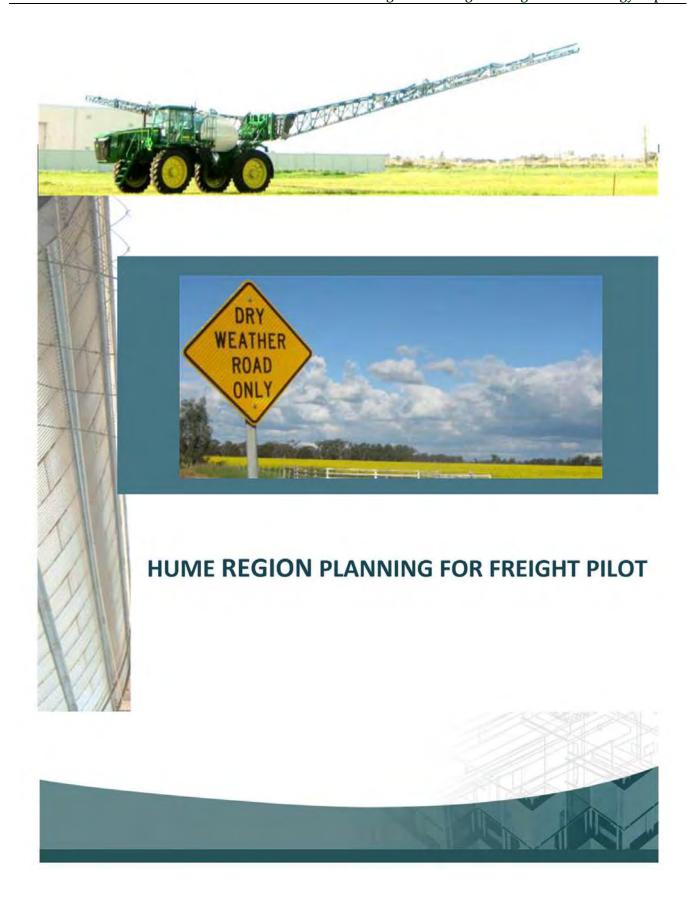
ATTACHMENT TO AGENDA ITEM

Ordinary Meeting

18 February 2014

Agenda Item 8.1	MAV - Hume Region Planning for Freight Pilot and RDA - Freight Directions in the Hume Region Strategy Reports
Attachment 1	Hume Region Planning for Freight Pilot - Strategy Report550
Attachment 2	RDA Freight Directions in the Hume - summary report 624
Attachment 3	Strategic Freight Network upgrade projects for Hume PFFP
Attachment 4	Hume Region Planning for Freight Pilot - B-Double strategic freight route mapping



The Hume Region Panning for Freight Pilot is an initiative of the councils in the Hume
Region, in conjunction with the Municipal Association of Victoria.

insert logos from each council and MAV

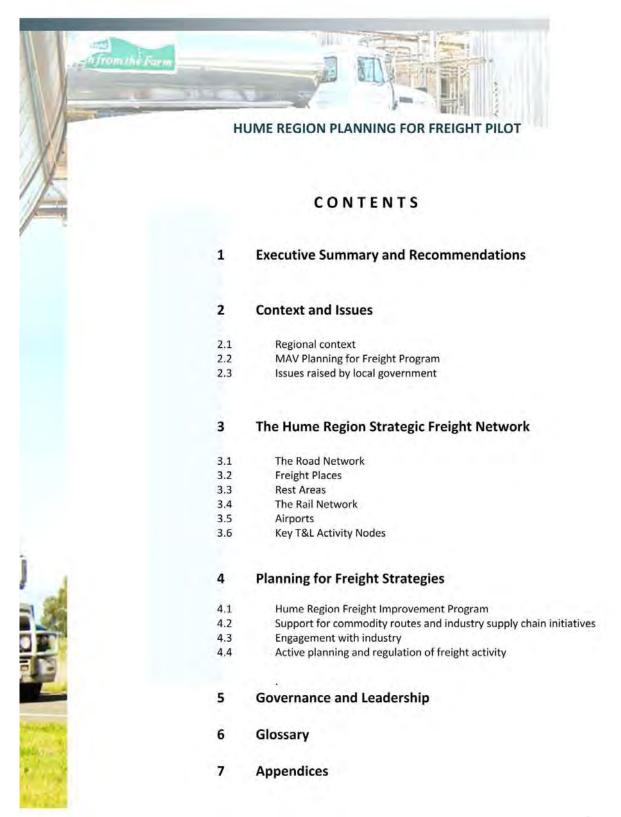
Project consultants

RED Strategic Planning www.roseedconsult.com

CT Management Group www.ctman.com.au

April 2013

Page 1 of 73



Page 2 of 73

1 EXECUTIVE SUMMARY AND RECOMMENDATIONS

The Hume Region Planning for Freight Strategy is an initiative of the 12 councils in the Hume Region (and collectively the Hume Strategy Transport Sub Group), working in collaboration with Municipal Association of Victoria (MAV). The project is a pilot for other local government regions in Victoria.

The impetus for the MAV Planning for Freight Program is to build capacity within the sector to fulfil its role in economic development, land use regulation, asset management and enforcement of local laws.

The Australian freight transport industry is currently undergoing a significant restructure with the advent of the National Heavy Vehicle Regulator and the COAG Heavy Vehicle Pricing Review Process. These changes will have a significant impact on local councils across Australia, in terms of:

- 1. Changing roles and responsibilities, especially in relation to access arrangements
- 2. New funding sources for local roads.
- The growing importance of local government regional freight strategies, as a means of defining the policies and priorities of local councils in a consistent manner. Currently, stakeholders are frustrated with the variety of access and process arrangements in place across the local government sector.

Significant freight issues for the Hume Region councils are -

- "Spine and rib" high capacity freight movement getting the most out of the national corridors;
- Encouraging multimodalism;
- Getting better outcomes through land use planning;
- Lack of funds to respond to freight growth and its demands on infrastructure bigger, safer, better;
- Road safety an ongoing challenge; and
- Inter-regional movement as regional economies interact.

Councils in the region, industry and transport and logistics (T&L) suppliers have identified priorities which, if implemented over the next four years, will improve freight management in the region and in each local government area (LGA).

The strategic approach to freight management in the region is based on the following premise -

- in order to plan for freight, councils need to better understand where, what, when, who, why and how freight is moving
- given the lack of funding available, councils need to prioritise freight routes and attempt to limit the extent of local roads use by heavy vehicles, favouring State-managed roads
- once strategic routes are identified it is vital to understand, document and transmit to freight generators, the costs of maintaining these assets fit for purpose
- freight generators should be in a position to understand the costs and benefits of route upgrades
 - councils in the region will subscribe to a Hume Region Freight Improvement Program, including a suite of projects, to advocate for funding
 - councils in the region will work together to implement freight management solutions to deliver a consistent outcome.



Page 3 of 73

A Hume Region Freight Improvement Program has been developed which includes initiatives under the following themes -

- 1. Selected heavy vehicle local and arterial route upgrades to improve productivity and safety
- 2. Gazettal, transfer or declaration of strategic local roads for higher mass limit access
- 3. Commodity Route Plans and Industry Supply Chain initiatives
- 4. Facilitation of freight places to secure investment and sequence development
- 5. Engagement with freight owners and suppliers in the region
- 6. Active planning and regulation of freight activity.

Taking a collaborative approach and integrating local initiatives into the regional transport framework will enable each council to -

- improve the competitiveness and productivity of local industry and businesses;
- deliver consistent advice and better certainty for T&L suppliers; and
- o relieve the impact of freight activities on local amenity and assets.

This pilot and the subsequent implementation will lead Victorian local government in demonstrating how to incorporate planning for freight into council responsibilities and to articulate local actions into wider regional, State and National policy and strategies.

The following table summarises the proposed actions for the Hume Region.

Select	ed heavy vehicle route upgrades (LOCAL and arterial)	Hume LGAs/agencies
Local	Road Package for PBS upgrades -	
	ill, Goodwin, Ackerly Sts	Benalla
	er Rd, Wahgunyah	Indigo
	madda Rd, Gooramadda	Indigo
Old Do	ookie Rd	Greater Shepparton
Lemno	s North Rd – Central Avenue link	Greater Shepparton
Welsfo	ord St	Greater Shepparton
Dead I	Horse Lane	Mansfield
Seymo	our O-D Route	Mitchell
Darray	veit Rd	Mitchell
	nds Rd	Mitchell
	Creek Rd	Murrindindi
	Rail Crossing roundabout	Strathbogie
	nbie-Locksley Rd	Strathbogie
1 To	St extension to Reith Rd and new bridge Fifteen Mile Ck	Wangaratta
Allans	Rd	Wangaratta
Other	Priority Freight Route Upgrades	
Alpine		
	Great Alpine Rd line marking and shoulders	
Benall	a	
	Dobson Rd	
	Davies Rd	
	Baddaginnie Hume Freeway exchange	
	Winton Freeway exchange	
	Benalla-Tatong Rd shoulder sealing	
	Midland Hwy - Benalla to Mansfield shoulder sealing	
Indigo		
	Indigo Creek Rd-Beechworth Rd, Barnawartha	
	Soldiers Rd, Barnawartha	
	Rutherglen Truck Bypass	
	Kiewa-Bonegilla Rd, Tangambalanga	

Page 4 of 73

Greater Shepparton

- Bowey Road and Tallygaroopna West Bunbartha Rd link PBS upgrade
- Arcadia Road between Goulburn Valley Highway and Euroa-Shepparton Rd PBS upgrade
- Merrigum-Ardmona Rd between Byrneside-Kyabram Rd and Tatura-Undera Rd PBS upgrade
- Toolamba-Rushworth Rd between Murchison-Tatura Rd and Mooroopna-Murchison Rd PBS upgrade
- Orrvale Rd- Midland Hwy intersection PBS upgrade
- Victoria Rd-Katandra Main Rd Link PBS upgrade
- Trailer exchange/driver changeover point near Doyles Rd
- · C391 Shepparton Alternative Route PBS upgrade
- M39 Shepparton Freeway Bypass
- North Shepparton Arterial (East-West) Link between proposed Shepparton Bypass and Shepparton Alternative Route
- Florence St- Midland Hwy intersection PBS upgrade
- · Lockwood Rd- Midland Hwy intersection PBS upgrade
- Dhurringille Rd-Tatura between Toolamba-Rushworth Rd and Midland Hwy PBS upgrade
- Ardmona Rd between Midland Hwy and Echuca Rd
- Midland Hwy East Goulburn Main Channel Bridge widening

Mitchell

- Broadford-Glenaroua Rd
- · Seymour-Pyalong Rd
- · Lancefield-Pyalong Rd
- North Mountain Rd
- Dry Creek Rd
- Old Sydney Rd
- Camerons Lane
- Hume and Hovell Rd, Seymour
- Broadford-Flowerdale Rd (part in Murrindindi)

Moira

- Bridge strengthening (routes TBA through grain movement plan)
- Benalla-Tocumwal Rd Katamatite-Benalla

