review how they present data to the industry about mass distance location charging.

## 14. The ATA Fuel Based Charging Model

In light of the failings of the CRRP progress has made the ATA's fuel based charging model is even more applicable to solve the situation of productivity and efficiency. The proposed options which at this late stage in devolvement are still yet to have prices set, sufficient models tested and actual feasibility mean the outcomes would be very different to what we foresee being implemented.

Efficiency and productivity of infrastructure provision and road freight use are the sole aims of the CRRP project. The fuel based charging model offers a solution to both these vital elements driving the Australian economy.

The ATA fuel based charging model increases productivity as it allows greater access and accountability for road providers so that infrastructure is maintained and updated to be heavy vehicle compatible. The industry can be infinitely more productive if road access provision is improved.

The fuel model itself will promote productivity, as fuel efficient vehicles are encouraged under our model, while no such incentive comes from MDL charging.

Mass charging does not encourage productivity because mass is not dictated by efficiency, but by demand. If a customer requires an operator to deliver a tonne of grain, there is no way that mass charging will make the fleet more productive. It will actually have a negative effect, as mass may become spread over more vehicles in order to cut costs, therefore using less productive combinations on the same freight task.

Distance charging does not increase productivity. As the industry is already operating efficiently, operators cannot simply change routes to increase productivity and elasticity results have shown this to be the case.

Location charging won't increase productivity because location and productivity are not connected in any way. Origin and destination are mostly fixed; there is no way to change this.

The ATA model fuel improves productivity and efficiency by encouraging fuel efficient vehicles that clearly reflect road wear due to fuel burn with varying mass. While the industry tries to improve productivity, the largest barrier to productivity is the NTC's and agencies failure to provide improved access. It is a simple procedure that in the long term will lead to a reduction in the number of heavy vehicles on the road as more productive vehicles are adopted.

Administratively, the ATA's fuel based charging model is the most cost effective to implement. It seems that CRRP has not taken into account the sheer amount of money required to implement MDL, such as:

- Technology costs:
  - Every heavy vehicle will have to be fitted with technology. How much will it cost?
  - Technology will have to work either alongside or replace present telematics in operators business. How much will it cost?
  - Technology will have to be retro-fitted in vehicles. CRRP note: average vehicle age is 10 years. How much will it cost?
  - Updating technology monthly/yearly? How much will it cost?
  - Technology costs for the ATA fuel based charging model - \$0 for the whole fleet.
- Administration costs:
  - Employing staff to process billing. How much will it cost?
  - Employing staff to calculate exact costs of MDL for every heavy vehicle. How much will it cost?
  - Running the current PayGo system alongside MDL. How much will it cost?
  - Administration costs for ATA fuel based charging model is significantly less than MDL and does not require extra employees within government to create and process costs.
- Industry costs:
  - Cost of technology: How much will it cost?
  - Cost of employing extra administrative staff. How much will it cost?
  - Increasing costs to customers to reflect charges. How much will it cost?
  - Non-compliance penalties. How much will it cost?

- The industry costs of the ATA fuel based charging model are nothing. The industry does not have to change its vehicles in any way to reflect the charges, they do not have to employ extra staff and they do not have to automatically put up prices to reflect the cost of technology enforced on the fleet.

The ATA fuel based charging model can easily be applied to the whole fleet. The MDL model is only a partial solution with a vague idea of how long it takes to implement, and penalising more productive vehicles in the first instance is not going to have a positive effect on the industry.

#### *Cross-subsidy: welfare benefits*

While the idea of cross subsidisation does not sit comfortably with some economists on the CRRP board; it is a reality, a unique feature that actually helps to develop rural and regional Australia. While CRRP wants to eradicate the subsidisation that currently exists, the industry sees no need to repeal this welfare inducing policy.

Under CRRP proposals, operators will pay more for using rural roads, as they inherit higher costs of maintenance than better engineered roads. This is a regressive policy that will only serve to disable rural communities. Much of the powerhouse of production in Australia be it mining, livestock or mineral harvesting, happens in Australia's most isolated areas. A policy which sets to monitor mass, location and distance will only increase prices for these users to reflect the costs of infrastructure.

The benefits the cross subsidisation brings are fleet wide, as the industry needs to be able to use the whole network and encourage rural operators. There is no point in having an urban based fleet; removing the subsidy will change what operators are willing to do if CRRP wants to instigate charges that reflect individual trip impacts.

There are ethical reasons<sup>16</sup> why cross subsidisation works, it can be seen as having a redistribution effect of the industry. Welfare disadvantages are lower from a broad based tax system<sup>17</sup>.

Other utilities use subsidisation in pricing, and there is no reason why heavy vehicle pricing should be any different. In fact, CRRP is happy to use utilities as an example of their own proposed options. Telecoms, electricity and water supply companies have cross-subsidised prices in order to provide coverage. Queensland Government Electricity explicitly declared that it had a deliberate policy of cross subsidisation from metropolitan areas to rural consumers<sup>18</sup>.

The elimination of cross subsidisation may not make any difference to road provision, as the high cost of providing roads is more likely to put off investment than elimination of cross subsidisation.

#### *Fuel use tracks road costs*

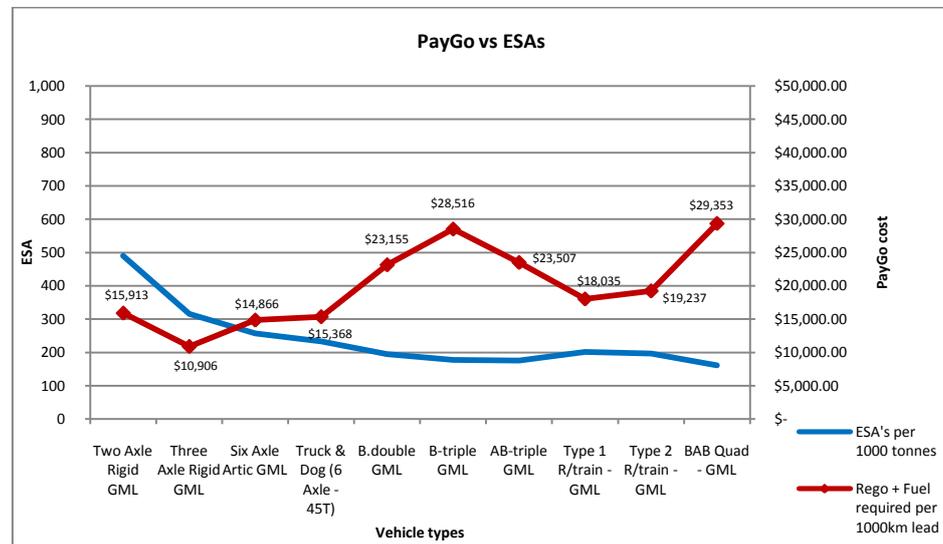
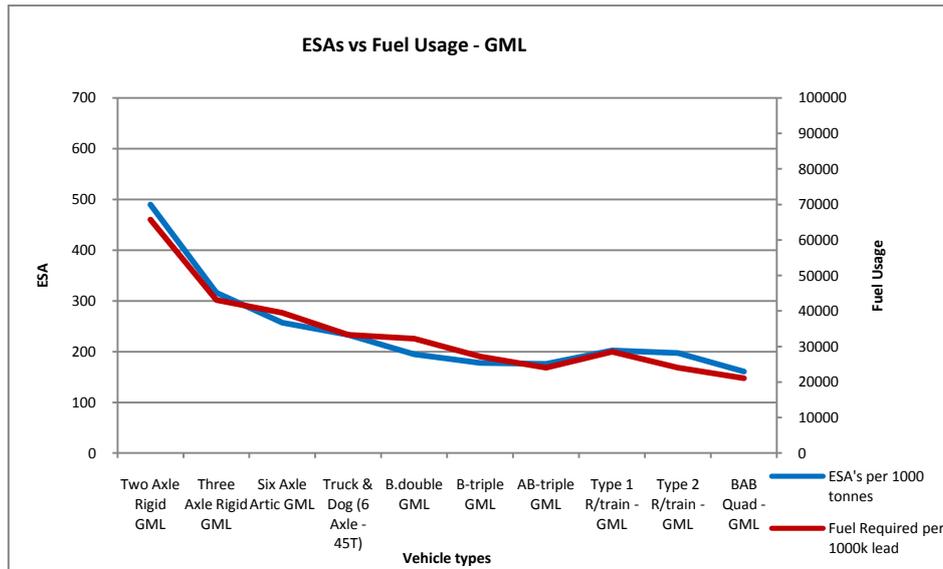
The ATA understands CRRP review is about reform that promotes efficiency in the economy. This is why having signals to encourage efficiency in how the freight task is undertaken is important. CRRP paper's discussion of "assessment of strategic fit" places, as the primary goal, the alignment of prices to actual costs imposed on the road network. This is so incentives exist to "optimise vehicle configuration choices in order to minimise costs and thus lead to more efficient use of the road network". Therefore, the ATA is pleased to demonstrate that fuel based charges send the right signals about road wear and vehicle configuration optimisation.

