ECONOMIC DEVELOPMENT AND INFRASTRUCTURE COMMITTEE

Inquiry into Manufacturing in Victoria

Canberra — 28 October 2009

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Witnesses

Mr B. Nye, Chief Executive Officer, and

Mr G. Whiting, General Manager Suppliers, Australasian Railway Association.

The CHAIR — I welcome Mr Nye and Mr Whiting to our all-party parliamentary committee on the Inquiry into Manufacturing in Victoria. All evidence taken today is protected by parliamentary privilege, but anything you say outside the room is not. Could you each please state your full name and business address, the capacity in which you are appearing and your positions in that business.

Mr NYE — I am Bryan Nye, the Chief Executive Officer of the Australasian Railway Association, and we are based here in Canberra at 11 National Circuit, Barton.

Mr WHITING — I am Gary Whiting from the same organisation and the same address. I am General Manager, Suppliers.

The CHAIR — Thank you. It is over to you to make a brief presentation.

Mr NYE — It is my pleasure to give you a bit of a story about rail, and I am going start by taking a bit of a helicopter view about what is happening around Australia, because it is very relevant to what is happening in Victoria. I have put a slideshow in front of you. I do not have to tell you much about the increase in demand in Melbourne, but this is a phenomenon that is happening all around Australia currently. In every capital city at the moment urban transport networks are above capacity. In Sydney it is at 112 per cent capacity during peak hour times. That growth is not just an Australian trend but a world trend, and it is continuing. I have given you some of the reasons. If you look at that graph, I know it is a busy graph, but it is interesting that the current planning is — —

The CHAIR — Excuse me for interrupting; is it okay if these slides go on the internet as part of the evidence?

Mr NYE — Definitely; they are all open. We will send it electronically to make it easier for you to do.

With the growth that we have seen in passenger transport, everybody talks about the fuel price, but the real issue has been about the congestion. It is a worldwide phenomenon that if you have to travel in your car for more than 60 minutes, you are going to catch public transport, and that is what has happened in Melbourne, Sydney and Brisbane. We have hit that clunk, so everybody now wants to catch the train or public transport of some description, and we are seeing that.

I have put some figures here for Melbourne about some of the environmental changes and what is actually hitting there. These are the figures for 2004–2008. Of interest is that the population is increasing, but private road vehicle use has only gone up 1 per cent in that time. In fact in the US last year private car use went down 4 per cent, and that is a figure that is also trending around the world. Usage of heavy rail, as you see with your Connex network, soon to be MTM, has increased in that period of time by 23 per cent. They are the impacts and they are really the challenge overall, which is relevant to Victoria. They are the current figures.

I just want to quickly race around Australia and say that currently we have \$36.5 billion being invested in rail infrastructure and rolling stock across Australia. I just leave those figures with you. Western Australia is doing an immense amount. South Australia, which is the last one to start doing major investment, is investing in not only light rail but in electrification upgrades. You would know Victoria well, and I have not included the regional rail development recently announced for \$4.14 billion. All of that is coming. In New South Wales there is currently another major investment there in infrastructure and rolling stock going on. In Queensland there is massive infrastructure investment.

The ARTC, which is owned by the Federal Government and which looks after the rail track from Kalgoorlie through to Brisbane, has spent \$2.5 billion and is about to spend another \$1 billion on the coal networks in the Hunter Valley, but mainly it is on the Sydney–Melbourne corridor to try to improve that freight link. If you look at the rail market share for interstate freight movements — that is the graph for Australia — we do incredibly well east–west, north–south and Adelaide–Darwin.

The Adelaide–Darwin railway line is now making money. People pooh-poohed that as a white elephant, but it is actually cash-flow positive because a whole series of mineral exploration opportunities have opened up and are exporting out of Darwin on that railway line. The real cotcase for us is on the east coast between the capital

cities: Adelaide–Melbourne, Melbourne–Sydney and Sydney–Brisbane. In fact on the biggest freight corridor, Melbourne–Sydney, only 7 per cent of freight goes by rail and the rest goes by truck, and in fact that figure went down last year.