Murrindindi

- . King Parrot Creek Rd
- Miller St Yea (swap with VicRoads for heavy vehicles)
- · Ghin Ghin Rd, Yea bridge upgrade
- Yarck Bridge
- Broadford-Flowerdale Rd(part in Mitchell)

Strathbogie

- Avenel Freeway interchange
- Balmattum Rd, end of seal and Quarry Rd, Violet Town

Towong

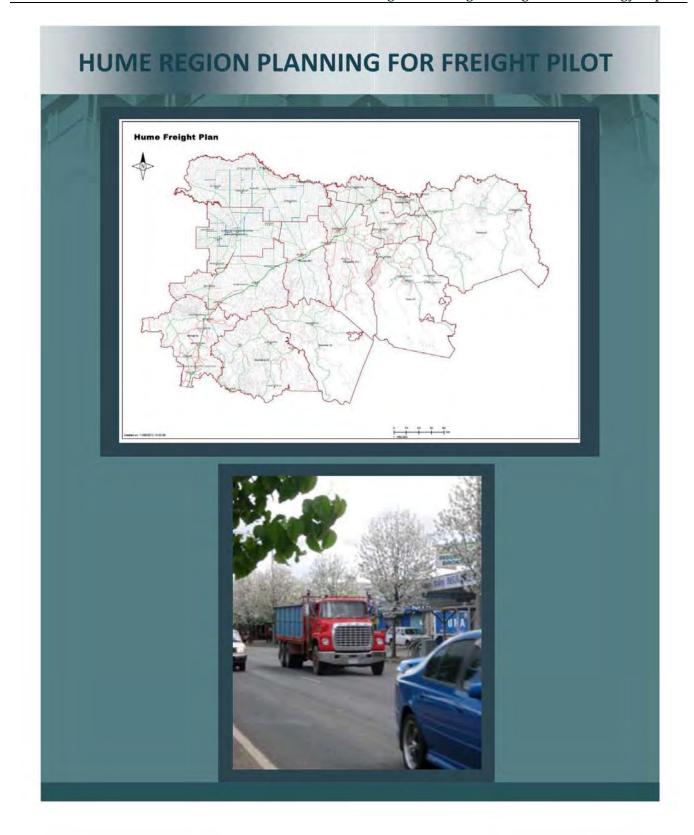
- Benambra-Corryong Rd connection to East Gippsland
- Shelly Rd timber cartage through to NSW

Page 5 of 73

	Wangaratta	
	 Peechelba Rd-Jones Swamp Rd, Peechelba 	
	Staged upgrade of Allans Lane – Markwood-Tarrawingee	
	Rd to Snow Rd	
	 Benalla-Whitfield Rd from Boggy Creek Rd 	
	Edi-Cheshunt Rd	
	 Rose River Rd 	
	 Bowser Exchange ramp alignment and trailer swap/rest 	
	area	
	Wodonga	
	 HPV access to LOGIC industrial estate 	
	 Murray Valley Hwy to Whytes Rd PBS upgrade 	
	 Mahers Road PBS upgrade 	
	(mostly within Indigo Shire)	
	 Shoulder widening on Wodonga - Yackandandah Road 	
	 Road widening to the Kiewa Valley Highway 	
	 Road widening to the Murray Valley Highway 	
	 Intersection improvements to the Old Barnawartha 	
	Road/Murray Valley	
_	McKoy St-Hume Freeway intersection	
2	Gazettal, transfer or declaration of strategic freight routes for HML access	
	Revise gazetted routes for B-doubles	All
	Determine and notify NHVR of preferred PBS routes	All
	Propose routes for declaration as part of the arterial network	Benalla, Indigo, Wangaratta, Mitchell, Murrindindi
3	Support commodity route plans and industry supply chain initiatives	
	Food Industry Supply Chain Performance Project – scope and seek partners and funding	Strathbogie, Shepparton, Moira
	Grains commodity movement plan and trial of "Share the Wear" model	Moira
	Regional feasibility assessment on the introduction of a tonnage scheme for specific commodities hypothecated to commodity route plans	All
4	Facilitation of freight places to secure investment and sequence development	
	Logic, GV Link and Beveridge freight logistics hubs in the National Freight Strategy to be endorsed by COAG and funded facilitation	Wodonga, Greater Shepparton, Mitchell
	Investigation of additional freight places and their facilitation needs e.g. Mangalore	Benalla, Wangaratta, Strathbogie

Page 6 of 73

5	Engagement with freight owners and suppliers in the Region	
	Freight in our Community event	All
	Heavy Vehicle last mile access and HV Safety seminars	All, NHVR, Hume Region Transport Sub Group
6	Active Planning and Regulation	
	Development of truck route maps	Wodonga, Greater Shepparton, Benalla, Wangaratta
	Review performance of Council's own freight generators	All
	Evaluation of commercial loading areas	All
	DPCD Practice Note/SPP on freight access to commercial areas	Hume Transport Sub Group, Hume Region RMF and DPCD
	Review signage to include street numbers	All
	Review vegetation overhang on strategic local HV freight routes	All/DSE
	Review truck parking availability within walking distance of commercial areas	All
	Develop a consistent policy on truck parking	Hume Region Transport Sub Group
	Review truck marshalling strategy for industry sites with truck queuing	Moira, Indigo
	Service Centre overnight truck parking trial	Strathbogie
	Rest area strategy for arterial and local freight routes	All, Hume Region Transport Sub Group, RACV, Vicroads, T&L industry
	Retrofit the Infrastructure Design Manual	Hume Region Transport Sub Group, IDM management group
	Prepare maps of freight generators and routes on GIS systems	All
	Strategic planning of freight generating areas as a module in city planning (industry capability studies)	Greater Shepparton, Wodonga, Wangaratta
	Inclusion of freight planning in MSS/long term strategic planning	All
7	Governance and leadership on PFF Initiatives	
	Coordination through the Hume Region Transport Sub Group	All
	Council commitment to a 4 year program of implementation	All
	Recruitment of industry champions for Planning for Freight	Hume Region Transport Sub Group



Page **8** of **73**

2 CONTEXT AND ISSUES

2.1 Regional Context

The Hume region includes the 12 municipalities of -

Alpine; Benalla; Greater Shepparton; Indigo; Mansfield; Mitchell; Moira; Murrindindi; Strathbogie; Towong; Wangaratta; Wodonga.

Key reports on transport and freight in the region include -

- Hume Corridor Regional Transport Strategy 2009
- Northern Victoria Regional Transport Strategy 2009
- Hume Region Passenger and Freight Rail Review 2011
- National Road Safety Strategy 2011-2020
- · ARTC North-South Investment Plan
- Victoria's submission to Infrastructure Australia November 2011

Key reports in relation to strategic planning include -

- Hume Regional Plan The Hume Strategy for Sustainable Communities 2010-2020
 - Goulburn Valley Sub Regional Plan
 - Upper Hume Sub Regional Plan
 - Central Hume Sub Regional Plan
 - Lower Hume Sub Regional Plan
- Hume Regional Growth Plan
 - Summary of Issues Dec 2011
 - State of Hume Region 2010-2012, August 2012

Each Council in the region has a long term vision expressed in a community plan. The shorter term strategies underpinning that vision are documented in four- yearly Council Plan and in Council Resource Plans. There are also numerous strategies, plans and reviews relating to transport, freight, land use, industrial land and economic planning as well as road management plans.

Key regional issues relating to freight and the responses at a regional level are summarised as follows -

"Spine and rib" high capacity freight movement - getting the most out of the national corridors

The Hume region is home to the most strategically important freight corridors in Australia. During the resources boom attention has been drawn from the criticality of the corridors in the region to Australia's economic wellbeing. The region carries the highest volumes of domestic freight and generates high value export freight. As such, the focus on freight movement in this region is of national significance and how the region administers its responsibility for freight is also a national example.

The corridors of national significance that require intensive management and investment are the road and rail linkages to regional NSW and Queensland and the East coast capitals Melbourne, Sydney and Brisbane.

How does the region optimise its hosting of these national corridors? One evident strategy is to create freight hubs that connect with these rail and road corridors. Another is to utilise these corridors for economic journeys by connecting east-west freight collector routes, effectively using the "spine" created by these national corridors. Another is to bypass towns to improve local amenity and enable through traffic improved travel times. Ongoing advocacy of rail gauge standardisation of the Shepparton –Tocumwal rail line is another.

Elements of this strategy are evident in many of the reports prepared in the past decade.

Page 9 of 73

Encouraging multimodalism

The recent work undertaken by regional bodies indicates the need to place more emphasis on the role that rail can play in freight movements through, to and from the region. Commonwealth and State Government investment has been made in the region to attract mode share to rail and improve rail access to Victoria's commercial ports. Investment has also been made in intermodal hubs in the region. Rail's mode share has failed to respond. Government and industry strategies to encourage mode shift are a live issue for this region.

Getting better outcomes through land use planning

Reports consistently record the pressing need to integrate transport and land use planning and to use land use regulation and strategic planning to curb the negative impacts of freight movement, so that the benefits can be enjoyed by residents and businesses.

However, beyond identifying major freight hubs (and often needing to retrofit them with improved transport connections) few freight-specific planning strategies and processes appear to have been deployed.

Lack of funds to respond to freight growth and its demands on infrastructure – bigger, safer, better

Reports consistently identify the asset renewal gap councils are facing and the growing demand for access to farm storage and new industrial sites with larger and heavier equipment.

These productivity gains are dependent on network access and this is a funding and asset management challenge for all levels of government.

Infrastructure Australia is advising greater involvement of industry in co-funding of key linkages to improve freight productivity.

Road safety an ongoing challenge

The region has a number of high risk intersections and network nodes where high collision statistics have been recorded. Rest areas, shoulder width, vegetation intruding on road space, dangerous road geometry are cited repeatedly in reports.

Inter-regional movement as regional economies interact

Inter-regional linkages are beginning to feature as higher priority in reports. Links between the ACT and Gippsland through the region and links to Bendigo, Echuca and regional NSW are becoming an economic strength for the region, often dominated by the north-south transport spine. Exploration of these economic links and their road and rail infrastructure is an issue which repeats.

Page 10 of 73

2.2 Municipal Association of Victoria (MAV) Planning for Freight Program

In 2009, the Municipal Association of Victoria and the Victorian Freight and Logistics Council undertook a review of the capacity of local councils to plan for and manage the growth and impacts of goods movement in their regions.

A report titled "Local Government Capacity Building: Planning for Freight" (July 2010) was produced detailing four recommended strategies to support local councils –

	Barriers			
Actions	Improving council understanding of freight	Adopting strategic freight thinking and network planning	Supportive organisational drivers	Appropriate decision-making tools
Improve the understanding of freight issues by councillors and council staff.	V	4	V	
Develop a freight planning and evaluation toolbox.	V	¥	V	V
Develop regional freight strategies.	V	٧	1	
Develop land use and transport guidelines for the design of freight generating areas	V	٧	V	V

In 2010, the Australian Roads Research Board (ARRB) Group convened a national meeting to discuss the future uptake of higher productivity vehicles (see Appendix E) and the impact that community opposition to bigger trucks would have on transport productivity and economic competitiveness.