Roads are designed with regard to expected traffic of Equivalent Standard Axles (ESAs), and road wear is routinely assessed using this comparative tool. Reference to the graph below proves our view that on a freight task basis, fuel consumption reflects road wear very well. This graph is drawn from the ATA/Barkwood Consulting Pty Ltd Heavy vehicle Impact Chart, which has been peer reviewed, published and referenced as an authoritative source by consultants conducting Government business. It can be clearly seen that fuel based charges provide an ideal signal to operators to adopt suitable vehicles and operate them efficiently.

<sup>16</sup> Page 224 – *cross-subsidisation of rural areas via utility pricing policies*, The Australian Journal of Agricultural economics, volume 23, no.3, December 1981 Page 221-232

<sup>17</sup> Page 226 – *cross-subsidisation of rural areas via utility pricing policies*, The Australian Journal of Agricultural economics, volume 23, no.3, December 1981 Page 221-232

<sup>18</sup> Page 230 *cross-subsidisation of rural areas via utility pricing policies*, The Australian Journal of Agricultural economics, volume 23, no.3, December 1981 Page 221-232



The second graph has been included to highlight the current tracking of PayGo charges to road wear. This demonstrates the ATA's proposal for more recovery from fuel charges and less recovery from registration charges is more appropriate.

*The CRRP MDL charging sends out wrong price signals*

We have taken the CRRP proposed charges and applied them to a typical transport task. In this case, the task involves moving 200,000 tonnes of goods from a storage facility, and transporting the goods 1,000km to the final receivable point. The example assumes a combination of driving along 100km of local roads, 500km of freeway and 400km of arterial road. The model below shows the example covering three combinations for the task as follows:

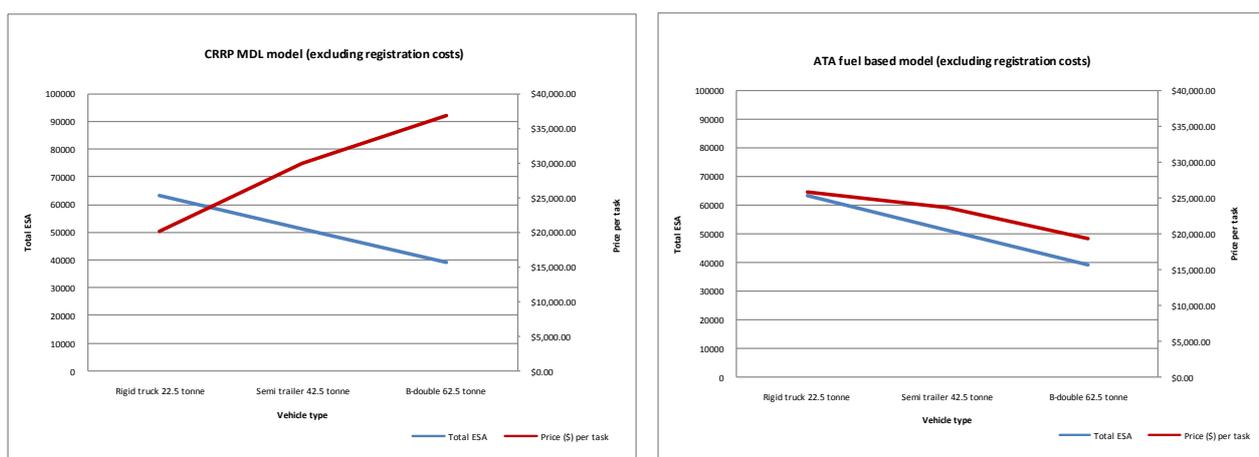
- Three axle rigid truck at GML, being 22.5 tonnes gross mass
- Semi-trailer at GML, being 42.5 tonnes gross mass; and
- B-double at GML, being 62.5 tonnes gross mass;

The ATA can show that price signal given by the preliminary prices send out the wrong incentives to drivers, while the ATA fuel based charging model closely resembles ESAs for the trip.

	Registration charge for ATA fuel based charging model (\$)	Registration charge for CRRP MDL model (\$)	Price (\$) per task ATA fuel based model	Price (\$) per task CRRP MDL model	Total ESA for task	Task charge difference
Rigid truck 22.5 tonne	\$400	\$3,229.87	\$25,872.00	\$20,122.80	63,200	-\$5,749.20
Semi trailer 42.5 tonne	\$800	\$4,068.74	\$23,688.00	\$30,012.00	51,200	\$6,324.00
B-double 62.5 tonne	\$1,200	\$4,906.61	\$19,344.00	\$36,850.80	39,000	\$17,506.80

There are clear MDL signals that favour rigid trucks over safer, more productive, longer combinations. CRRP’s MDL charges are encouraging the use of rigid trucks, with a difference of \$17,506.80 from the ATA’s fuel based charging model for a B-double. This indicates MDL charging is individual trip based, rather than freight task based. This is a fundamental flaw in the MDL charging method.

The problem becomes even more obvious when viewing the charts below. The first chart evidently shows the wrong signals will be given under CRRP’s MDL charging model. A rigid truck will pay far less than its ESA impact, whereas a B-double will pay far more than its ESA impact for the equivalent freight task. The second chart identifies the ATA fuel based charging model tracks well for task costs, with ESA reflecting fuel burn due to mass, distance and location, without the need to capture any of that data. This simple calculation of proposed trip costs should be acknowledged by CRRP as a clear indicator that the MDL model is essentially inconsistent with CRRP objectives.



**Recommendation 17**

**CRRP should acknowledge the fuel based charging model which shows that fuel burn reflects mass, distance and location without the complications and lack of values that MDL charging has.**

**Recommendation 18**

**CRRP should note that cross-subsidisation is acceptable and required in the many locations in Australia’s road network.**

**Recommendation 19**

**CRRP should properly consider the engineering relationships of road wear in their deliberations and end the misconceptions of fuel based charges.**

**Recommendation 20**

**CRRP should consider the ATA's fuel based charging model on freight task costs, which indicate that price signals are inappropriate through MDL charging.**

## 15. The Industry Challenges

The ATA sees lack of access as one of the greatest impediments to the potential productivity of the industry; however, we fail to see this statement presented in the challenges facing the industry. The lack of accountability of road agencies and the fact there is no external review at present is also a difficulty encountered by the industry that limits improvements to efficiency and productivity.