After this major investment by the ARTC, they are the projected market shares that we have. The figures in brackets for Melbourne–Brisbane are our price comparison to road. We are cheaper across each of the corridors compared to road. You will see that even after this investment we have still got a long way to go to catch up. I suppose the biggest challenge is that volume and freight movements are going to double, and there is an argument about whether it is 10 and 15. I am not really fussed whether it is 10 or 15, but the movement of freight between the capitals is going to double in the next 10 to 15 years.

Congestion cost is the thing that is killing every one of the cities, and the first city to hit gridlock will be Brisbane. Brisbane is going to go first. The planning is in place, but nothing is going to change that for a period of time. You will hear that current road and rail are inadequate, and that debate has been going on, but we are catching up a lot now. We have not even factored in the impact of an emission trading scheme on our future projections, and that will have an impact. For rail it is going to be very positive, and we are obviously quite upset that the car and vehicle manufacturers have been getting a waiver for the first three years. We think that is not acceptable. We realise that will happen for political reasons, but climate change impacts have not even started to bite.

On community expectation, we have done a lot of surveying, as you would imagine we do, and everybody expects more to go into public transport. New Zealand is one of our members; we look after New Zealand as well, and it is interesting that they are increasing excise on their petrol by 6 cents, in two tranches of 3 cents, all to go into public transport, and there has been no public outcry — none at all. They are spending 6 cents a litre on public transport. A lot of it will be going into Auckland, and if you have been there, its transport problem is worse than any Australian capital.

For us the biggest issue that we are trying to sort out is the dedicated Sydney freight corridor. The Victorian Government has done a lot of work on improving the freight corridors in Melbourne, but for us you can have one end of the chain working but if you do not get it through Sydney, you are not going to go far. The real challenge for us is the reliability. Passenger transport has right of way over the freight trains through Sydney, so we are trying to get a dedicated freight line through Sydney. We are building the Port Botany–Moorebank link now. At Strathfield North — if you know Sydney — they are diving the freight line under the rail for passenger lines at Strathfield, and it will come out with a new freight corridor to Hornsby. Money has been allocated. It is just trying to get the planning approvals through at the current time, and that is quite a challenge, believe me.

Talking about that, part of what is probably not well known is the age of our rolling stock fleet. The age of the rolling stock fleet in Australia is 34 years old. In fact the grain line locomotives that are operating the grain lines around Australia are older than anybody in this room. They are the ones that are still out there operating.

The CHAIR — But we are all young.

Mr NYE — I could tell you how old they are, but I would not want to upset you. The fact is that all the new investment that is going into all the public networks today is only taking up the additional capacity demands. We are doing nothing to replace the old ageing stock fleet. People ask me the age of the carriages. It is on average 23 years, and that is the same right across the sector. We have got a massive replacement challenge in front of us, and I think we have not really started to see the impact of that yet.

I will get on to our recommendations. We have recently combined and brought under our wing the Australian Railway Industry Corporation, so we are probably unique. We represent rail in its totality in Australia and New Zealand. We have all the operators, all the track owners and all the manufacturers. We are a big industry of about 110 000 people, we believe. We are quite a sizeable industry. We are run by the CEOs, who are my masters. The CEO of Connex, who is stepping down, and the CEO of V/Line are on the board, and as well we have manufacturing on the board of ARA.

ARIC is the peak industry body which looks after the export of Australian rail manufacturing. That does quite well. We actually have quite a sizeable manufacturing sector.

We have just put together our domestic agenda. This is the history: it is an industry, as you probably well know, that was operating in silos. State-based manufacturing was done state by state and was owned by the states. It is now a national industry, and it is really getting together as a national industry for the first time, particularly the manufacturers. In fact we had the manufacturing CEOs of the tier 1 manufacturers at a dinner — it was the first time they had met each other — only 18 months ago. It was a difficult meeting, so we had a second meeting where we had a trade practices lawyer sitting at the table, and we got on very well together after that.

One of the things we are really keen on — and I will talk a little bit more about — is predictability of demand. We have a boom and bust cycle. We think we can do better at this boom and bust cycle. It is no good each state going out separately trying to do it all at once, because there is a better way.

In terms of the lead purchaser model — we are working with the Victorian Government at the current time, the Department of Transport; they are trying to get them to take the lead on the lead purchaser model.