Since these activities, further policy and planning work has occurred, including -

- · Agreement at COAG to form national transport regulators, including the national heavy vehicle regulator;
- · Road Reform Plan work on road pricing models;
- · Victorian Government initiatives to grow freight on rail and develop regional intermodal hubs;
- · Development of the on-line PBS Route Assessment Tool in Victoria; and
- Development of Regional Plans and Strategies to guide development.

This Planning for Freight pilot is one of the proposals coming from the research and high level discussion taking place with all levels of government, industry and community representatives.

It aims to complement work being done at a Commonwealth, State and regional level, focussing on the work of local councils and supporting their capacity to play a vital role as land use regulator, asset manager, strategic planner, advocate and facilitator of economic and social wellbeing.

Objectives of this Pilot are -

- 1. To pilot a process for planning for freight for Councils across Victoria, which will -
 - articulate with national, state and regional transport and land use planning;
 - identify and prioritise freight improvements across the region that the 12 councils in the region can commit
 to support;
 - focus on the accountabilities of each local administration, individually and in cooperation with neighbouring councils:
 - provide tools which each council can apply in ongoing management of freight issues.
- To ensure councils in the Hume region nominate their preferred Performance-Based Standards higher productivity freight vehicle (HPV) and higher mass limit routes.
- To provide templates that can be used by councils in other regions to support their capacity to manage freight movement.

Page 11 of 73

The methodology for the pilot involved the following tasks -

- 1. Review of relevant reports and strategies
- 2. Capture freight issues across the region from the 12 councils and regional agencies
- 3. Document the freight network
- 4. Review the current and future freight task and network capacity and impediments
- 5. Identify and document Planning for Freight Strategies that will address local and cross-municipal freight issues
- 6. Create templates and process guidance for local government
- 7. Hume Freight Improvements
- 8. Draft and Final Report

Additional activities associated with the project include a *Freight in our Community* event to enable community discussion on freight and logistics in the region. This event will enable an experience which raises awareness of the benefits of higher productivity vehicles.

2.3 Planning for Freight Issues raised by Hume Region councils

This section summarises consultations with each council in the Hume Region, covering the freight management and planning issues that arise in each area as well as common issues between groups of councils or prevalent across the region.

Each council has outlined key concerns as well as identifying freight generation sites, freight routes on the local transport network, infrastructure limitations and future development of residential, industrial and commercial land uses that have associated freight activity impact.

Generally council's asset and infrastructure managers, strategic planning officer and economic development officer were involved in discussion. Notes of these consultations are recorded in Appendix A.

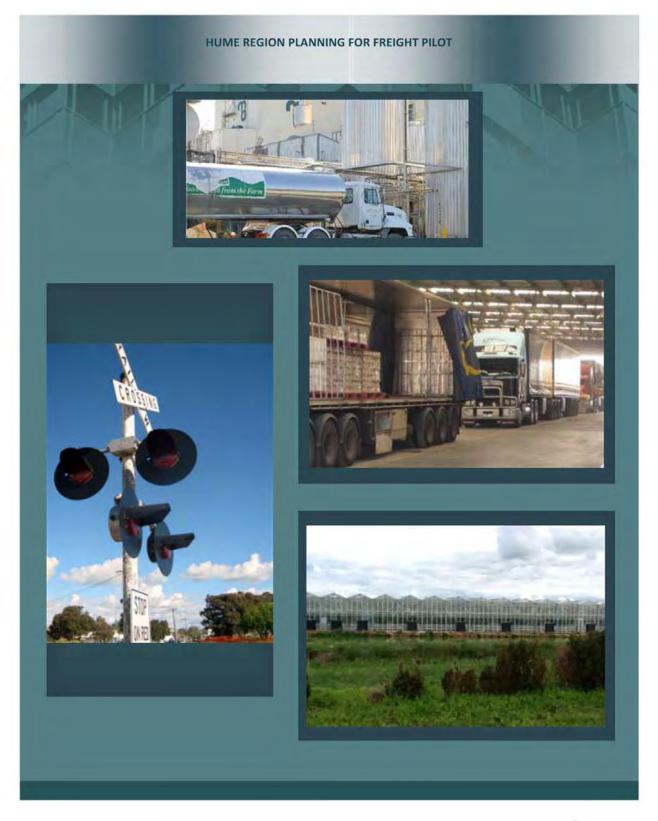
Issues raised included -

- A lack of business case models for infrastructure investment in rural areas where freight volume is low but where heavy vehicle access is critical to productivity
- 2. Multiple routes on a large scale road asset to manage, while investment is small scale, incremental and dispersed
- 3. Use of local roads as arterial alternatives/O-D routes without declaration/management by VicRoads
- 4. Heavy Vehicle access permits enforcement activity and the link to asset deterioration
- Vital need for supply chain productivity strategies for manufacturing, especially food
 Facilitation of nationally significant freight corridors and places in the region
- Revision of "B" class road strategy for higher productivity and mixed use safety
- 8. Lack of engagement with T&L industry
- 9. Scope to expand driver facilities at highway service centres
- 10. Freight deliveries to commercial precincts new design templates needed to retrofit access arrangements
- 11. Freight not an intrinsic part of planning or economic development process
- 12. Under-funding of timber roads prioritised through the TIRES process
- Consideration of a commodity routes model like TIRES for other commodity types e.g. Livestock, Dairy, Equine, Quarries and Water Extraction industries
- 14. Inclusion of freight requirements in the Local Government Infrastructure Design Manual
- 15. Regional cities planning an opportunity to integrate freight management strategies and design
- 16. As of right land uses that are increasing transport activity effective management solutions and strategic intent
- 17. Industry investment in strategic routes need for a model that works
- National Heavy Vehicle Regulator (NHVR) guidance and support for local government taking on Heavy Vehicle access decisions.

Page 12 of 73

¹ http://www.designmanual.com.au/

Page **13** of **73**



Page **14** of **73**

3 THE HUME STRATEGIC FREIGHT NETWORK

Road is the dominant transport mode for freight in the region, carrying 99 percent of the region's freight. Freight transiting the region has a higher mode share to rail and air; however, freight is largely a road-dependent activity in this region.

The freight network consists of -

3.1 The Road Network

A,B and C Roads

Roads classified A, B and C are managed by Vicroads. They tend to be the most used freight routes. "A" routes include Hume Freeway and the Goulburn Valley Freeway (Melbourne to Shepparton South once duplication completed). "B" routes include the Midland Hwy; Murray Valley Hwy; Melba Hwy; Great Alpine Rd; Maroondah Hwy; and Goulburn Valley Hwy – Eildon to Seymour. There are 73 "C" routes in the region (see list Appendix B)

Proposed and current major upgrades to the Vicroads network include -

Goulburn Valley Highway

- Shepparton Bypass
- Nagambie Bypass

Hume Freeway Improvements to enable B-triples on the Hume Freeway; Baddaginnie – installation of 7 km of wire rope barriers

Murray Valley Highway

Strathmerton Deviation; Bridge at Yarrawonga-Mulwala

Midland Highway

- Barjarg - Mansfield improvements

Whittlesea-Yea Rd

- Break O'Day

Katamatite-Nathalia Rd-Labuan Rd Intersection, Numerkah upgrade

Northern Highway

Wallan-Kilmore Bypass.

For each LGA, three maps have been prepared, indicating -

- Gazetted and Permit B-double routes
- Draft Strategic Freight Routes

Each council has identified roads that provide a strategic local linkage for freight movement. A number of these roads connect with adjoining LGAs for cross-regional movements, particularly commodities such as timber or grain. The majority articulate with the arterial network.

- Freight Impacted Roads

The pilot has identified roads in each LGA that are impacted by freight movements. Some of these roads are involved in first and last mile deliveries; others access freight places. Others are "rat runs" to achieve the shortest driving distance or time or to avoid town centres or traffic congestion. "A", "B" and "C" classified Vicroads roads are included, where industry or councils have identified these routes for freight.

It should be noted that these roads are not necessarily Vicroads or council preferred freight routes, or strategic routes. They represent the **reality of freight flows** in each LGA.

These maps, along with the regional strategic routes maps, are located in a separate document (Appendix C) for reference.

Page 15 of 73

3.2 Freight Places

Logic Hub

The Logic Hub was established by the City of Wodonga. It is a site of 580 hectares located at the junction of the Hume Freeway and the Murray valley Hwy. The site has capacity to develop a rail terminal if future demand justifies.

GV Link

A site of 331 hectares, 2 km south of Mooroopna at Toolamba has been proposed for development as an intermodal terminal by the Greater Shepparton City Council. This site has the capacity to develop a rail terminal and will be well-located for access to the planned Shepparton bypass.

Beveridge

The Victorian Government has identified a strategic freight hub at Beveridge located between the Hume freeway and the Melbourne-Sydney rail line. The site of 1,000 hectares is currently undergoing detailed design and planning work as part of the Growth areas Authority Northern Melbourne Growth Plan and the Department of Transport's freight planning.

Mooroopna Rail Terminal

This terminal which previously handled around 3,000 TEU per annum of export product no longer operates. This terminal is limited in space and facilities. The commerciality and responsiveness of rail could not compete with road without subsidy.

Mangalore

A site which incorporates Mangalore Airport is mooted for freight management. It has excellent access to the Goulburn Valley and Hume Freeways.

Ranalla

A 300 hectare site north of Benalla with frontage to the Oakland SG rail line and direct access to the Hume Freeway and is a potential future freight place suited to freight agglomeration and fatigue management services.

Wangaratta

The City of Wangaratta is investigating the suitability of two areas to serve as fatigue management/freight sites. One is located near the Bowser Exchange, the other located at the Wangaratta Aerodrome (subject to floodplain management).

3.3 Rest areas

Rest areas are classified as "major" when associated with driver facilities and amenities, "minor" when facilities are limited and as "truck stops" where they are basically a wayside rest/stopping area.

Major rest areas are generally in towns or service centres along "A" routes and offer refuelling, driver amenities such as showers, telephones, internet access, meals and parking for trucks. These should be sited every 100km. "Minor" rest areas may provide shade, toilets and water, flow through access separated from the roadspace and truck parking for fewer vehicles. They should be available at intervals of 50km.

Truck stops are generally not separated from the roadspace and may not be sealed. They are generally used by trucks to check loads and to take short breaks and these should be available every 30km. Assessment of the "A" and "B" roads rest areas in the region by VicRoads and RACV indicates improvement is needed on all routes.

There are 165 recorded rest areas in the region on the A and B roads. 35 of these have truck parking. No information was to hand on the C roads or local road network rest areas.

Page 16 of 73

http://www.logicwodonga.com.au/logic/site.htm

3.4 The Rail Network

The inter-capital Melbourne-Sydney standard gauge rail line intersects the Hume region, providing passenger and freight services. The ARTC has progressively upgraded the track and undertaken gauge conversion of the Seymour to Wodonga section of the broad gauge line. A branch line to Oaklands has also been converted to standard gauge.