CRRP notes that without raising costs in the economy, improvements in productivity and efficiency are required. CRRP points out that productivity is at a much lower rate than what has gone before, indicating the failure of the NTC and road agencies to meet the demands of the industry.

In CRRP report figure A.1 is not using the best choice of selected vehicle. If CRRP wants to show increased average load it should look to multi-combinations, not rigid heavy vehicles that have made marginal increases compared to these longer, safer combinations. CRRP figure A.2 demonstrates the advancements made by articulated heavy vehicles and why further improvements have to be made.

We see the failure of the PBS and incremental pricing of heavy vehicles as government led initiatives that failed to reach their potential. While the industry can work at its most efficient, if government policy fails, then the industry is left in disarray with pointless reforms. While the NHVR is a step in the right direction it needs to go further to meet industry demands.

Poor decision making is reflected in the lack of access that is possible and it is rightly pointed out that because upgrading uses much funds, time and organisation that some roads simply don't get upgraded due to laziness in road provision.

The CRRP admits that the charging directly does not result in an improvement in productivity and efficiency. Lack of investment is compounded by the dearth of 'nationally consistent data and the information on the costs of providing and maintaining roads.' These are too important just to be tagged onto the end of the report and should be stated at the beginning. We ask that reform supply efficiency and all the benefits and goals of the COAG should be realised.

## APPENDIX A: CRRP Questions

The project board requested comments to the following questions as outlines on page 4 of the preliminary findings paper.

1. What the principal impediments to continuing improvements in heavy vehicle productivity and efficiency?

The ATA see the resistance of regulation change which allow access for more productive heavy vehicles, as the main reason why productivity of the fleet has plateaued considerably. In accordance with this, road upgrading should be undertaken in order to allow heavy vehicles to access better networks.

Efficiency in the fleet is presently at an optimum; the industry makes best use of the available network given time deadlines and road conditions. From a fleet mix view we have concerns that current A-trailer charges are negatively impacting the most efficient vehicles the industry.

2. What are the principal concerns (if any) with moving to a more direct heavy vehicle road user charging system based on distance and location, and static mass measurement approach?

The ATA is concerned that the implementation of MDL charging will overburden the industry with monitoring, which is a further strain, considering the high level of regulation that operators are already required to comply with. There are also concerns that the cost of the project is simply unfeasible and the cost of the technology (which in many cases is still in its infancy) cannot properly be valued.

While the idea of having charges that exactly reflect impact sounds appealing, this option does not appear feasible or practical.

Pricing reforms have previously been proven to not work in the industry's best interest, with the annual adjustment and over-recovery inflating cost numbers. Ultimately it is a trust issue. Why should the industry believe invasive monitoring and over the horizon pricing will provide any benefit, when passenger vehicles will not undergo the same charges, and when no evidence that the revenue from these proposed charges will be spent more efficiently than what is currently happening.

More specifically, mass charging is fraught with basic problems, such as what mass to actually measure and when. Location charging would involve the road agencies generating maps, with different charges for different locations. How can values be placed on locations, what makes one location worth more or less than another? Distance pricing does not give an indication on the impact of the vehicle, merely the distance it has travelled. Once again, pricing each element individually would be an incredibly difficult task.

These charges are merely a cosmetic cover up for the government to monitor the industry to the nth degree. While the industry has pushed for safety and productivity advances, the government has provided restrictive PBS and incremental pricing. These policies have choked access development and prevented industry led progress by limiting the industry's ability to innovate.

3. Are there particular advantages or disadvantages for industry of each alternative static mass measurement approach?

CRRP should understand that all vehicle classifications according to NTC figures do not carry their legal limit of weight, and yet we find nowhere in the report where this clarification is made, as it hugely affects the impact of heavy vehicles on the road.

For example:

Gross vehicle mass - this is a rating only and reflects a vehicle's maximum possible mass, not necessarily the legislated or permissible mass.

Gross combination mass – this is also a rating.

Average gross mass – PayGo uses this now – there is a difference between each kilometre load, it is the average of many different trips.

Number of axles – the number of axles will have no bearing on mass measurement; it should be mass per axle that is of interest.

The only way that mass can be measured feasibly is nominated maximum mass, which has the disadvantage of compliance issues, or average masses from surveys, which involves averaging. This is the reality of mass measuring in the heavy vehicle fleet.

4. Are there alternative or modified options that might be preferred, and how are these expected to deliver greater benefits compared to those options that have been assessed?

The ATA has suggested a 2-step fuel based charging model that, while addressing the pricing side of reform, also creates supply side reform in parallel. Pricing productivity is increased, as the lowering of the registration charge to \$400 a unit will increase the uptake of safer longer, more productive combinations. It will also encourage the uptake of more fuel efficient vehicles, as fuel is the larger component of the charges. The fuel charge will also encourage the growth of alternative fuels and greener operations, something that is key to the longevity and image of the industry, and in line with federal government environmental policies.

None of the other options, combined or individually, can offer productivity incentives, as they are set to limit what the industry can do according to price. While price may be the easiest way to change people's behaviour, the mass charging is likely to lead to more heavy vehicles spreading out the mass carried. Location is likely to lead to some areas being deserted because the costs are too high and distance charging will lead to operator's bunny-hopping deliveries to save on distance charges, as was done in the past to avoid road taxes (and we note the failure of road taxes). Too much regulation will not encourage productivity; it will limit the scope of productivity in the industry.

*Environmental considerations:*

Environmentally, the other options don't reward operators who choose to spend money on newer, greener technology. If the investment does not produce financial benefit, the vast numbers of operators with a small fleet, which makes up 85% of the total fleet, are less likely to convert to environmentally friendly operations. We are likely to see a gulf between the bigger operators who can absorb the costs of installing environmentally friendly technology and the majority of the fleet with older vehicles. If the industry is set to reach its productive goals, then this important feature must be factored into any decision made on charges.

*Costs to implement:*

The fuel based system has the lowest administrative and installation costs compared to the other options. This is an important component of the future of the charges; being reliant on technology options will cripple the industry with costs they will have to pay for, such as installation, updating and data handling costs. The fuel based system requires no new technology to be installed and prevents deliberate avoidance. While other systems could be falsified, meaning heavy vehicles can still operate, the fuel based system works perfectly. If you can't pay for fuel then your vehicle simply doesn't run, there is no way to avoid paying.

5. What are the matters that should be considered as part of implementing direct heavy vehicle charging?

The industry is concerned that real cost will be too high, benefits won't appear and efficiency losses will occur. The problem we associate with the implementation of direct heavy vehicle charges is that it is likely overwhelm the administration element of a business. An annual adjustment is undertaken every year to reflect the costs of road use and expenditure and MDL adds cost calculations on top of this, meaning a higher use of resources than the return provided.

6. Over what time frame could/should direct heavy vehicle charging be implemented, and what staging of reforms might be required?

The ATA recommends that CRRP do nothing to charges pending supply side reform; it is imperative the supply side is addressed first then implement the ATA's fuel based charging model alongside strong supply side reform in order to enhance accountability and transparency.