In regard to the industry metrics, I cannot put my hand on my heart today and tell you how big the industry is. We do not know how big the tier 3 suppliers are. Nobody has ever done any work. I do not have any tier 1 suppliers, but we do not know the extent of tier 3 suppliers. We are just starting on this road.

The national standardisation of components is a huge issue for us. I will give you an example: the same rail carriage is built in Maryborough in Queensland for Queensland Rail and Western Australia. They are both built for narrow gauge rail; they are both the same carriage if you look at them externally. However, there are 652 differences between them. It is all about different specifications. Each state has a different crash-worthiness test and a different thickness-of-glass standard. I mean the one thing we could change very quickly is we could move to a standardisation of components, because we would actually reduce the cost to Australian manufacturing dramatically. That is something that is part of the history. We all know we have different gauges. We have just grown up that way, but we cannot survive if we are going to continue to do that.

They are some of the policy barriers that we are trying to work with closely. Part of it is looking at how we can improve the whole supply chain. We are a big industry. I think unlike some parts of the car industry, we are a very successful industry. We are not up for government handouts or anything at all. We are a big industry. We are trying to work out how big we are. We are quite successful.

Most of the vehicles you see out there are built in Australia. Some of that is the uniqueness in that we have a strange kinematic envelope. If you learn one word today, it will be kinematic. The clearances for a vehicle in Australia are unique in world terms. So we cannot pull out a US locomotive and put it onto our tracks. Even though they cost US \$2 million, will have to build them in Australia at about \$8 million. The reason is our clearances around our bridges, tracks and stations are 2 inches different from the rest of the world standard. That is something we have managed to achieve.

Mr DAVIS — That is standard around the country, is it?

Mr WHITING — No, it is not the same 2 inches.

Mr DAVIS — There are variations on the standard, is that what you are saying?

Mr NYE — We have 22 different radio networks across Australia. The Indian Pacific, when it leaves Sydney to go all the way across to Perth, has eight radio sets and 345 kilograms of equipment, but it cannot talk to another locomotive anywhere across the network.

We are doing something about that right now. But they are the massive changes we have to come together. We have got a pretty good example. We have fantastic rail in Australia. The rail in the Pilbara is regarded as the world's best. The heaviest and most proficient railway you will ever see is up in the Pilbara. It was only last week I was up in Moree looking at the grain network there, and the signalling system was date stamped 1890. That is the context of what we are trying to change overall.

That is our domestic agenda. We have an international agenda. You used the term before of 'clusters'. We are trying to get clusters together, particularly in our expertise and heavy haul, which is regarded around the world as the best for pulling iron ore and coal, and taking that overseas. We are having some success from that.

In terms of our rail supply summary, our agenda is incredibly strong growth in rail operators. We just have to get better about it. We are a national voice. We have really gone through very solid review processes; we are going to have one voice for rail and work as one. We are working with the transport departments. We are trying to get a rail supply task force up. We are working with the industry departments to look at the metrics, the size of the industry and how we change it. We are very keen. We are trying to get the federal department, through Senator Carr, to get a rail sector advocate like he is doing with others. We are very close to doing that. We are pushing very strongly for Victoria to take the lead on that.

Before I get onto what I think of some of your suggested actions, I am just going to leave you with the following, and I do this everywhere I go. Rail is the safest form of land transport; it is 19 times safer than anywhere else. If you take only one train, Sydney to Melbourne, it is 150 trucks off the road. It saves 45 000 litres of fuel and 44 tonnes of greenhouse gases. Adding to that, one train in metropolitan Melbourne takes 500 cars off the road. They are the figures you really just have got to think about when asking why we got to have better rail networks.

There are some Victorian Government actions that we really took in. Victoria has taken the lead in many of these areas; you are the manufacturing centre and want to take that. We think it is a national agenda, and we are quite keen for you to take some of this and suggest some of it to others, because we do struggle in some other states to try to get the impact on some of these things.

In terms of long-term planning in collaboration with forward orders to support investments, surely every department of transport getting together could actually sought out that there has to be a longer term projection overall. Doing it individually, state by state, is not helping anybody currently. Yet we still do not do that. Everybody races to the market at a great rush.