A broad gauge line between Melbourne and Tocumwal and Melbourne and Deniliquin also crosses the region. The Melbourne-Deniliquin line has a branch line from Toolamba to Echuca. Freight using these lines have tended to be containerised export perishable goods such as grain, rice, dairy, meat and potatoes shipped to the Port of Melbourne via the Dynon railhead.

A recent review of rail freight opportunities has been conducted by the Hume Regional Development Australia (RDA) Committee.

3.5 Airports

Airfreight consignments direct to and from the region are few. Albury Airport provides a service for Wodonga. Airfreight is shipped by road to and from Melbourne or Sydney Airports for international flights with excellent access to Tullamarine and Avalon airports from the City's north.

There are 8 smaller airports in the Hume Region used for general aviation. Some provide charter passenger flights and may have capacity for urgent shipments. They are located at Benalla; Bright; Corryong; Mangalore; Porepunkah; Shepparton; Wangaratta; and Yarrawonga.

3.6 Key T&L Activity Nodes

Third party Logistics (3PL), grain storage and large transport firms

Shepparton East; Wangaratta; Yarrawonga; Numurkah; Bandiana (Defence); Barnawartha North, Dookie

Saleyards/Livestock

Wodonga; Shepparton; Yarrawonga; Yea; Euroa; Wangaratta; Peechelba

Large manufacturing with logistics facilities on-site

Tongala; Cobram; Strathmerton; Tangambalanga; Wangaratta; Wahgunyah; Benalla

Page 17 of 73

³ Hume RDA Committee, Hume Region Rail Passenger and Freight Review, August 2011 http://www.rdv.vic.gov.au/_data/assets/pdf_file/0007/90367/Hume-Region-Rail-Review-Final.pdf



Page 18 of 73

4 HUME REGION PLANNING FOR FREIGHT STRATEGIES

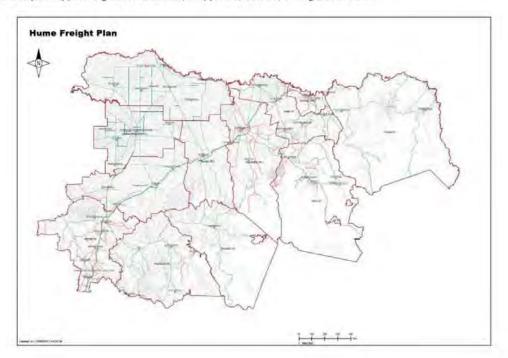
The strategic approach to freight management in the region is based on the following premise -

- in order to plan for freight, councils need to better understand where, when, why and how freight is moving
- given the lack of funding available, councils need to prioritise freight routes and attempt to limit the extent of local roads use by heavy vehicles, favouring State-managed roads
- once strategic routes are identified it is vital to understand, document and transmit to freight generators, the costs of maintaining these assets fit for purpose
- freight generators should be in a position to understand the costs and benefits of route upgrades
- councils in the region will subscribe to a Hume Freight Improvement Program, including a suite of projects, to advocate for funding
- councils in the region will work together to implement freight management solutions to deliver a consistent outcome

These strategies acknowledge the extensive role that topography plays in determining the movement of freight in the region. On the east of the Hume Freeway, freight movement is confined largely to short local routes off arterials that penetrate the alpine valleys.

The Murray River in the north of the region provides a strategic freight corridor east-west. It also concentrates cross-river/interstate freight movement to a limited number of points (Tocumwal, Yarrawonga, Corowa, Wodonga, Hume Dam, Jingellic, Tintaldra).

On the western side of the Hume Freeway, broad acre farming in the alluvial soils is more common on the fertile plains and in the irrigated river floodplain. The pattern of freight movement is more dispersed with multiple points being serviced by local transport suppliers e.g. Corowa, Benalla, Shepparton, Cobram, Bendigo, Melbourne.



Page 19 of 73

Four themes underpinned by strategies and priority initiatives are proposed to improve local government planning for freight in the Hume region. They are as follows -

4.1 Development of a Regional Freight Improvement Program

This strategy addresses the following issues -

- A lack of business case models for rural areas with multiple heavy vehicle access demands, a large road asset base to manage and few mechanisms to levy ratepayers or road users for additional infrastructure upgrades.
- Use of local roads as arterial alternatives
- Linking asset investment to supply chain productivity
- Facilitation of nationally significant freight places and corridors in the region

This Program includes -

- Identification and mapping of strategic freight pathways
- Identification of potential productivity improvements
- Preparation of a preliminary business case for the Freight Improvement Program
- Advocacy to industry peak bodies, Commonwealth and State funding programs

The suite of improvements includes the Vicroads-managed routes in the region, given the high dependence of some municipalities on these routes and the evident need for improvement. However, only a shortlist of local roads has been subject to a rapid appraisal.

4.2 Support for commodity routes and industry supply chain initiatives

This strategy addresses the following issues -

- Seasonal high demand movements coinciding with seasonal visitor usage of roads
- Harvest logistics requiring improved cooperation with growers to avoid road damage
- Productivity gains required to maintain industry competitiveness
- Victorian Government efforts to facilitate exports
- New industries creating demand on the regional transport network

This strategy enables the councils in the region to focus on the key generators of economic activity that produce and demand freight and the means to facilitate their operations. It should also frame initiatives that support Infrastructure Australia's theme of productivity and the Victorian Government's themes for the Victorian Freight and Logistics Plan.

4.3 Engagement with Industry

This strategy addresses the following issues -

- The need to better understand how supply chain and logistics decisions will impact the wider community and Council responsibilities
- Identification of ways to minimise amenity impacts without causing commercial loss
- Early planning for investment and avoidance of land use conflict
- Translation of new policies (e.g. regional city planning for Wodonga, Wangaratta and Shepparton) into plans for industry (e.g. future relocation; new road linkages)
- Poor communication between transport operators and Council officers

This strategy involves -

- a more consistent approach to industry consultation and information gathering.
- active management of freight movement to improve effectiveness of transport and logistics (T&L)and to minimise negative impacts such as noise, dust or conflict with sensitive land uses such as schools and hospitals
- engagement of industry in new planning initiatives that will impact their location and operations
- early warning of trends, changes and requirements from industry to provide council with more time to respond effectively
- improving the community's appreciation of the economic contribution of the transport and logistics sector to the local economy

Page 20 of 73

4.4 Active planning and regulation of freight activity

This strategy addresses the following issues -

- Land use conflicts with adjoining non-freight usages
- Informal parking of heavy vehicles
- Incremental increase in intensity of transport activities
- Amenity deficits created by transport and logistics activities
- Conflict over local road access for heavy vehicles
- Improved management of deliveries in commercial and industrial precincts
- Design of civic, commercial and industrial areas and assets to cater for freight deliveries
- A lack of quality, accessible, reference material to support planning approval processes that entail freight activities

This strategy involves -

- Development of templates to support planning and decision-making processes
- Review of the Infrastructure Design Manual
- Reference materials for planning for freight movement

Priority Initiatives

- Selected heavy vehicle local route upgrades to improve productivity and safety
- Gazettal, transfer or declaration of strategic local roads for higher mass limit access
- Commodity/Industry supply chain initiatives
- Facilitation of freight places to secure investment and sequence development
- Engagement with freight owners and suppliers in the region
- Active planning and regulation of freight activity

1. Selected heavy vehicle local route upgrades to improve productivity and safety

Great Alpine Rd line marking and shoulders	Alpine
Faithfull, Goodwin, Ackerly PBS upgrade	Benalla
Dobson Road - Timber extraction	Benalla
Davies Road - Timber extraction	Benalla
Baddaginnie Freeway interchange	Benalla
Winton Freeway interchange	Benalla
Benalla Tatong Road - Shoulder Sealing	Benalla
Benalla Yarrawonga Road - Shoulder Sealing	Benalla
Midland Highway - Benalla to Mansfield - Shoulder sealing	Benalla
Indigo Creek Rd-Beechworth Rd, Barnawartha	Indigo
Soldiers Rd, Barnawartha	Indigo
Up River Rd, Whagunyah	Indigo
Gooramadda Rd, Gooramadda	Indigo
Rutherglen truck bypass	Indigo
Kiewa-Bonegilla Rd, Tangambalanga - access to dairy factory	Indigo
North Shepparton Arterial (East-West) Link – between proposed Shepparton Bypass and Shepparton Alternative Route	Gr. Shepparton
Florence St/Midland Hwy Intersection, PBS upgrade	Gr. Shepparton
Old Dookie Rd - Shepparton Alternative Route to Lockwood Rd, PBS upgrade	Gr. Shepparton
Lockwood Rd/Midland Highway intersection upgrade, PBS upgrade	Gr. Shepparton
Orrvale Rd/Midland Hwy intersection upgrade, PBS upgrade	Gr. Shepparton
Lemnos North Rd - Cental Ave Link , PBS upgrade	Gr. Shepparton
Trailer exchange/driver changeover point near Doyles Rd	Gr. Shepparton
Shepparton Alternative Route (Vicroads), PBS upgrade	Gr. Shepparton
Bowey Road and Tallygaroopna West – Bunbartha Rd Link, PBS upgrade	Gr. Shepparton
Welsford St freight impacted road upgrade	Gr. Shepparton
Victoria Rd - Katandra Main Rd Link, PBS upgrade	Gr. Shepparton
Arcadia Road – between GV Hwy and Euroa-Shepparton Rd, PBS upgrade Merrigum-Ardmona Rd – between Byrneside-Kyabram and Tatura-Undera Rd, PBS	Gr. Shepparton
upgrade	Gr. Shepparton
Midland Hwy - East Goulburn Main Channel Bridge widening	Gr. Shepparton
Toolamba - Rushworth Rd between Murchison-Tatura Rd and Mooroopna- Murchison	
Rd, PBS upgrade Dhurringile Rd - Tatura between Toolamba-Rushworth Rd and Midland Hwy, PBS	Gr. Shepparton
upgrade	Gr. Shepparton
Ardmona Rd - between Midland Highway and Echuca Rd	Gr. Shepparton
Dead Horse Lane, Lakins Estate PBS upgrade	Mansfield
Broadford-Glenaroua Rd	Mitchell
Pyalong-Seymour Rd	Mitchell
Lancefield-Pyalong Rd	Mitchell
Highlands Rd	Mitchell
North Mountain Rd	Mitchell
Dry Creek Rd	Mitchell