We believe that the progress of the report should be based on achieving the outcomes of the CRRP not just meeting deadlines and constraining efforts in order to get papers out of the door. The industry is patient and wants a solution that takes into account all of the concerns that it has over the nature of the reform.

7. What opportunities exist to build these charging reforms on existing arrangements within the industry, such as through the use of technology?

Technology has been heralded as the key method of monitoring and indeed has been embraced by the industry for its own purposes. While the technology exists, it does not mean that it can feasibly be used. The industry does foresee that, like any industry, technology will play a larger role in the future. However, CRRP needs to consider the agency resources expected to be allocated to this project simply to monitor and assess the substantial amount of data that will be received.

The road furniture that facilitates charging for location and distance is possible (as we have seen from Safe.T.Cam); however in the feasibility study we see that to create a sufficient number of gantries on roads is not economically feasible. We therefore question how much capital expenditure would be spent on this system; even though once gantries were installed the collection of information would not be a problem.

The fuel charging system would indicate greater benefits than is currently available, and considering the other options, offers the most cost effective solution to the industry. The fuel based charge is feasible because it is merely a tweaking of the PayGo model that requires no extra technology, no programming costs, and no extra charges to be valued. It works effectively as a pricing mechanism, because those who use more of the road pay accordingly for that use.

## APPENDIX B: Preliminary Findings Review

The ATA examined the preliminary findings.

*Drivers of the cost of roads and approach to investment*

*Preliminary Finding 1: Heavy vehicles are a large contributor to overall road infrastructure costs.*

Weathering is a significant factor that has a larger impact than heavy vehicle use. Poor road construction leads to greater ongoing maintenance costs. Poorly constructed roads also impact road users through additional maintenance costs to their own vehicles. Charging heavy vehicles using any of the MDL options proposed does not guarantee those funds will be appropriately disbursed and a positive change to supply made.

The industry currently pays its fair share of road costs and is not subsidised for commercial use of the infrastructure. Heavy vehicle road construction is normally carried out to strengthen roads, and light vehicle updating road construction is to address congestion issues, such as adding more lanes. In line with the Henry Review the industry should not be expected to pay full costs of road provision, as this is unjust. The marginal cost of heavy vehicles using best roads is small.

*Preliminary Finding 2: The cost of maintaining roads varies with the location of the road, the road's construction, the mass of vehicles using the road, and the volume of traffic.*

There are still significant concerns within industry as to how heavy vehicle charges will be allocated to the roads needing the most funding. The ATA is concerned that poor roads will receive minimal funding and will remain poor roads, and roads that are over-engineered and heavily used will receive the lion's share of funding, which is unjustified.

The location, traffic volume, vehicle ESA affects, soil properties and weathering on roads construction has a vast effect on the regularity of updating and maintaining. If a road is heavily used, it is more likely to be maintained regularly. However, roads that are under-provided for are normally used at a lower level and therefore cannot access updating maintenance funding as regularly as they should. Many of these types of roads should come under Community Service Obligations in order to provide serviceable roads to the community.

*Preliminary Finding 3: Road investments include an assessment of expected future traffic volume (particularly by light vehicles), and heavy vehicle masses.*

While heavy vehicles have increased their ability to carry more freight (due to engineering designs such as road friendly suspension and additional axles), it will mean there will be less heavy vehicles on the road for the same freight task due to the increased use of higher productivity vehicles. The relative road impact will decrease with the increased productivity of the fleet. It should be noted that, while heavy mass limits exist, evidence indicates the majority of the fleet never load up to these limits, and therefore, charges should reflect this fact.

Traffic volume of heavy vehicles will decrease if productive methods are brought in, for instance a semi trailer at general mass limit does 42 trips per 1,000 tonnes and uses 394 thousand litres of fuel per 1,000 kilometres a B-double can carry the same amount in 26 trips and uses 322 thousand litres of fuel. A productive shift towards B-doubles and B-triples can bring about lower fuel consumption, less trips and fewer vehicles and therefore less wear to the road. B-double ESA's are nearly 195 versus semi-trailers at 257 as per the ATA's T.I.C (attached). The real issue is how can the freight task be done with the least ESA impact, high productivity vehicles provide such a solution.

*Preliminary Finding 4: The road costs directly incurred by a heavy vehicle using a local road are likely to be many times that of using a freeway. When faced with these cost differences heavy vehicle users are likely to wish to switch to an alternative route. However, the opportunities for route switching are limited, and so overall behavioural changes might be limited in practice.*

We use as an example the A-trailer charges which have already affected the behaviour of industry adversely. Pricing has to be carefully implemented in order to not destroy productivity, safety and environmental progress.

By CRRP's own elasticity estimates the opportunity to actually change local road routes used is only 11%. There are community service obligations to provide infrastructure to some of Australia's most remote but also most productive farming communities. Operators already use the most effective route available and as heavy vehicles are an expensive asset, sending them down poorly constructed roads incurs a cost for operators on maintenance of that asset. Operators would love to use better quality routes but are very limited by what is currently provided. Many rural roads would benefit from updating to B-double access in order to promote productivity and safety on our roads as well as developing regional areas to encourage commerce, and meeting producer's expectations of access for efficient vehicles. It should also be noted that if rural and regional areas become too expensive to operate in, this will have a negative effect of property prices in the area, leading to an overall decline in the country population and those who are willing to work in the country.

*The technical feasibility of mass, distance and location based pricing*

*Preliminary Finding 5: Technology is available to support any combination of mass, distance and location based pricing.*

The technology is technically available, but much of it is still in its beta testing phase, especially mass measuring technology.

While GPS units can measure location and distance in principal, we believe it may not currently receive any benefits from the expense to implement such technology. Roughly 85% of operators are identified as small business; these mass monitoring technologies are not economically feasible or practical to them. Those who already have telematics in cabs may find it a considerable burden to also adopt the government monitoring telematics when they have had boutique technology created for them at a high business cost.

*Promoting more efficient maintenance and investment in roads*

*Preliminary Finding 6: To promote more efficient provision and use of roads requires both funds to flow to the road provider for maintenance and investment in the road network based on road use, and the cost of road use to be signalled through charges to road users.*

Road use may not indicate where funding is most needed, and simply giving money to those with a well used and larger network will not incrementally increase efficiency in road provision. Price signals for poorly constructed and regional roads will have higher costs. There must be an understanding that in the long run these costs will be lowered by increasing the quality of the roads in these areas.

Roads are public goods. Public goods are provided by government as the private market would not provide road provision. Road maintenance may be triggered by many factors outside heavy vehicle use. Efficient provision is about transparency, accountability and open audits and review, things not currently present in road agencies that are standards the community expect.

*Preliminary Finding 7: Improved incentives for efficiency can be created for both road providers and heavy vehicle road users by creating a direct link between the costs incurred from heavy vehicle road use, direct road use charges, and the funds received by the providers of roads.*

While connecting heavy vehicle spending with heavy vehicles charges eliminates the trade off between light and heavy vehicle provision, efficiency, whatever form it may take, cannot just rely on this. We reiterate that supply side reform can only make this connection work better than it currently is. From the information forum we attended we understand CRRP has a desire to increase transparency and accountability but we understand this is a long process. Meanwhile, we advise CRRP that laying the foundations for agency change can only benefit this process and help achieve the outcome CRRP is aiming for. There is no mechanism to make it operational in reality.

Reform of supply is more important than charge reform. The industry demands that supply reforms leads.