Mr DAVIS — And do not do it in Victoria either.

Mr NYE — No, nobody does. I think we are saying you have to get better than doing that.

Mr WHITING — And the real key issue there is the forward orders slide that Bryan showed you around, if you like, the pent-up demand that sits there. Now is the time to get the act together. If we only ever do it once, now is an ideal time to be doing it, because we are going to be buying lots and lots of trains for the next 5, 10 or 15 years.

Mr DAVIS — So on that, I mean the standard of infrastructure generally, can you see — —

The CHAIR — Hang on. Can we get to the standard of infrastructure. You have got about four more sentences, I think.

Mr NYE - I think that is about right. There needs to be efficient regulation at all levels of government. You will have heard us hammer Victorian safety regulation. We have seven safety regulators in Australia for rail. The US has one for 220 million people. We have seven. It just does not make sense. Why do we have different economic regulation and different environmental regulation? We are a national industry. We have to get over that. That is hard work to do, though.

The component standardisation, I am happy to talk more about that because we have got to do that. In terms of small to medium enterprises, there are some Federal Government programs. They are the driving forces. It is interesting in Queensland, in Maryborough, in doing some work up there, they found that the local componentry, or local manufacturing, made up 70 per cent of the local content, when you do fabrication and all of those things. Obviously the engines all come from overseas. But the fabrication — car seats and door handles — should be always local. We just do not know what the extent of that metric is, and we are very keen on doing it. We think small and medium enterprises — the big boys look after themselves — is where these systems should be focused.

In terms of support for Australian-based research and development, we have a CRC on rail, and we are working really hard on trying to improve our research base. Some of the things that are uniquely Australian are our air-conditioning systems. We actually have a research program to find out right now how many generation Y we can jam into a rail carriage and how many seats we need in the future. You might think that is not relevant, but it is highly relevant to us as we are trying to overcome that capacity problem.

In terms of work with industry and other agencies to support export opportunities, we are a successful industry. We do export. So rail as an industry really has not worked as an industry in summary. It is a big industry. It is a successful industry. It is going to be here for a long time. It is one of the manufacturing industries that has a good story to tell. I am happy to take any questions.

Mr DAVIS — On the issue of infrastructure generally, the track and so forth, we have seen some figures on locomotives and such. Is there a stocktake that is available to look at that in some comprehensive way, particularly in Victoria, but nationally?

Mr NYE — Every state has done its stocktake in that and improved. Nationally you will have seen for the first time in the government's stimulus package that rail got more than road in the economics stimulus package, and that is really just by hard work and demonstrating what we needed. We needed that; I think for Sydney to Melbourne now, for an example, all the sleepers have been replaced and they are all now concrete sleepers. The infrastructure is getting up there.

The biggest challenge in infrastructure is the signalling system and changing to positive train control. A good news story again — and it has been one that I put an immense value on — is that New South Wales and Victoria have picked up the same technology in their signalling system for the metropolitan system. That is groundbreaking, believe me, having two states picking up the same train control system, because that means that we can then take that forward in that technology sense. We are trying to go from 22 communication networks down to 2 across the whole country.

That is the type of area that we are working on. The next biggest infrastructure investment will be in the radio and signalling systems.

Mr DAVIS — And standard gauge; it is an old hoary chestnut.

Mr NYE — Yes, standard gauge, but more important to us is the communications. With standard gauge, the interstate track, certain elements in Victoria — —

Mr DAVIS — There has not been much in Victoria upgraded.

Mr NYE — We might as well leave them broad gauge, because the economic return that we would get from standard gauging is not great, whereas if we had the same communication systems and greater, positive train control systems we would actually improve greatly the proficiency of the whole industry.

We had 22 gauges in Australia; we were a world record number of gauges on any one continent. We are down to nine, and some states have got three. You are fortunate in Victoria; you have got two.

The CHAIR — Before you get off to any other point, is the signalling system manufactured in Australia, or largely manufactured in Australia?

Mr NYE — For the signalling system companies, it will be companies like Ansaldo, Siemens or Lockheed Martin, all based here in Australia.

The CHAIR — In which state?