Page 22 of 73

Darraweit Rd	Mitchell	
Emily-High-Oak, Seymour O-D route	Mitchell	
Hume and Hovell Rd, Seymour	Mitchell	
Old Sydney Rd	Mitchell	
Broadford-Flowerdale Rd	Mitchell	
Camerons Lane	Mitchell	
Benalla-Tocumwal Rd Katamatite-Benalla	Moira	
Bridge strengthening routes TBA through grain movement plan	Moira	
King Parrot Creek Rd	Murrindindi	
Ghin Ghin Rd, Yea bridge upgrade	Murrindindi	
Myers Creek Rd, Toolangi	Murrindindi	
Yarck bridge	Murrindindi	
Avenel Freeway interchange	Strathbogie	
Avenel Railway crossing roundabout	Strathbogie	
Nagambie-Locksley Rd, betwen GV Hwy and Avenel-Longwood Rd	Strathbogie	
Balmattum Rd, end of seal and Quarry Rd, Violet Town	Strathbogie	
Benambra-Corryong Rd connection to East Gippsland	Towong	
Shelly-Jingellic Rd	Towong	
Peechelba Rd-Jones Swamp Rd, Peechelba	Wangaratta	
Western Ring Rd Cruse St extension to Reith Rd and new bridge over 15 Mile Creek	Wangaratta	
Staged upgrade of Allans Ln - Markwood-Tarrawingee Rd to Snow Rd	Wangaratta	
Benalla-Whitfiled Rd from Boggy Creek Rd	Wangaratta	
Edi-Cheshunt Rd	Wangaratta	
Rose River Rd for timber	Wangaratta	
Bowser Exchange ramp alignment & trailer swap/rest area	Wangaratta	
HPV access to the LOGIC Industrial Estate	Wodonga	
Upgrade to the Murray Valley Highway to Whytes Road to ensure potential HPV access	Wodonga	
McKoy Street/Hume Freeway intersection upgrade	Wodonga	
Sangsters Road traffic management and improvements to Kelly St/Melbourne Rd		
intersection (lights or roundabout)	Wodonga	
Completion of upgrade to Mahers Road (mostly within Indigo Shire)	Wodonga	
Shoulder widening Wodonga-Yackandandah Rd	Wodonga	
Road and shoulder widening Murray Valley Hwy	Wodonga	
Intersection improvements to the Old Barnawartha Rd/MV Hwy	Wodonga	

Page 23 of 73

A package of freight improvements subject to rapid economic appraisal is

Faithfull, Goodwin, Ackerly PBS upgrade	Benalla
Up River Rd, Whagunyah	Indigo
Gooramadda Rd, Gooramadda	Indigo
	Greater
Old Dookie Rd - Shepparton Alternative Route to Lockwood Rd, PBS upgrade	Shepparton
	Greater
Lemnos North Rd - Cental Ave Link , PBS upgrade	Shepparton
	Greater
Welsford St freight impacted road upgrade	Shepparton
Dead Horse Lane, Lakins Estate PBS upgrade	Mansfield
Highlands Rd	Mitchell
Darraweit Rd	Mitchell
Emily-High-Oak, Seymour O-D route	Mitchell
Myers Creek Rd, Toolangi	Murrindindi
Avenel Railway crossing roundabout	Strathbogie
Nagambie-Locksley Rd, betwen GV Hwy and Avenel-Longwood Rd	Strathbogie
Western Ring Rd Cruse St extension to Reith Rd and new bridge over 15 Mile Creek	Wangaratta
Staged upgrade of Allans Ln - Markwood-Tarrawingee Rd to Snow Rd	Wangaratta

Page 24 of 73

2. Gazettal, declaration or transfer of strategic local roads for higher mass limit access

Assessment of key local freight routes for heavy vehicle access gazettal

Improved access for heavy vehicles is the first priority of freight owners in the region, followed by road safety. This strategy responds to this demand.

Councils across Victoria have recently advised Vicroads of their preferred B-double routes and these routes were gazetted and published in July2012. In 2013, these routes will be available as on-line maps including prohibited bridges. Further access to routes not currently gazetted is by permit, which from mid-2013 will be approved by each local authority and issued via the National Heavy Vehicle Regulator (NHVR).

In the light of this pilot that has included consideration of access for vehicles to routes rated Level 2A in the PBS Scheme, councils in the region may wish to revise their routes preferred for gazettal to be notified to the NHVR. Gazettal enables transport to avoid the costs and time lag associated with the permit process and the need for periodic reapplication. Gazettal will not only speed up the process of economic activity, it will deter carriers accessing routes for which they have no permit, often because they deem the process to be onerous. Gazettal will legitimise the use of the road space for economic activity and encourage heavy vehicle drivers to avoid other local roads with sensitive land uses and heavy passenger usage. Gazettal of strategic freight routes, particularly cross-LGA routes, can avoid industry needing to apply for multiple permits with adjoining councils.

A precursor for this action is assessment of these routes to establish if they are fit for purpose. The MAV has project managed the development of an on-line Route Assessment Tool for local government. This resource is available for each council to assemble data to support decision-making in relation to PBS-compliant vehicles applying to access local roads.

The aim of the Route Assessment Tool is to utilise data from assessment of assets. It identifies where a specific assessment may be required on a segment of road, a culvert or bridge. Much of this data can be assembled by council engineers through spot checks. If required, the cost of a network survey can be e. \$35 per kilometrefor unsealed and \$55 per kilometer for sealed road. Structural analysis of bridges or culverts can cost a minimum of \$3,000 per structure. As well as testing the integrity of the structure, engineers must then assess the structure for the impact of the vehicle. Local government has the ability to levy industry for any specific assessment associated with access determination. While this has not been common in Victoria, many in industry would agree that the productivity gains on offer may justify the cost of the consultant engineer.

Consultation with Vicroads and industry to transfer or declare select freight routes

The pilot has identified several local routes used by freight that are acting as arterial or single user industry routes. One option is transfer/swap or declaration of these routes. Examples are –

Benalla

- Midland Highway Benalla CBD truck deviation utilises local roads (Faithfull St, Goodwin St, Ackerly Ave) not designed for HML movement. This route crosses Lake Benalla/Broken River over the Stock Bridge which requires cement sheeting to strengthen this bridge.
- Roundabouts on this route and other local freight routes will require redesign to accommodate PBS rated vehicles
- Link Rd, between Yarrawonga Rd and the Thales site, for transfer to industry

⁴VicRoads B-double and higher mass limit trucks, reprinted November 2012
http://www.vicroads.vic.gov.au/NR/rdonlyres/EDC061A2-438E-419B-BB15-AE4633CB58F5/0/VRPIN00170May2004versionreprint1112 WEB_p117.pdf
http://www.vicroads.vic.gov.au/Home/Moreinfoandservices/HeavyVehicles/RouteInformation/BDoublesAndHigherMassLimitVehicles.htm

Page 25 of 73

Greater Shepparton

- Welsford/Fryers St link Midland Hwy to Goulburn Valley Highway
- Lemnos North Rd/Central Avenue link Midland Hwy to Katamatite- Shepparton Rd
- Archer St, Shepparton

Murrindindi

Miller St Yea is used by both passenger and freight as a short by-pass of Station St, which is the arterial. In some
respects, it would be sensible to exchange routes with VicRoads, as Council prefers usage of Miller St, keeping
heavy vehicles off the high street of Yea. Miller St has a roundabout with Station St.

Wangaratta

Western Ring Rd (Cruse St extension to Reith Rd and new bridge over 15 Mile Creek to relieve Phillipson St)

Indigo

- Up River Rd, Wahgunyah

Mitchel

- Seymour OD route Emily St, High St, Oak St
- Darraweit Rd Wallan to Romsey

2. Support for Commodity Routes and Industry supply chain initiatives

In the region there has been involvement in the Timber Towns group of councils, those impacted or host to the timber industry. A methodology was developed through this group to identify the transport needs associated with timber industry activity and to prioritise road upgrades required in the next decade based on industry intelligence. The priority routes for 2013-15 have been updated and are listed in Appendix D of this report.

The Timber Industry Roads Economic Study (TIRES) process involves the industry, local government and the timber industry in preparing the prioritisation. It helps to signal needs and provides much-needed intelligence for planning and public investment to facilitate this economic activity.

Another example of industry logistics requirements being identified is the Grains Logistics Taskforce, which has analysed logistics for grains being exported in bulk from Victorian grain growing areas. It is expected to undertake further assessment of domestic distribution of grains and containerised grain shipments.

Commodity Movement Plans

TIRES and the Grains Logistics taskforce are examples of a process which could equally be applied to livestock, dairy, wine, horticulture, equine, quarrying and mining. It is recommended that the Hume regional transport sub-group work with regional commodity players and industry peak bodies to progressively prepare commodity movement maps that identify impediments and infrastructure investment priorities for dairy, livestock, equine, wine and horticulture.

South Australia's Commodity Routes Scheme has enabled each council to identify and gazette routes relevant to specific commodities, connecting strategic routes and enabling consideration of funding on the basis of industry priorities on these known routes.

Page 26 of 73

⁵ http://www.transport.sa.gov.au/freight/road/vehicle configuration/b double commodity routemaps.asp

The LGAs on the west of the Hume Freeway have a much more permeable road network than those on the east. This brings fewer constraints on the routes that freight can flow. While this is a benefit to freight owners in terms of most direct route, it can represent a dilemma for councils coping with this extensive local network. In the Shire of Moira this is certainly a significant asset which is expensive to maintain as safe, fit for purpose roadspace. Adding to the challenge, large agricultural holdings seek access for heavy vehicles to multiple harvest sites, often via dry weather roads. When a crop has to be harvested trucks must be available to load, regardless of the rainfall on the road and the condition of the pavement.

Transport operators facing this demand will access the harvest sites regardless of permits. Enforcement on the local road network is minimal. The cost of rehabilitation of these roads is getting beyond the financial capacity of the councils to sustain. Grain growers have been concentrating on profitability through higher payloads per truck and generating higher demand on roadspace through both on-farm storage (meaning grain is moved year round) and larger and heavier equipment. These productivity gains are disconnected from the impact on the asset, as rural rates have not kept pace with the asset maintenance costs. Growers are not appraised of these costs and transport suppliers feel they pay towards these assets through registration fees, fuel and general taxation.

The strategic approach to managing this situation until an improved road funding model is derived by COAG is as follows -

"Share the Wear" Model

- Work with growers to agree the strategic harvest routes for heavy vehicles. This may mean restricting grain storage to specific roads or investing in grain bunker sites for short term storage on dry weather or damaged roads.
- Work with the enforcement agencies (NHVR, VicPolice and Vicroads Authorised Officers) to increase enforcement activity during harvest periods on the local road network. This should help prevent damage and induce improved driver behaviour.
- Work with growers to prioritise improvements to the network based on a productivity assessment. Include facilities such as rest areas and weighbridges.
- Consider whether a commodity tonnage contribution hypothecated to these priorities is worth adopting with growers.

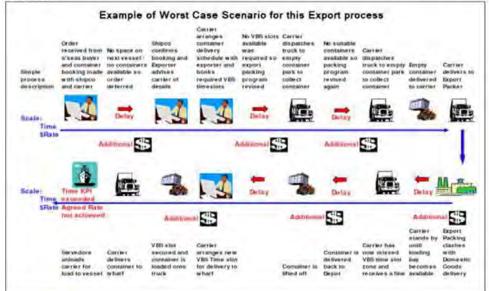
Food Industry Supply Chain Initiative

The "foodbowl" councils of Shepparton, Moira and others in the Loddon Region, combined with Strathbogie Shire are a grouping that could benefit from analysis of supply chain improvements. The competitiveness of this industry is crucial to the economic wellbeing of Victoria and supply chain efficiencies are one means to capture savings and deliver productivity gains. It is often difficult for any one player, even the manufacturer, to take a whole-of-supply-chain perspective.