*Preliminary Finding 8: Improving arrangements for heavy vehicle charging and funding are expected to deliver significant benefits. CRRP's scope is limited to heavy vehicles and addressing only this small part of the road funding base limits the potential benefits from improving incentives for efficient road provision and use that could be achieved.*

We support that all users should be captured. Preliminary finding 7 states there needs to be a better connection between heavy vehicle spending and heavy vehicle road provision. The same system could easily be arranged for light vehicles at the same time if this is a concern for CRRP.

*Preliminary Finding 9: Improved accountability of road expenditure is essential to achieving the benefits of more efficient maintenance and investment in roads.*

The ATA encourages CRRP to push further on this finding. Improving the accountability and transparency of current arrangements would improve the supply side system exponentially as the industry would be able to have decisions reviewed, and also understand how agencies have spent road funds. The industry wants to improve its relationship with road agencies and this gesture would have huge mutual benefits.

*Implications of introducing more direct road use charges based on mass, distance and location*

*Preliminary Finding 10: Pricing on the basis of location provides signals to heavy vehicle users to promote more efficient route selection, where alternative routes exist. When mass is also included as a basis for pricing, then the signals are extended to the choice of vehicle.*

CRRP's feasibility study has shown there is a small chance of this happening and pricing on location may not have intended benefits, as it may limit operator route selection and push up costs to customers.

Mass monitoring also has adverse effects as operators may switch to lighter carrying vehicles, thus increasing the number of vehicles on our road, leading to increased safety concerns and road wear. While this could be dismissed, it is a simple economic truth that increasing the price of goods or services means substituting away from those goods and services. This translates well into the heavy vehicle industry and we have significant evidence that this is happening with A-trailers.

*Preliminary Finding 11: Heavy vehicle users are not likely to choose a different vehicle type in response to price changes in the short term. However, evidence indicates that this will not be the case over the medium to long term.*

The ATA agrees with this finding, however, it would help if the actual time scale was presented as to what refers to short, medium and long term. This has capital investment implications for the fleet, and in order to reach the productive potential of the industry a move away from productive vehicles would be a step in the wrong direction. It is highly likely that if this happens the industry is not likely to adopt newer vehicles with better quality standards, and CRRP may find an ageing fleet in the face of lack of investment incentives.

*The economic feasibility of mass, distance and location based charges*

*Preliminary Finding 12: The high cost of dynamically measuring the mass of a vehicle means that it is not an economically feasible basis for charging all heavy vehicles at this time.*

The ATA agrees with the finding that it is not economically feasible to measure at this time. If CRRP is determined to use a mass distance or MDL charging, the method of mass measurement must be accurate and effective.

Static mass makes logical sense if it is to be used, but will also be very difficult to measure and administer.

*Preliminary Finding 13: It is technically and economically feasible to charge articulated heavy vehicles (including multi combinations) and heavy rigid heavy vehicles on the basis of:*

- \_ a static measure of mass;*
- \_ actual distance travelled; and*
- \_ location.*

While CRRP believe it is technically and economically feasible, we are not convinced. The evidence that is presented to industry is not comprehensive enough for general analysis to indicate this. The main problem that makes these charges un-economical is the costs involved with them. This is not only the unit costs but implementation and updating costs cannot properly be valued at this point in time.

We have concerns over how the data is handled, as it is not stated how data will actually be transmitted, processed and stored. This brings in fundamental issues of privacy and data protection.

The partial charging of the fleet is not a solution, there must be a one size fits all charge if this is going to have the desired affect. The industry will not understand why some heavy vehicles are being charged and others are not.

*Preliminary Finding 14: If a range of private and other indirect benefits can be realised it is possible that the net benefits of applying static mass, distance and location charges will be higher, when implemented across the entire heavy vehicle fleet.*

History shows the industry that projections such as these rarely come to bear fruit. Usually costs are greatly under-estimated in assessment process by government. For example, the cost of Urea for selective catalytic reduction systems was predicted to be in the order of 12 cents/litre whereas actual prices are over 12 times higher at \$1.50 plus/litre.

This may be the case eventually, but how long will it be before this can happen? The implementation will take a long time to come to fruition for the whole fleet, our concern is that in the meantime there will be a disconnect between the fleet. We are likely to see a movement away from the combinations that will be monitored in some circumstances. This type of invasion is not acceptable to many operators who don't want technology in their vehicles and may not travel vast distances. This is possibly not the best outcome in order to achieve productivity and stifles the ability for industry to improve.

## APPENDIX C: The Evaluation of Options Paper

The Evaluation of Options paper is said to be more explanatory of the options suggested. However, we find the feasibility paper serves a better purpose as an evaluation than this document does; although both papers lack facts to support the assertions made. The reader needs to consider our comments on the feasibility paper as well, as we have not duplicated comment here, but simply focused on additional specific problems.

The ATA reiterates that the fleet uses the infrastructure it has efficiently, given restrictions on weight and access. The existing available network limits what can be achieved; once again, the industry is operating to its maximum efficiency. The heavy vehicle transport industry is highly competitive, with low profit margins that make for efficient pricing for clients and operating in order to gain market share and incomes. The hypothetical statement of inefficacy should be aimed squarely at road agencies who cannot provide demand driven maintenance and upgrading, accountability or transparency or even report to basic management standards (for example asset condition, maintenance needs, system disconnects).

CRRP wants actual costs of industry impacts reflected in charges, and the ATA's fuel based charging model using ESA of vehicles as road wear measure does this, whereas the claimed benefits of MDL are not likely to materialise, especially if the supply side efficiencies are not rectified.

### *CRRP policy objectives*

<b>CRRP policy principles</b>	<b>The ATA fuel based charging model</b>	<b>Mass distance location</b>
<b>Support the delivery of a national seamless economy</b>	The ATA's fuel based charging model causes no disruption to the operators or their clients no extra costs would be imposed on either.	MDL will disrupt the economy by increasing prices on using rural and regional roads, inflating the industry's costs due to imposed costs of IAP for operators and increased social costs
<b>Support efficient provision and maintenance of roads</b>	The ATA's fuel based charging model supports tough supply side reform that will improve the accountability and transparency of road provision	MDL charging simply sends data about road use to the agencies, there is no indication that this will result in efficient provision, or increased transparency or accountability.
<b>Support productive and efficient use of roads</b>	The industry already uses the network efficiently. The ATA's fuel based charging model, however, encourages operators to be fuel efficient which tracks with road impact (ESA) and government objectives on carbon use.	MDL will make no positive difference to road use; it may encourage unproductive methods of freight transport as operators bunny hop the task to avoid paying higher charges, or use less efficient vehicles to spread the usage charge over a longer time period.
<b>Support staged implementation of recommended reforms, where the practical difficulties preclude near term implementation</b>	The ATA fuel based charging model has no issues involving implementation. It is a fleet wide solution and able to be implemented across the fleet in one step or in multiple steps.	MDL has huge regulatory and implementation issues. The fact that no real costs have been presented to industry gives cause for concern over the reliability and feasibility of MDL charging. It also only targets a subset of the fleet.
<b>Be implemented having regard to the impacts on all road users and other affected parties</b>	Fuel tracks incredibly well for impact and mass. Charges should not reflect the full costs of road provision, as roads are public goods.	MDL charging would only reflect this if the same monitoring and charge model was applied to light vehicles.
<b>Not foreclose or be conditional on possible additional future reform in the road industry</b>	The ATA fuel based charging model is simple to implement and to reform if there is a need. It can continue beyond the limitations ACIL Tasman has suggested.	MDL charging will require constant reform as there are concerns over data, privacy, feasibility, accuracy and how it will affect road agencies. This is a huge task with risks.