Mr NYE — Based all round Australia. Siemens has its head office in Melbourne. I do not know who will get the contract, and that is not the element. Most of it will be built, and it has to be installed. But the real bit is not that it is going to be manufactured, it is that the componentry, the installation and the maintenance over the 30-year period will all be Australian.

The CHAIR — Thank you. And the radio communications system?

Mr NYE — It is the same thing: it is a positive train control that we are putting in. Signalling and radio communication are all being done here.

Mr CRISP — Procurement local content targets are something that the manufacturers have been very strong with. What is your view on a 40 per cent local content target included in the Victorian rail rolling stock procurement policy?

Mr NYE — The current Victorian policy on 40 per cent local content means that everything can be imported from overseas, fully. It just means, the way it is written, that it just has to be maintained in Australia. Yes, they will be maintained in Australia, but they can be imported, fully. It is how you write the policy.

Mr DAVIS — But not a stitch made locally?

Mr NYE — Not a stitch made locally.

The CHAIR — But that has been updated recently with the trams — not trains, but with trams it certainly is.

Mr NYE — It is a very difficult area to get into and try to define local content policy, and I do not think we really want it. We, as an industry, are trying to come to grips with it. What do we really mean by it? Overall, we do not know how much is built in Australia, and that is why we want to do this survey. We will probably find there is more built in Australia than we know at the moment.

Mr DAVIS — But as it is constructed, it is a bit misleading, really.

Mr NYE — It is misleading.

Mr DAVIS — That is right, it does not really transparently show what is actually happening.

Mr NYE — It does not transparently show that that is the case.

The CHAIR — Peter, keep going on this line, if you do not mind — if you wish.

Mr CRISP — The next bit I had was on Australian standards and whether they were of value to you in some of those issues you raised on both procurement construction and then on that Australian content stuff. I am just getting my head around your answer, but that will be fine. Are there Australian standards, and is that a way to deal with some of the issues that you talked about earlier?

Mr NYE — As part of my remit I am also on the Rail Industry and Safety Standards Board, and that has only been in existence for four years now. I do not come from rail, so I am quite mesmerised by the fact that we did not have standardisation in Australia at all. It was all done state by state and sometimes never documented, so we are trying to document that now.

I will give you an example. South Australia has broad gauge wheels. There were nine different specifications of broad gauge wheels in South Australia, and we have done that. We have got a massive program of standard setting right now. We are the second largest standard-setting body in Australia currently trying to catch that up.

We are not going into — we have not even ventured into — the componentry. We are trying to deal with such things as the work-on-track rules, common operating rules, across Australia, so we have not had high-level standardisation. In the componentry, we think that is where there is a massive amount of work, and government assistance could help. It is costing the taxpayer an immense amount of money, because every state — and not only every state but within the industry itself — does it differently. There is no logic to it, but that is just the history.

Mr WHITING — Our real view around this is that the collaboration around both the development of Australian standards and also levelling of orders gives companies an opportunity to optimise their production. At the moment they are doing project-by-project work, so you win the contract; it might run for two, three or five years; and then basically, unless you win a fairly equivalent contract, you almost tear that thing down and start again, and mothball whatever it is you are doing. That is not an efficient manufacturing model to work with.

Mr CRISP— I would now like to extend that with the crunch of the question, which is: how is Victoria doing in this process? Because if there is an obstruction from Victoria in getting us to be more efficient, we probably need to hear about it now.

Mr NYE — Part of the challenge is that the Department of Transport and all of transport actually put the case forward that the people who actually make the decision about procurement are Treasury and Finance.

Mr CRISP — The untouchable department.

Mr NYE — That is the challenge, and we are trying to work very strongly with that. Victoria is taking the lead, and it has a manufacturing base and is doing quite well. We are asking Victoria to step up to the mark a bit further and to try to take some national leadership on this. And there is a willingness within the departments to do that, but the influence of Treasuries in some of these is something of a black art that we all suffer, and you suffer it the same as I suffer it on the other side.

The CHAIR — I imagine that these standards will be discussed at a transport ministerial council in time. Is there any political will within any state or territory or nationally to bring rail onto a Treasury ministerial council?