Programs such as the Department of Business and Innovation's Manufacturing Productivity Networks could assist in undertaking an assessment of supply chain impediments with the food manufacturers and working through solutions to improve supply chain performance and productivity.

Page 27 of 73

The following diagram shows the range of impediments that create supply chain cost for exporters of containerised product. This indicates the scope of improvement and the whole-of-chain nature of the analysis involving many businesses.



Source: www.supplychainbahs.com.au

4. Facilitation of freight places to secure investment and sequence development

Economic Development Managers have a role in facilitation of freight, given its vital role in supporting and growing local businesses.

The fundamental task for the Economic Development Manager in relation to freight is to understand the supply chain issues of local businesses. Businesses compete on their supply chain capability and many are increasingly dependent on global supply chains and e-commerce. Longer supply chains increase complexity and the criticality of their performance to the business. Delays caused by goods shipment interruption, potential to shorten supply chains through local supply, and improvements in supply chain arrangements, especially for SMEs, should all be considerations of the local economic development team.

Economic development staff also become involved in facilitation of investment and become a focus for development processes. Two councils in the region have committed resources to facilitate strategic freight hubs. Mitchell Shire has an interest in the strategic plans for the Beveridge Freight Logistics Hub proposed by the State Government in the Northern Growth Plan. Understanding the freight flows and future logistics trends in the region is the underpinning of this involvement.

The issue for local facilitators is the need for support at the regional, State and National level for this task, in order to secure private investment. The Victorian Government has funded the Mode Shift Incentive Scheme; however the Hume region's freight hubs are excluded. The recent announcement of the closure of the Mooroopna rail terminal highlights the need for recognition of the region's strategic hubs and for support to the councils (Shepparton and Wodonga) to facilitate their role in national freight flows.

Page 28 of 73

⁶ http://www.transport.sa.gov.au/freight/road/vehicle configuration/b double commodity routemaps.asp

The Logic, GV Link and Beveridge freight logistics hubs require national status in the National Freight Strategy to be endorsed by COAG. Facilitation tasks are significant for host councils and recognition and funding are needed.

Facilitation tasks include -

- Staging of development. Given most freight hubs take a minimum of one decade to develop, logical staging is
 another task involving the Economic Development team. While progressive development of a site may work
 in a land use planning sense, it is essential that the economic and commercial sustainability of the site is
 planned for. This involves establishing the logical sequencing of development based on the requirements of
 the businesses for support services and co-located businesses.
- preparation of investment attraction materials. This material goes well beyond glossy flyers indicating the site location; it should include
 - cycle times to national gateways and key domestic markets; facilities available hard stand, storage, transport interface, security, access;
 - labour force statistics in the catchment;
 - information on housing, tertiary education/health facilities and institutions, and quality housing stock
 - transport and logistics services available;
 - accessible forwarder and broker businesses ,
 - available local expertise e.g. planners, engineers, project managers;
 - annual costs such as floorspace lease or site rental, rates and energy costs compared to other sites;
 - data on the efficiencies of rail:road combinations versus road-only where a rail terminal is available at the hub;
 - freight volume assessment and forecasts.
- Following through on development issues with regulators at local, regional or State level. These issues might include
 - Demonstrated strategic commitment to the freight task and future proofing
 - Site trunk infrastructure
 - Transport infrastructure upgrades and site access
 - Compliance with EPA requirements;
 - Buffering of the site from adjoining land;
 - Provision and staging of internal access;
 - HPV access via local roads;
 - Treatment of visual amenity;
 - Waste management
 - Energy supply and cogeneration
 - Fire and emergency provisions
 - National Transport Reform regulation
 - Customs & Border Protection, Biosecurity Australia and Transport Security requirements

Covering as many of these issues with regulators prior to investors becoming involved will save valuable time during the development approvals stage.

- Marketing the potential to developers. As councils in the region have found, the long term planning processes familiar to governments are not shared as consistently by the developer community. Supply chain and freight investors include property developers, companies who produce or own freight and suppliers such as warehousing and storage (3PLs); transport; value-added services; terminal operators such as container parks; and a range of value-added logistics (VAL) services such as forklift hire and repair; truck servicing; fumigation; product packing and labelling; and container packing and de-stuffing. The imperatives and requirements of these businesses will need to be understood, as well as the levels of risk that each type of business can sustain. As a number of these services may be outsourced by freight owners, commitment to a long term lease or relocation can be a high risk, dependent on short term contracts and industry restructure through merger and acquisition in global businesses.

Page 29 of 73

- Seeking funding for the development. Most Economic Development Managers are familiar with the policy frameworks underpinning regional economic development and the range of programs available to assist businesses. Building relationships with other levels of government and working through the most appropriate funding sources for freight places is a task which can be supported by other levels of government, particularly the regional team. Having a strategic intent embedded in council plans/strategic statements is also beneficial in securing future funding.
- Keeping informed of logistics trends locally and internationally. Economic Development officers need to be
 aware of trends in logistics both in Australia and internationally that can impact the development. This
 involves establishing "stovepipes" of input to regional staff often lacking access to institutions advancing
 research or industry conferences due to distance, cost and work pressures.

5 Engagement with freight owners and suppliers in the region

Contact with freight owners and their logistics and transport suppliers in relation to supply chain issues in the region tends to be sporadic and usually based on regulatory processes, such as permit approvals. It is difficult for councils to balance their role as regulator of land use and heavy vehicle access with their role as local economic development facilitator. It will be increasingly difficult under the new arrangements with national heavy vehicle regulation.

Officers engaged in regulation may feel at risk of coercion or being coopted by investors and operators, especially in small rural shires where both live and work. Representatives of council who are not involved in the regulatory task should participate in consultations with industry. It is also useful to have industry peak bodies involved in consultation.

One transport operator commented that the councils prefer to ignore this industry sector, hoping that freight movement is "invisible". Others expressed frustration with council processes and the length of time taken to make decisions. This is disappointing as T&L activity accounts for around 9 percent of GSP.

There seems to be a more positive interaction with freight owners as ratepayers, investors and major employers in each LGA. However, the issues around supply chain are poorly understood by council officers, even in the most freight-affected LGAs.

How can engagement with owners and suppliers be effective and meaningful for both?

Firstly, it should be on the basis of mutual understanding, not focused on asymmetrical information or power. Councils do not generally share data on the costs of maintaining or expanding freight access. Companies do not generally share data on the value or volume of freight.

One method to commence the process of engagement is for the Council to undertake a survey of freight carriers and generators, conducted in a confidential manner, so as to begin with some basic information on freight. Survey formats used in this pilot are in Appendix D.

Another method is to schedule regular visits to T&L companies and freight owners in the LGA to discuss supply chain issues and gather information on supply chains.

An annual or six-monthly meeting with councillors, senior staff and local businesses would provide an opportunity for information to be exchanged. Having undertaken this pilot, councils have a ready-made opportunity to discuss proposed strategic freight routes and changes to access permits under the NHVR.

Page 30 of 73

A number of councils in the region were concerned to manage expectations of local industry for infrastructure upgrades based on their freight movement. Dissemination of information to industry on the estimated costs of maintaining and expanding the network is an important part of managing those expectations and conducting meaningful engagement.

Productivity and road safety are shared goals of industry and local government. These should be the basis of interactions. A number of strategies contained in this document relate to these matters and it is recommended that councils canvass these with their local freight generators and T&L suppliers.

It is also recommended that the Hume Transport sub-group consider an **economic assessment of the contribution that supply chain and T&L activities make to the regional economy**, so that ratepayers have a better appreciation of the role of this industry. It is a surprisingly large part of the economy and being a derived demand it is often overlooked in economic profiles.

Councils planning changes to commercial precincts (e.g. Wodonga) can benefit from the early involvement of T&L suppliers in the design of access, parking, loading areas and locations that in future will become e-commerce delivery sites, such as post offices, railway stations, bus depots, service stations and major retailers.

Encouragement of business to commence early discussion on expansion, investment and changes to logistics arrangements will improve council responsiveness. This can be achieved by determining the most suitable communication strategies for council's capabilities. It might include business networks, websites, email contact, regular fora with local businesses. Committing the time and staff to build a working relationship through face-to-face contact has proven most effective.

A Freight in our Community event can begin the process of engagement and begin to build communication between community leaders, supply chain managers and T&L businesses in the region. It is useful for school principals, chambers of commerce, emergency services, local community groups etc to gain an understanding of how freight benefits and impacts the community and how trucking companies are investing in safety, technology and training. These events are very "hands on" enabling participants to inspect equipment and talk to suppliers directly. They can include opportunities to tour local freight places, transport depots and to test drive on a truck simulator.

6 Active planning and regulation of freight activity

Completing the Planning for Freight process (see separate Planning for Freight Guide for Local Government) enables a council to determine its local freight plan and contribute to a regional freight strategy. These documents, combined with the soon to be completed Victorian Freight and Logistics Plan, can form a set of reference documents, with the state and regional level documents being incorporated in the Victorian Planning Provisions.

In this way improved guidance will be available for investors and planners. These documents add to the Regional Growth Plans and other reference documents available prior to permit applications being brought before councils.

Active Freight Management Strategies for the Hume region councils

Improvement of heavy vehicle access

Fundamental to the ability to fund infrastructure improvements for economic journeys by local industries, is the ability to prioritise improvements and prepare a robust business case that is not only supported by data but demonstrates public and private value. The *Planning for Freight Guide for Local Government* covers the elements that contribute to public and private value and how to collate and construct a business case covering both.

In addition to the funding submissions each council prepares to Commonwealth and State governments, a case for industry contributions or co-funding can be mounted if sufficient private value can be derived from an improvement program.

Page 31 of 73

Having a regional freight improvement program also covers improvements to routes of regional strategic use. For these strategic routes a special rating scheme levied by adjoining councils is a prospect for higher mass limit access.

Other options for active management might include -

- Permit conditions related to safety and impact on infrastructure
- Rationing the use of vulnerable infrastructure by limiting periods of usage, vehicle numbers, type or speeds (this is likely to rely on technology to monitor compliance)
- Facilitating relocation of freight activity to sites adjoining preferred routes. This is particularly relevant where raw land value is not high.
- Development of a commodity movement plan for a specific industry in the region (e.g. dairy) where agreed
 upgrades can be offset by investment in private infrastructure to coordinate with council commitment. This can
 also include industry investment in compliance monitoring (e.g. Intelligent Access Program)
- Returning routes to gravel or limiting access of heavy vehicles to deter rat-running on local routes with substandard infrastructure and encourage strategic access routes or main road usage where viable.
- Issuing truck route maps in hard copy and on-line versions from the council website. Links can be placed on peak
 T&L industry websites. This is important for new drivers and can limit use of non-gazetted routes. These maps can
 show PBS and B-double access routes, access routes to delivery zones in commercial districts, driver facilities
 including truck stops, refuelling sites and truck and trailer parking spaces.
- Advocating high quality access to freight places in the LGA (intermodal hubs, airports, trailer exchanges).
- Councils may consider applying length limits where freight vehicles impact amenity in commercial centres.
- A Guide to inform how these routes should be objectively assessed to set the appropriate limit is needed. The Guide needs to be able to balance economic and amenity consequences.