### *Logical pricing concerns*

CRRP charges are not wholly complete. The fact that time of day charging and non- priced environmental impacts were said to be out of scope for pricing calculations indicates that MDL charges are not going to be a simple, cost effective method of charging to implement.

The ability to support future reforms as a pricing mechanism should come under more scrutiny. This is directly linked to installing dynamic mass in vehicles and time of day charging, these are not principles, merely another way to justify MDL charging in CRRP's view.

Risk assessment

Potential risk	CRRP progress	result
<b>Over-or underestimation of business systems (i.e. technology) and implementation costs</b>	<ul style="list-style-type: none"> <li>No foundation evidence supporting prices or CRRP methodologies are public</li> <li>We believe that costs are incredibly unreflective and understated.</li> </ul>	We have no faith in the costs presented as they have either come from the CRRP hidden calculations or from NTC data which is not as accurate as it could be; or unsubstantiated estimate's which are contrary to current costs within industry for like- products, such as GPS units.
<b>The distribution of heavy vehicle revenue may change and the relativity of revenue collected by each state may change</b>	<ul style="list-style-type: none"> <li>Solving the supply side reform should be the first concern for CRRP.</li> </ul>	Agencies will not change their behaviour. Road provision won't be improved only the certainty of funding for the road providers. The industry gains nothing and productivity and efficiency will not improve.
<b>there is ability to get agreement on a way forward from all levels of government</b>	<ul style="list-style-type: none"> <li>CRRP progress has scared agencies into lack of action on a number of important issues (A-trailer charges).</li> <li>There is little indication that ministers would ever be happy to pass discriminatory policies disadvantaging production and export activities</li> </ul>	CRRP will fail and will leave road agencies in a malaise about what to do next.
<b>Alignment with other reform projects such as the NHVR</b>	<ul style="list-style-type: none"> <li>CRRP is founded on separate registration functions but NHVR will move to a national system</li> </ul>	
<b>Compliance and enforcement risks</b>	<ul style="list-style-type: none"> <li>CRRP has not mentioned any of the penalties for non-conformance or admitted the huge amount of non-conformance that is more than likely to occur under MDL charges.</li> </ul>	<ul style="list-style-type: none"> <li>Huge costs of working out non-conformance penalties</li> <li>Operators have to make sure that the expensive IAP equipment conforms.</li> <li>The industry is crippled with costs due to compliance.</li> <li>We see no evidence that their system can actually be enforced.</li> </ul>
<b>The creation of a complex charging system which makes it difficult to respond to price signals</b>	<ul style="list-style-type: none"> <li>Price signals are only as good as the options they point to. CRRP has shown there is an incredibly limited chance of changing route and vehicle.</li> </ul>	<ul style="list-style-type: none"> <li>Operator behaviour won't change and the complexity of charges will not become clear to the industry. Cost will increase equalling inefficiency.</li> </ul>
<b>Stakeholders and/or industry feel uncomfortable and disengaged from the project and its findings</b>	<ul style="list-style-type: none"> <li>CRRP carried out a review on the ATA fuel based charging model without actually consulting the ATA to understand the model. We see this as a total disregard for the industry concerns and a poor way to conduct a review.</li> <li>CRRP has failed to provide the industry with any reassurance that it will gain from these new system and charges.</li> <li>It is a widely held view that CRRP is a bureaucratic exercise in monitoring and extracting additional funds from the industry without having any of the same intentions on the many more light vehicles or reforming themselves.</li> </ul>	<ul style="list-style-type: none"> <li>CRRP outcome will not be what any of the industry wants.</li> <li>The industry has no faith in the communication with recommendations and findings being put to government.</li> </ul>
<b>Legal implementation risks</b>	<ul style="list-style-type: none"> <li>CRRP has shown no indication of the potential for a legal human rights challenge.</li> </ul>	<ul style="list-style-type: none"> <li>CRRP process will either not be passed because of legal barriers, or simply because the cost is too high. Also, Ministers may disown it once they realise the political implications.</li> </ul>

National seamless economy failures

The outcome stated that the CRRP policy should contribute to delivering a seamless national economy, its principles all indicate the failings of the CRRP.

- Creating a seamless national economy, reducing costs incurred by business in complying with unnecessary and inconsistent regulation across jurisdictions.

MDL increases costs to operators because the system is more costly and it will require operators to employ extra staff in order to make sure compliance is correct; regardless of the jurisdictions.

- Enhancing Australia's longer term growth, improving workforce participation and overall labour mobility

This is not going to be optimised through MDL charges and regulation that complicate the industry. Further to this, people will be put off joining the industry. The industry's average age is mid fifties. Nothing MDL wants to do address the ageing of the industry. We should be encouraging young productive drivers to join the industry.

- Expanding Australia's productive capacity over the medium term through competition reform, enabling stronger economic growth.

If CRRP fails to address supply side reform that would allow better use of current monies and may position roads to gain funding from the private sector; this is what Infrastructure Australia has stated needs to be done. Along with this, increasing access for more productive safer vehicles will increase productivity; MDL will not achieve this aim either.

COAG has an agenda to reduce costs to businesses that arise from bad regulation across jurisdictions. The failure of CRPP to address these impediments is poor. The Productivity Commission is currently carrying out a report on seamless national economy barriers and MDL is likely to fail its criteria.

#### *Assumed costs and lack of explanation of data*

Throughout the CRRP report it states that cost will have to be revaluated in order to suit the Australian situation or they are simply assumed estimates at this point in time. This far through a project it is unnerving that real costs cannot be provided, and still have not been provided, before the submission deadline.

It is simply wrong to suggest that operators will move towards cheaper vehicles, people pay for value. A heavy vehicle that has lower capital costs is more likely to have higher operating costs; this doesn't encourage the most efficient or safest combinations in the fleet. It must be remembered that it is the whole freight task that is important not one individual trip.

The costs noted for GPS are far too conservative to represent the real costs of fitting the industry. The addition of retrofitting the fleet will also increase costs.

The change in vehicle freight kilometres on each type of road is unlikely to change and the statements that freeway travel and local road travel will decline under MDL charging is worrying, as this would indicate that travel would move to arterial roads. This would increase congestion on those roads and freeways have been built to cope with the increased movement of freight.

The NTC ESAs are not as correlated with the truth of heavy vehicle impact as the ATA ESA's are. There are more theoretical and based on a distorted survey, whereas the ATA ESA impact is an engineering based and peer reviewed document.

#### *Elasticities*

CRRP figure 13's varying elasticity is paltry, 0%-0.18%, is not a number that any decisions could viably be based on. This figure should have raised concerns that vehicle kilometre elasticity is something that will not change vastly in response to price increases. This may encourage Ramsey pricing on the road agencies behalf as they see little real behavioural change to prices and therefore milk the articulated vehicle operators due to this fact.

Investment in heavy vehicles would also indicate why the elasticities are low, as it may be financially difficult for operators to switch vehicles. Initial capital investments in vehicles are so high that in the short term it is not possible.

CRRP figure 14 would suggest that substitution away from a three axle rigid heavy vehicle increases the use of more impact heavy vehicles, those with only 2 axles not 6 axle semi trailers which have a lower ESA per 1000 tonnes lead make up only 6% of the substitution. This isn't a promising picture if the CRPP wants to reduce road impact.

CRRP figure 19, there are a number of illogical kilometre switching that are present in response to an increase in price in the modelling of this table.