Mr NYE — No. It is on COAG. It goes to COAG. COAG is very interested in infrastructure; it has not yet got to the componentry. Obviously you have seen that the Prime Minister has come out and made a statement about wanting to have some say if he is going to approve and make investment into urban developments and urban public infrastructure, and a lot of that is transport. We have been pushing very strongly for that and trying to say, 'You have got to improve the bang-for-the-buck you are going to get'. He knows it, and we have briefed him on it.

Mr DAVIS — There is no guarantee he will do it any better.

Mr NYE — There is a mood out there. Rail has not got a great history of working together. It is a rail system that was state based and solo driven up to about six years ago.

Ms THOMSON — Somebody privatised some of it, though.

Mr NYE — In a lot of it, in the privatisation, there are national firms now pushing for national solutions. The freight operators work nationally; they do not work on a state border, so they want national solutions, and there is a real push there.

Unfortunately we still live in a federation, so we are trying to say there is a role for individual states to move faster and push some of those agendas. I will give you a good example where Victoria has done well: in level crossings. Out of the horrible impact of Kerang, you have taken some lead in that, and we have now got rumble strips going in across Australia, with a whole series of innovations that have come out of that consequence. You cannot have different solutions in every state on level crossings, but we did, and that is the way of the history.

Mr DAVIS — We have still got a massive catch-up on level crossing infrastructure to complete.

Mr NYE — We certainly do.

The CHAIR — Can I get down to specifics in relation to time lines for these standards? Given that we have had decades and centuries of different standards, have you set time lines for what you think should be a reasonable period to allow for some agreement?

Mr WHITING — It is best to describe the situation we are at, at the moment, as in stakeholder engagement and scoping. We have not started the process, which is why we are getting to the point where we say Victoria has done a wonderful thing and said, 'We support this. This is a great thing. We will take the lead'. We have not started moving yet. If you are looking for an opportunity to accelerate that momentum, we would take it.

The CHAIR — How? What would your recommendation be on accelerating the momentum?

Mr WHITING — It is really about making more noise, because it is about priorities. People are busy, and they schedule things as fast as they can. We are working with a fairly broad stakeholder group, which takes a fair bit of moving, so out of a forum like this, further energy and noise would be much appreciated.

Mr CRISP — Is there any resource requirement?

Mr NYE — Yes, there will be.

Mr WHITING — There will be, and that is all being scoped and worked through as we speak, and as I say, the question is: why is it taking so long? I am not saying it has taken too long; it is just we have a long journey and we are only just in the very early scoping stages. There are no time lines at this stage.

Ms THOMSON — I understand that you are drilling down to try to work out what manufacturing is actually being done here, but in the broad picture, percentage wise, where would the majority of rail infrastructure be manufactured in the country?

Mr NYE — That is something that, without being quoted, is difficult to say.

The CHAIR — You will be quoted. You are on transcript.

Mr NYE — I know that, but my actual perception is that for the freight locomotives — and those are the big ones — all the engines are imported. We will not change that. We do not manufacture those in Australia. We put them together in Australia, the fabrication, and the wheels are made in Australia, so overall I would say around 50 per cent. It is much the same — this is my gut reaction I am trying to give you — again for passenger transport. When you look at the size of that order, that is still a massive amount that is built in Australia. We would like to know; that is why we are saying you have to understand more of the industry metrics. From just looking around and trying to find out, I would think it is at least 50 per cent.

Ms THOMSON — And of that 50 per cent, where would that be built?

Mr NYE — Every state has a manufacturing facility.

Ms THOMSON — So no-one is exporting — for want of a better word; isn't it a terrible thing to say? — and no-one is constructing and building to take to market in another state?

Mr WHITING — That does happen, yes.

Mr ATKINSON — Bombardier does.

Mr NYE — Bombardier builds in Queensland and takes it over to Western Australia. New South Wales takes it and exports elsewhere. They are all national companies; they just go after national exports. Given the size of the industry and the demands, if we do not get it right, our concern is it will all come out of China. That is the fact. China and India are massive in the amount of rail that has been built there. If we do not get it right, that is where it will come from and we will lose that skill base. I picked one of your earlier questions about the industry innovation council. What we are particularly worried about is that you have to build your skill base to be able to maintain it. That is why you want manufacturing here, because you cannot maintain something if you do not have the skill base to do it.