Councils in the region seem loath to involve industry in contributing towards infrastructure upgrades. At various times tonnage levies were associated with extractive and timber industries, however there does not appear to be recorded receipts to councils from these schemes.

The basis of the business case model is to balance both public and private benefit and costs. Where a measurable productivity gain can be grasped councils should consider co-funding or private funding to accelerate infrastructure upgrades. For example, a cluster of equine industry and a wind farm are limited by a causeway access vulnerable to frequent flooding and unsafe for HML access. Using the business case model, industry perceives a benefit which will return the investment in five years. With little prospect of public funding available, accessing these productivity gains is at the risk of the private investors. A decision can then be made with the council.

· Council's own freight generators

A number of councils in the region have waste management and recycling sites and fleets, quarries and depots. It is important that each council considers the siting, routing and access needs of these freight-generating activities as part of planning for and active management of freight. For example, are council's own vehicles creating amenity problems for neighbouring landholders through dust, noise and passing through sensitive community areas such as schools, shopping centres and tourist precincts? Can these aspects of council's performance be improved?

· Improving local freight deliveries

Issuing preferred access route maps to industrial and commercial precincts can both assist drivers doing deliveries and avoid road space conflicts, localised congestion and risk of accidents as well as limiting wear on local roads.

Page 32 of 73

Evaluation of local loading areas in commercial and industrial precincts will also present the opportunity to discuss with businesses and T&L companies how these can be improved. Large investment is often not required to improve the operational environment to make deliveries more efficient and safer. Reconfiguration of spaces or access arrangements and changing driver behaviour can be effective.

Retrofitting of delivery areas originally built to cater for smaller or non-motorised vehicles, as is the case in many historic and older towns in the region, has been achieved with innovative solutions in other jurisdictions. Lessons from these areas may be adapted in the region.

In relation to commercial precincts and in particular supermarkets and large retail complexes, guidance to developers in relation to loading facilities and parking for delivery vehicles would be a useful resource for council planners. A recommendation from this region would be to request the Department of Planning and Community Development work closely with the development industry to create a guidance note which could be included in State Planning Provisions, on this subject. Councils in the region have found it difficult to influence developers to consider larger vehicle deliveries, despite retail logistics trends, and this guidance would support local approval processes.

Defining access points, directional traffic flow to limit reversing vehicles, setbacks to facilitate the swept path of larger vehicles or road widening, protection of visual and acoustic amenity of adjoining residential areas are part of the development approval process which should incorporate the reality of afterhours deliveries, full pallet displays and retail outlets becoming effectively "depots" for e-commerce operations.

Signage

Councils in the region may consider improvements to signage for freight deliveries. The addition of street numbering on corner signposts can avoid drivers circling an area and creating delays to deliveries. This is a very practical visual cue which can be implemented progressively in urban centres and industrial precincts.

Vegetation

Maintenance of height clearances along freight routes is another practical active management strategy to assist local deliveries. This is also a road safety measure near intersections.

· Truck parking bays

Few councils in the region considered it necessary or desirable to provide longer parking bays to accommodate trucks in commercial districts. Some councils do provide these bays or roadside areas in industrial precincts to assist drivers, however it is problematic for a driver to access a post office or bank in centres across the region. Councils noted that they would discourage trucks from coming in to the commercial areas. Truck drivers often work restricted hours, limiting access to business services. Most commercial precincts have provision for spaces to cater for caravans, cars with trailers and coaches. Limited short term parking for trucks would be a worthwhile addition to enable walking distance access to business services.

Informal parking of trucks

Trucks waiting to access a freight place or regular overnight parking in residential areas can represent a loss of amenity to ratepayers and a frustration to neighbours. Some areas, such as Wallan, Chiltern, Yarrawonga and Numurkah suffer from informal truck parking. Trucks larger than 4.5 tonnes or longer than 7.5m are not permitted to park in urban streets beyond one hour without permit.

(7) The rules relating to heavy vehicles parking in urban streets are contained in a notice published in the Victoria Government Gazette, Periodical No. P. Z. st. 28. October 1999 (Road Rules - Victoria).

Clause 200 (2) and (3) states that

18 The dirver of a heavy vehicle, or long vehicle, must not stop on a length of road or a built-up area for longer than one hour, unless the driver is permitted to stop on the length of road for longer than one hour by information on or with a traffic control device, or is permitted to do so by the council.
(9) DEAVY VEHICLE—means, a vehicle with a GVM of 4.5 tonnes or more:

LONG VEHICLE - means, a vehicle that, together with any load projection, is 7.5 metres long, or longer, ROAD - does not include a road related area, but includes any shoulder of the road.

Page 33 of 73

There will generally be a logical explanation for informal truck parking in the LGA. It may relate to fatigue management, receival windows at local sawmills, grain receival sites, factories or supermarkets, or it may be a place where drivers check their loads before entering a major arterial, or depart the main road for a remote task where stopping or turning is difficult. Communication with T&L drivers will answer these questions and provide guidance as to what is required.

There are some measures that councils in the region can take to improve the situation. Firstly, a balance must be struck between the limitations of infrastructure available and the costs to owner-drivers and local small cartage operators. Many operate on very low margins and cannot afford the cost of operating their own depot. A prime mover costs an average of \$250,000 to place on the road and trailers can cost one third of that cost again. The transport operator has this valuable equipment, as well as thousands of dollars of freight on board, so it is not surprising that informal overnight parking occurs.

The broader cost however can be damage to curb and channelling, house drainage services and underground cables, as well as coopting of public open spaces, obstructing footpaths and pedestrian access, night time noise of refrigerated equipment operating and visual intrusion in the neighbourhood. Parents worry for the safety of their children with heavy equipment about.

Typically the response from councils is use of signage and the enforcement of local laws. Consistency in enforcement across the region will assist in gaining the cooperation of drivers.

Management of this activity may include -

- Standardising the Application to Keep a Heavy Vehicle on Private Land used by councils in the Region. A review of the format, including design requirements and lodgement fee could be undertaken by the Hume Transport Subcommittee.
- Negotiation with service centre owners and franchisees to establish a secure parking area for overnight breaks for local drivers adjoining an area for linehaul operators to take rest breaks or to break up trailing equipment. The cost of establishing such sites would need to be tested for feasibility and this could be a regional project, given the importance of the arterial network in this region. A low rental could cover hard stand, fencing and surveillance, cleaning and maintenance. The area could be secured by remote access controls, avoiding staffing.
- In areas unable to take advantage of these arterial sites, an overnight truck parking area in the industrial precinct of town or adjoining the council works depot may be an option to explore with T&L operators. Given the value of the equipment, drivers are unlikely to agree to park their equipment in a vulnerable location. A small annual user fee would be a reasonable levy for such a service, with a low start-up cost.
- The use of marshalling areas associated with livestock saleyards or major industry for truck parking may be
 another option to explore with local industry. Those with capacity to deal with heavy vehicles are likely to be well
 equipped to facilitate this service if costs are covered.
- A lack of truck marshalling at freight generation sites should be the subject of negotiation with the industry involved. Truck queuing in residential areas may be a seasonal occurrence which is accepted by the local people e.g. during grain harvest time. However an ongoing issue requires not only enforcement activity but a collaborative solution. Marshalling off-site may be a solution, using radio or text messages to call up trucks at ten minute intervals. This means drivers can take a break and are not constantly in their vehicles moving up in a queue. Facilities may be provided on a seasonal or permanent basis, such as toilets and water taps, funded by the company generating the freight.

Councils need to assess the general amenity issue of compatibility of certain roads with heavy vehicles due to risk to public safety. The section of the Local Government Planning for Freight Guide on Amenity Assessment is relevant.

Page 34 of 73

Rest Areas

This is the United Nations Decade for Action for Road Safety (2011-2020) and an appropriate time to prepare and implement rest area strategies on the A, B, C and local roads in the region (see AustRoads APR417-12 and APR354-10 for guidance).

There is a need for rest areas associated with livestock saleyards with drivers commonly travelling considerable distances to the sale and needing to break and rest before livestock deliveries continue post-sale or drivers return to depot. Key saleyard sites are in Wodonga, Wangaratta, Shepparton, Yea, Euroa and Yarrawonga.

The RACV assesses rest areas on a three year rolling program. This is aimed at supporting road safety. There are 35 rest areas on the A and B road network in the region with truck parking available. They range from full service centres to roadside laybys and they represent one third of the rest areas on this part of the road network in the region. The RACV assessment provides detail relevant to travelling passengers and could be adapted to provide further detail of facilities relevant to carriers available at each stop.

Chain of Responsibility and Fatigue Management regulation as part of National Heavy Vehicle Reform generate a greater need for trip planning and increased demand for truck-friendly rest areas with facilities provided.

It is recommended that the Hume Region Transport Sub Group work with the RACV, Vicroads, councils and the T&L suppliers to develop a program of improvements to rest areas, not only on the A roads (Hume Freeway and duplicated Goulburn Valley Freeway), but also on the B, C and local roads in the region.

Retrofitting the Infrastructure Design Manual for freight

Having evolved from the Hume region, it is fitting for the Infrastructure Design Manual to be reviewed to retrofit specific design elements to facilitate freight activity. These should include –

- Design requirements for higher productivity vehicles (HPV) based on performance criteria for PBS vehicles.
 The PBS Route Assessment Guidelines developed for the Route Assessment Tool by MAV will assist in this task.
- Specific design for strategic freight routes (shoulders, overtaking)
- Roundabout design and articulated vehicle access
- Site access design for local deliveries and retrofitting existing access to loading areas
- Cross docking and trailer exchange areas (in preparation for B-triple operation on the Hume)
- Industrial marshalling areas
- Keep a heavy vehicle on private land design requirements
- Parking bays in commercial precincts to cater for short term truck parking
- Overnight parking facilities at service centres
- Signage of preferred freight routes and delivery routing in commercial precincts
- Rest areas

Improving land use planning processes

Land use planning is by its nature a strongly visual process. The most important contribution towards improving planning for freight in the region is the mapping of freight generators and strategic freight routes on council GIS platforms. This visual information, supplemented with data on supporting transport activity is a key means for planners to quickly overlay existing planning data with freight information, in order to determine whether a strategic or statutory process needs to take special note of freight issues.

There are a number of planning actions that can improve outcomes for freight efficiency and provide protection from amenity deficits caused by logistics and transport operations on a given site.