- a) Switching from a R22T22 (rigid 4 axle and 4 axle trailer ) to 15% R11T11 (rigid 2 axle and 2 axle trailer) and 85% R12T12 (rigid 3 axle and 3 axle trailer)
- b) Switching from an A122 (semi trailer 5 axle) to 9% R12 (rigid 3 axle), 55% A112 (semi trailer 4 axle), 22% (semi trailer 6 axle), 15% B1232 (B-double 7/8 axle) to 56% A123 (semitrailer 6 axle) and 44% B1233 (B-double 9 axle)

Freight is a demand, it exists until tipping point at which time it does not; therefore mass or volume and kilometres exist or no longer exist because the task is not done. This is what Brazil and China have found.

The scenario tested for road swapping are too unrealistic to serve any purpose 25% - 75% road switching is just not feasible, and when considering the previous CRRP work as does not seem likely it is closer to be between 11% to a maximum of 25%. In our view, the industry is unlikely to swap roads much, as origin and destination are fixed points, and industry already selects best routes by accessibility, fuel and time efficiency.

#### *Hidden facts*

The Evaluation of Options paper shed some light on findings pushed by CRRP in the feasibility study; however, we find that the full results of the feasibility study cases are not as positive as they appear. Throughout the Evaluation of Options report, CRRP are being sparing with the truth behind some of the statements.

#### *Industry favours a fuel charge*

The ATA fuel based charging model was also shown as most popular with the industry in the CRRP survey carried out; however, we see a lack of acknowledgement of industry acceptance written in the CRRP reports. This is because the model is 'administratively simple and doesn't impose additional compliance costs'. Not surprisingly the industry disliked MDL charges with only 15% finding in favour of it. This is because it is the opposite of fuel charges, with issues over compliance costs. CRRP questions this as some operators voting and stacking the statistics but if they have been asked then they have a legitimate reason to vote.

#### *Telematics*

If there is only a 20% predicted benefit for the fleet from implementing GPS, one wonders about the feasibility and sheer logic of enforcing the system on the balance of the fleet. Having a GPS does not count as an economy of scope at all. It is surprising that the business systems paper found no feasibility problems of installing GPS; this would suggest that it was examining the incorrect criteria. CRRP states they found no legal or legislative requirements that would stop the implementation of MDL charging; the ATA foresee many barriers to implementing such an invasive system that must be taken into account during the analytical process.

It should also be noted that while CRRP mentions IAP has been used for fatigue management, these system are neither proven nor approved as work diary replacements. Electronic work diaries are an example of lukewarm response to government designed solutions like IAP devices, and are still in very early stage 1 trial phrase.

The indication that the National Road Safety Strategy have been considering telematics and trials of telematics in vehicles have been taking place, is incorrect. Looking at the NRSS recent document on strategy, they say that it is not in the horizon that telematics will be used, it is not a commitment to it, and they are merely stating they will look into it.

They are also piloting telematic electronic diary monitoring; this is an alternative to paper based diaries not a total replacement. There is no foregone conclusion about telematics in vehicles in the NRSS or the National in-vehicle telematics strategy: the road freight sector.

#### *Lack of commitment to supply side reform*

CRRP explicitly talks about reforming supply side. However, it makes the statement that CRRP is not considering detailed funding and expenditure reform options. It is not enough to simply consider a range of policy considerations that may need to be taken into account for the potential options – it is an attempt by

CRRP to appear as though consideration has been given to supply side reform without actually doing so. There is a significant disconnect between action and outcome.

#### *CRRP MDL charging hurts rural operators and communities*

The examples of trips used in the document highlight that MDL location charging would mean that rural operators would pay more. Any vehicle working in rural areas will be expected pay a greater charge than those going shorter distances between large cities on freeways. This is not an equitable outcome for Australia or its economy. It should also be noted by CRRP that load weights carried on the example trips are not realistic.

CRRP notes that most operators will have to consider cost versus distance due to the increased cost of using local roads.

#### *MDL charges warped effects on the industry*

The greatest productivity loss would actually come from mass distance location charging because an increase in rigid 3 axle and 4 axle totalling 13.5% increase, with an overall negative change away from B-doubles by -1.3% (CRRP Table 8). On a task basis these changes impose more road wear and lower efficiency. Compare this to CRRP's assessment of fuel based charging which encourages more multiple axle groups and has little change on B-double productivity with a -0.1 decrease. However we note that this is using CRRP numbers that still have not been openly provided to the industry. The ATA view is that our fuel based charges model has the strongest incentives to optimise vehicle selection.

The use of GML or average mass makes a huge difference to what charges would be. CRRP states that DL and MDL model calculations based on GML would result in higher costs per vehicle, especially ones that travel on local and rural road classes because they would be charged at full loading mass. Under the fuel based charging model and distance charge, average mass is expected to produce greater benefits than GML.

PayGo currently charges at average mass and it should be remembered that 80% of the fleet does not travel at GML. So under a MDL charging regime we could expect that operators would be charged at GML, therefore increasing revenue to the agencies regardless of reality. Moving away from average mass to a new classification would cause more funds to be spent on administration and enforcement. It should also be noted by the CRRP that heavy vehicles do not carry maximum mass for the majority of freight; they are volume constrained by what they can physically put on a heavy vehicle.

We do not condone higher registration charges. CRRP states that this produces higher overall benefits – to whom? They state there is an incentive to change behaviour by encouraging the most productive vehicles to be taken up. We fail to see how this would happen, especially with the A-trailer disaster currently happening for the industry. Making the fixed charge higher than it is now will only lead to cash constraints for many operators; it will only bring certainty to road agencies about income funds. If there was better management of funds this action would not need to be taken.

The charging of the articulated fleet, which can carry the most mass, is just coming across as targeted charges to hit the minority of vehicles in the fleet which carry the majority of the freight task for a revenue raising charge.

*Case studies outcomes are not positive*

We find that the WA case study number 1 was right to be treated cautiously as the outcomes of exploring the benefits from greater certainty or maintenance did not include that the outcome for WA as favourable as CRRP would have wanted. We don't understand why the second case study has not been included in the main feasibility study, as access is one of the most important requests to the industry.

Comparing WA and urban Queensland for savings in vehicle operating costs is not a fair comparison, as the terrain and traffic conditions in both states is vastly different, which is reflected in the operating costs.

## APPENDIX D: The ATA and Barkwood Consulting Pty Ltd Truck Impact Chart

The ATA and Barkwood Consulting Pty Ltd have developed a Truck Impact Chart that clearly demonstrates a number of different heavy vehicle combinations and covers GCM, payload, the equivalent standard axles (ESAs) for each vehicle combination, being the measure by which impact of a truck on the road is measured, the amount of trips required to move 1,000 tonnes of freight, the amount of fuel required to move 1,000 tonnes of freight, emissions and driver requirement. The information provided in the tables throughout this document is taken from the Truck Impact Chart.

The Truck Impact Chart has been reviewed RTA's Senior Pavement Engineer, Ravindra Prathapa. The Truck Impact Chart has also been separately peer reviewed by Bob Pearson, Pearson Transport Resources, and was referred to by TheCIE in the Benefit/Cost Analysis for the National Heavy Vehicle Regulator draft Regulatory Impact Statement, released in February 2011.

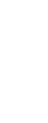
Authors: David Coonan: The Australian Trucking Association  
 Bob Woodward: Barkwood Consulting Pty Ltd

This document has been prepared to assist operators and road asset managers in assessing the merits of utilising larger vehicle combinations in a transport task.