The CHAIR — That has led me to a question. One of our witnesses, who spoke to us off the record, commented upon a piece of rail — —

Ms THOMSON — It seems you are about to go on the record.

The CHAIR — No, I am not saying who it was or where it was. In conversations that a number of us have had we heard that there was a piece of rail infrastructure that was off the rails for over five months and then sent back to its source of manufacture because we could not get the components and the servicing done here. Would you like to expand upon the value of manufacturing and having that service industry flowing from people who know how things are constructed?

Mr NYE — That is a key component, and we have done quite a lot of work. We have done what is called an attraction and retention survey. We have done a massive amount of work looking at the skill base in rail: what has to go forward in the future, what skill shortages we have and what we need to do to address that. Talking about manufacturing, railway engineering comes behind sewerage engineering as an attractive engineering prospect to go into. We are at the bottom of the tree. As part of it, we know that we are seen as having tired technology and ancient technology, and we have a very old workforce: our average age is 53.

What do we need to change that? We have a massive program about making ourselves look more attractive. But if we do not do that, we will have all this money being invested and not the skill base to be able to maintain it. A

part of it is how we go about that. One single company cannot change that. Part of it is interesting. United Group in Victoria sponsors a schools program through the National Sports Museum. It is sharing that with the other manufacturers. There is now a rule that we cannot do this on our own; we have to work it out together. It is talking about sharing graduate programs across the manufacturers. There is a different way of looking at it, so I think we have to get in there. But you cannot import skills to maintain stuff.

The CHAIR — No.

Mr NYE — I can give you better examples. Part of the problem in New South Wales is we have to go to the heritage museums to find the parts to maintain the system.

Mr WHITING — I just have a bit of a comment. You asked before about manufacturing facilities, and I will just read out a version of what I put in the submission about the locations. In terms of rolling stock manufacturing facilities, these major centres sit in regional towns: Ballarat; Dandenong; Junee down the road here; Newcastle, which is a big centre; Taree; Maryborough, which we have talked about; Rockhampton; and Ipswich. Around them usually sit the very small-to-medium enterprises off that. We can give you numbers around those sorts of things — those sorts of factories, if you like — but we cannot tell you all the feed-ins that exist. It is quite intricate how one state will feed components to another state and back again. There is a lot of freight volume occurring across those productions. That is an untold story about how significant this industry is to regional economies. Some of these things are not large in terms of huge employers, but in a regional centre it is critical.

The CHAIR — Do we have in Australia an annual rail trade fair or something?

Mr NYE — Yes. We are having it in Adelaide on 17 to 19 November.

Mr WHITING — You are all welcome.

Mr NYE — It is big; about 3000 people come. All the exhibitions are there. It is a big conference.

Mr DAVIS — They all come by train?

Mr NYE — I was going to ask how many of you travel by rail.

Ms THOMSON — Not to Canberra!

Mr WHITING — There are about 300-odd trade exhibiters at that, so you get to see all things specific.

The CHAIR — If only the parents and the kids could see it.

Mr DAVIS — I just have one more question. You mentioned the Australian Railway Industry Corporation and exports, and the inability to quantify the export sector. Is that what I should take from what you said?

Mr WHITING — Yes. It is the early days stuff.

Mr NYE — To be fair, we have only been in our current form for six years. We have worked with the track and passenger groups, but we only really started 18 months ago with the manufacturers. Six months ago we took over ARIC to try and work out in a better way the dynamics of that. Rail has not got a great history in Australia, but it is going to have a great future — there are some great opportunities.

Mr WHITING — Having said that, the previous presenter talked about how a government intervention helped his company to go offshore. We had a cluster forum in Melbourne last week, and one company there said, 'We went off on a trade mission that was sponsored by a particular government. We went in there, showed some people what we do as a product, as a service, got a \$2 million contract, and really I do not think we would have existed as a business today without that sort of assistance'. I really just say that to reinforce the previous speaker's comments and to say we get those same stories too.

The short answer to your question is we are in early days in understanding how we export. Companies do successfully export rail components and even rail maintenance activities. There are a lot of success stories, but

we have to grab anecdotes at the moment because we have not done the work that we would like to do. In a couple of years time we will have.

The CHAIR — Thank you. We are running over time, and Mr Atkinson wants the last question.

Mr ATKINSON — It does not have to be the last; it is just one question.

The CHAIR — We are running over time. We have to catch the train to Sydney!

Mr ATKINSON — A lot of your evidence has focused on your own industry's activities in manufacturing, which of course is important, but I was also interested in the overview that you provided at the start, which is yourselves as part of the infrastructure base for other manufacturers and the movement of freight and so forth. I just wonder what sort of R and D has been done within the railway industry on new transport solutions — you know, modules that can be used, transfer systems, docking systems; all of those sorts of things — to actually facilitate higher targets for freight movement in Australia for other manufactured goods, not just your own industry.

Mr NYE — No. I think one that we are certainly looking at is the containerisation of grain. Moving grain by bulk transport probably will not be continuing to grow — most of it is how we can optimise the containerisation of grain. Currently it goes into 20-foot food-quality grain containers. We were looking to see how we can get it into 40-foot containers and how we can get it loaded onto ships, and the whole global chain of how we are moving grain. In the near future it will be more likely to go by containers. That is going to be very relevant to Victoria, because there is hardly any bulk handling of rail left to do it there. Watch grain this year; we are all going to have a grain crop, and there is going to be hell to pay all up and down the coast. That is one thing we are looking at.

In terms of manufacturing and trying to look at that — no. The communication and the rapid adoption of technology is really being led out of the Pilbara, with such things as instrumenting every vehicle to actually get the temperature of every wheel to know when there is a hot bearing, because a hot bearing leads to a melting wheel, which leads to a derailment. With technology today, and Australia leading it, it is actually instrumenting the train so we will know if there is ever a brake failure. They are changing the whole way they are doing it in the Pilbara. When they are applying brakes they use electronically controlled braking systems. Instead of the driver applying a brake and the pneumatic systems that work all the way down the train, now they will brake the train across its whole length in different ways, so different vehicles will be braked at different times to keep the exact distance apart. That is all Australian technology, and that will be exported.

Mr ATKINSON — What I am focused on, though, is that one of the reasons you have lost such a share of freight is that the thinking has been on big containers. The thinking has been on grain movement, ore movement and so forth rather than on manufactured goods. One of the interesting things about the whole process in terms of manufactured goods, particularly into retailing, is that they are now coming down to small modules. A lot of the manufacturers overseas are not just making a dress, they are packing it, they are pricing it and they are putting it on the coathangers and on shelves, wheelers, racks and so forth. So they basically just wheel it straight out onto the shop floor, ostensibly from the manufacturer, supplier, importer or whoever. A lot of the process for those manufactured goods, rather than the 40-foot grain containers. I just wonder: is that an area where there is some research and development? Just the transfer of freight to rail is very attractive because of all of the environmental issues that you talk about. Retailers, for instance, are now certainly looking at major distribution centres where they could have goods delivered, but what they want is a small package marked 'Northland store', 'Southland store', 'Narre Warren' or whatever, and they just break it up and it goes onto trucks.

Ms THOMSON — That is the intermodal hubs.

Mr NYE — That is the intermodal hubbing. Woolworths has been quite up-front. It will put all its interstate movements onto rail as soon as we sort out the reliability problem. The reliability problem is getting through Sydney. You poke a train out of Melbourne by 2.30 in the afternoon; it has to get through Sydney and to Campbelltown by 5 o'clock in the morning, otherwise it is called a 'bad' train. In terms of reliability, it gets to Sydney with about 90 per cent on-time running; by the time it gets to its terminal in Sydney, it is about 30 per cent on-time running. That is the biggest reason why we are not using rail.

I think around the world the whole logistics chain is changing. In South America and in a lot of the US states now, you cannot take trucks into the CBD during daylight hours. They are changing the whole logistics chain. We have not even started down that chain yet. We have the most proficient and highly productive trucking system in the world, and we have just put all our money into trucks. Unfortunately that is not sustainable in the future.

The CHAIR — Thank you. I appreciate your time and the clarity of your recommendations. Hansard will be providing you with a copy of the transcript within a fortnight. Typographical errors can be corrected; substance cannot. Thank you.

Committee adjourned.