The assessment process assumes that the vehicle is dedicated to a specific task, operating travel being 50% unladen and 50% laden. The task relativities are 1000 tonnes with a lead of 1000 kilometres.

<b>Equivalent Standard Axles:</b>	ESA's are calculated by the average of the sum of ESA's for zero load (empty) plus ESA's for 100% load and multiplied by the number of trips as required for the transport task.
<b>Vehicle tare weights:</b>	Are predictions based on the averages for a range of equipment within each combination category. These estimates have been reviewed by a number of operators and confirmed as being representative of "real" vehicles of the category.
<b>Fuel consumption estimates:</b>	Are predictions based on accumulated averages where operation is nominally 50% unladen and 50% laden. Actual consumption will vary with operating conditions.
<b>Emissions:</b>	Reference is based on total fuel consumption only.
<b>20 metre 7 axle Truck &amp; Dog:</b>	The maximum allowable mass limits for this combination at either CML or HML (for standard combination) is 55.5 tonnes.
<b>19 metre 7 Axle B-double:</b>	The maximum allowable mass limits for this combination at either CML or HML (for standard combination) is 55.5 tonnes.
<b>B-triple:</b>	Consists of a complying B-double with an additional complying leading trailer.
<b>Converter Dolly:</b>	All combinations utilizing a converter dolly are configured with a tandem axle. The configured vertical imposed loading of a 6x4 prime mover is similar to the allowable imposed vertical loading of a tandem axle converter dolly.
<b>AB-triple:</b>	Consists of a complying B-double with an additional complying road train leading trailer and a complying converter dolly.
<b>BAB-Quad:</b>	Consists of a complying B-double with an additional complying converter dolly and additional complying set of B-double trailers.

AUSTRALIAN TRUCKING ASSOCIATION Truck Impact Chart June 2010

	GCM	Payload	Load Status			No Trips per 1000 tonnes	ESAs per 1000 tonnes	Nom Fuel / 100k	Fuel Required per 1000k	Driver Requirement	Overall Length (metres)	Low Speed Swept Path (metres)	Referenced Static Roll Stability	High Speed Dynamic Tracking	Emissions / 1000 tonnes
			0%	50%	100%										
	Two Axle Rigid GML	15.0	7.00	0.42	1.18	3.00	143	490	23	65780	188%	<12.5 metres		153%	
	Two Axle Rigid Euro4	15.5	7.63	0.43	1.34	3.57	132	529	23	60720	171%	<12.5 metres		141%	
	Three Axle Rigid GML	22.5	13.12	0.51	1.27	3.58	77	316	28	43120	100%	<12.5 metres		100%	
	Three Axle Rigid Euro4	23.0	13.69	0.53	1.46	4.16	74	347	28	41440	98%	<12.5 metres		98%	
	Six Axle Artic GML	42.5	24.13	1.14	2.03	4.96	42	257	47	39480	55%			92%	
	Six Axle Artic Euro4	45.5	27.13	1.14	2.03	4.96	37	226	50	37000	48%			88%	
	Six Axle Artic HML	43.5	25.13	1.14	2.07	5.29	40	258	48	39400	52%			89%	
	Six Axle Artic HML	45.5	27.13	1.14	2.18	6.05	37	287	50	37000	48%			88%	
	Truck & Dog (6 Axle - 45T)	45.0	30.09	1.10	1.83	5.74	34	233	49	33320	44%	19.0		77%	
	Truck & Dog (6 Axle - NSW)	48.0	33.09	1.10	2.08	7.13	31	256	49	30380	40%	19.0		70%	
	Truck & Dog (7 Axle)	50.0	34.19	1.10	1.89	5.57	30	201	51	30600	39%	19.0		71%	
	Truck & Dog (20M - PBS)	55.5	38.69	1.10	2.18	7.71	28	230	53	27660	34%	20.0		64%	
	Truck & Dog (20M PBS CML)	57.0	40.19	1.10	2.27	8.50	25	241	55	27600	32%			64%	
	19M B.double GML	55.5	35.66	1.10	2.12	7.71	29	256	53	30740	38%			71%	
	19M B.double GML & HML	57.0	36.20	1.10	2.20	8.50	28	289	55	30800	38%	19.0		71%	
	B.double GML	62.5	38.93	1.15	2.24	6.34	26	195	62	32240	34%			76%	
	B.double HML	68.0	44.43	1.15	2.24	6.34	23	173	65	29600	30%	26.0		79%	
	B.double HML	64.5	40.93	1.15	2.24	7.00	25	204	63	31600	32%			73%	
	B.double HML	68.0	44.43	1.15	2.50	8.26	23	217	65	29600	30%	8.9		69%	
	B.triple GML	82.5	52.44	1.16	2.51	7.72	20	178	68	27200	26%			63%	
	B.triple HML	90.5	60.44	1.16	2.51	7.72	17	152	72	24480	22%	10.6	Approximately same as equivalent B-double	Better than Type 1 Ritrain	57%
	B.triple GML	84.5	54.44	1.16	2.60	8.34	19	181	69	26220	25%			61%	
	B.triple HML	90.5	60.44	1.16	2.88	10.47	17	198	72	24480	22%			57%	
	AB-triple GML	99.0	64.20	1.18	2.90	9.78	16	176	75	24000	21%			56%	
	AB-triple HML	107.5	72.70	1.18	2.90	9.78	14	154	79	22120	18%			51%	
	AB-triple GML	101.0	66.20	1.18	3.00	10.47	16	187	76	24320	21%	42.5	Better than Type 1 Ritrain	Better than Type 1 Ritrain	56%
	AB-triple HML	107.5	72.70	1.18	3.30	12.80	14	166	79	22120	18%	11.2	Better than Type 1 Ritrain	Better than Type 1 Ritrain	51%
	Type 1 Ritrain - GML	79.0	47.77	1.20	2.77	8.41	21	202	68	28660	27%			68%	
	Type 1 Ritrain - HML	85.0	53.77	1.20	2.77	8.41	19	183	72	27360	25%	36.5		63%	
	Type 1 Ritrain - GML	81.0	49.77	1.20	2.88	9.12	21	217	69	28880	27%	10.3		67%	
	Type 1 Ritrain - HML	85.0	53.77	1.20	3.08	10.59	19	225	72	27360	25%			63%	
	Type 2 Ritrain - GML	115.5	71.41	1.28	3.51	11.85	15	197	80	24000	19%			56%	
	Type 2 Ritrain - HML	124.5	80.41	1.28	3.51	11.85	13	171	83	21680	17%	53.5		50%	
	Type 2 Ritrain - GML	117.5	73.39	1.28	3.51	12.55	14	194	81	22680	18%	13.7		53%	
	Type 2 Ritrain - HML	124.5	80.41	1.28	3.98	15.12	13	214	83	21680	17%			50%	
	BAB Quad - GML	119.0	77.37	1.21	3.20	11.16	13	161	81	21060	17%			49%	
	BAB Quad - HML	130.0	88.37	1.21	3.20	11.16	12	149	85	20400	16%	12.4	Better than Type 2 Ritrain	Better than Type 2 Ritrain	47%
	BAB Quad - GML	121.0	79.37	1.21	3.30	11.82	13	170	82	21320	17%	51.5		49%	
	BAB Quad - HML	130.0	88.37	1.21	3.72	15.01	12	195	85	20400	16%			47%	

For further information contact ATA on 02 8253 8600

\* The data in this table is provided for general information and does not take into account your specific circumstances. You should obtain professional engineering advice before taking action.