9https://www.un.org/en/roadsafety/

Page 35 of 73

Having identified the regional strategic freight network, comparing proximity to freight generation sites can quickly indicate the degree of correlation between investment in land use and investment in access infrastructure. Most of the LGAs in the region have a strong correlation but those with a legacy of heritage townships (e.g. Beechworth, Yackandandah, Rutherglen, Chiltern) or growth of transport activity within a permitted zoning (e.g. Shepparton, Wodonga, Avenel), planners are confronted by the need to revise strategic planning to better align high capacity routes with land use. Given the slow pace of change in land use, councils often opt to supply infrastructure as an interim measure.

The opportunity exists for the cities of Wodonga, Wangaratta and Greater Shepparton to re-think the long term planning of freight generating areas and their strategic access routes. It is recommended that planning for freight activity be included in this process. This may involve longer term relocation of activities and interim access improvements until that can occur. It is recommended that these cities undertake an Industry Capability Study with a focus on freight planning.

A key task for planners is to consider the long term prospects for freight transport servicing existing industrial, commercial and community precincts such as TAFEs and hospitals. Movement of goods is transforming into high capacity, larger shipments and concurrently, more frequent, smaller shipments direct to end users. The ability to accommodate both the articulated vehicle and manage a proliferation of van deliveries is a challenge for planners.

Planners in the region need access to high quality guidance material for industrial and commercial developers in the region. This is an important issue for the regional management forum to discuss and determine whether State or regional leadership is required to develop this material. Site access controls, on-site truck marshalling, turning and parking of heavy vehicles, loading facilities, noise control, visual screening, hours of operation are all part of the consideration under planning permit approvals process relating to freight. Consistency in approach within the region is desirable, so this is unlikely to be an individual council task. This may be a project scoped in a similar way to the Infrastructure Design Manual or a DVD/on-line resource which is prepared and distributed by the development industry peak body.

Calibration of freight generation from a variety of land uses in the region will assist planners and infrastructure managers to determine options for adapting the land use or the infrastructure in the LGA. For example, a decline in population in a farming area does not necessarily translate to a drop in freight activity. In fact, the opposite is the case, where larger holdings and machinery place higher demand on the transport network. New estates generate not only household trips correlating to household type, but freight during construction and waste removal.

Reservation and protection of freight places is an activity that some councils in the region are more advanced in planning. Council strategic planners should utilise the Regional Growth Plan and council MSS processes to consider the planning of preferred freight routes, intermodal hubs, cross-docking and trailer exchange sites, rest areas and truck parking sites and truck marshalling in industrial areas. Buffering of existing sites to protect adjoining land use from noise, dust, run-off, wash bay and weighbridge facilities and light spillage are generally already a part of planning approval processes, but planners will need to consider some of these new and emerging activities and how they are planned and buffered.

Consideration of the **design of commercial and residential areas** to minimise the impact of freight is another action planners might consider in the region. Examples of poor design already prevalent in the region are –

- heavy vehicles reversing in laneways and roads to parking bays at night and early morning;
- freight being loaded by forklift in the street;
- planning the main access to a new release through an industrial estate; and
- trailer exchanges in ad hoc/inadequate locations.

Where planning regulation cannot resolve the existing issues, design may be able to ameliorate them. Review of the Infrastructure Design Manual may cover design elements for transport flow, parking, cross-docking or retrofitting larger or heavier vehicle access. Others that relate to planning regulation or visual amenity are not presently catered for in the Activity Centre Design Guidelines 2007 or the Interim Guideline for Large Format Retail Premises. Specific guidance could be developed by the Department of Planning and Community Development in conjunction with commercial developers and transport suppliers.

Page 36 of 73

Relevant design principles are -

- keep pedestrians and trucks separate, on non-intersecting paths
- · ensure clear sightlines for all drivers and pedestrians.

Strategies for design might include -

- Provide commercial lots with service access lanes or service courts. Providing service lanes and service courts in commercial premises ensures pedestrians are safely separated from vehicles.
- Locate lots for large format uses that generate high vehicle traffic volumes and large vehicle deliveries on wider streets at the edge of activities areas, and with easy access to major roads
- Arrange vehicle crossovers to allow clear sightlines between drivers entering the crossover and pedestrians and cyclists on the path In pedestrian traffic areas, include splays to driveway exits from laneways, buildings and car parking facilities to maintain sightlines from vehicles.
- o Minimise the number of vehicle crossovers that intersect pedestrian and bicycle paths
- Locate essential vehicle crossovers on straight street sections in areas of high visibility to approaching pedestrians and cyclists
- Consolidate vehicle crossovers.

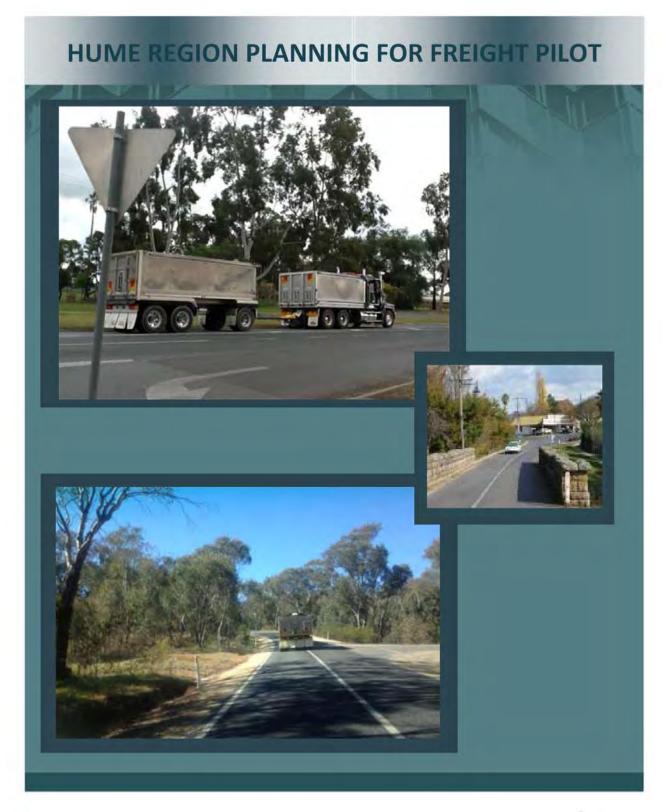
The other option for local councils is local laws dealing with freight delivery issues such as freight vehicles intruding on footpaths because loading bays are too short or non-existent.

Page 37 of 73

http://www.dpcd.vic.gov.au/ data/assets/pdf file/0006/33927/Activity Centre Design Guidelines.pdf http://www.dpcd.vic.gov.au/planning/urbandesign/guidelines/interim-design-guidelines-for-large-format-retail-premises

 $^{^{11}}$ Vicroads Supplement to the Austroads Guide to Road Design Part 6A - Pedestrian and Cyclist Paths Figure V5.1

Page 38 of 73



Page **39** of **73**

5 GOVERNANCE AND LEADERSHIP

5.1 A collaborative regional approach

A number of actions recommended in this report are proposed for implementation as a regional grouping of councils with the support of State and National agencies and industry peak bodies. This will therefore create a need for coordination across individual councils.

A grouping already exists in the Hume region, facilitated by the regional team and serviced by the regional team member of the Victorian Department of Transport.

This group's purpose is the facilitation of regional transport strategies under the auspices of the Regional Management Forum, as part of revision of the Hume Regional Strategy.

Participation includes representatives from each council, Vicroads NE Region, Regional Development Australia, Regional Development Victoria and the Department of Transport.

The benefit of this Group taking the Hume Planning for Freight coordination role is that duplication of activities is avoided.

The current limitation of the Group vis-a-vis Planning for Freight is the broader scope of this program, including: economic development; urban design; land use regulation; and local law enforcement. The Group is also responsible for strategic directions in public and community transport in the Region and may be concerned at the potential for a "takeover" of freight focus.

The Group, having a focus on major regional projects, has had limited engagement from smaller councils. Freight issues are live for these councils, but due to limited staff numbers and a wide portfolio of issues being covered by any one officer, they struggle to dedicate time and resources to participate.

These factors will need to be considered in determining the most appropriate governance structure.

5.2 Incorporation into Council Plans

Each council will need to follow its process to endorse the Hume Planning for Freight Program. This is an appropriate time for each council to determine its commitment during preparations for the ensuing four years in the Council Plan.

5.3 Hume Region Planning for Freight Champions

There is no doubt that Planning for Freight requires a champions group in the region and that individual champions need to emerge to promote the value of industry engagement and leadership. There are several senior T&L sector figures in the region and they, along with key supply chain managers, could be approached to lend their support to this program in the region.

5.4 Reviewing progress in the implementation phase

The important function of reviewing and reporting progress over the four year period is likely to fall to the regional grouping of councils. As some of the actions concern Vicroads and other State Government agencies, it is appropriate for the Regional Management Forum to determine the best means to achieve this.

As this program is developed to articulate with the regional strategies, it may be suited to be a module of the regional reporting. Another option is for the MAV to provide a review and reporting mechanism as part of its Planning for Freight Program at a State-wide level.

Page 40 of 73

GLOSSARY

3PL	Third Party Logistics supplier - outsourced supply chain and logistics management
	e.g. warehousing, procurement planning
670	
AAA	Australian Airports Association <u>www.airports.asn.au</u>
ARA	Australasian Railway Association <u>www.ara.net.au</u>
ASA	Australian Shipowners Association www.asa.com.au
ATA	Australian Trucking Association <u>www.atatruck.net.au</u>
COAG	Council of Australian Governments www.coag.gov.au
CNG	Compressed Natural Gas
EPA	Environment Protection Authority www.epa.vic.gov.au
FEU	40 ft equivalent unit – a shipping container equivalent to 2 standard containers
GIS	Geographic Information System
GVM	Gross Vehicle Mass – the maximum weight a truck can carry, including its own weight
GVIVI	Gross vericle wass – the maximum weight a track can carry, including its own weight
HML	Higher Mass Limit
HPV/HPF	Higher Productivity Vehicle/Higher Productivity Freight Vehicle
	http://www.talc.com.au/Portals/58/HPV%20case%20studies/090119%20Higher%20Productivity%20Vehicle%20Industry%20Case%20Studies.pdf
IAP	Intelligent Access Program www.tca.gov.au/regulatory-telematics/iap
LGA	Local Government Area http://www.dpcd.vic.gov.au/localgovernment/find-your-local-council
LTAV	Livestock Transporters Association of Victoria www.ltav.com.au
NHVR	National Heavy Vehicle Regulator www.nhvr.gov.au
PBS	Performance Based Standard for heavy vehicles www.nhvr.gov.au
RACV	Royal Automobile Club of Victoria www.racv.com.au
RDV	Regional Development Victoria www.rdv.vic.gov.au
1,00	negional bevelopment victoria www.tav.vic.gov.au
SAL	Shipping Australia Ltd www.shippingaustralia.com.au
T&L	Transport and Logistics
TEU	20 ft equivalent unit: standard measurement of container volumes (6.1 long x 2.49m height)
2117	Value Added Logistics
VAL	

APPENDICES

- A Summary of consultations x LGA
- B Listing of "C" Roads in Hume Region
- C See separate document for Maps of Hume Region Planning for Freight Pilot containing

Hume Region Priority Road Improvement Projects Hume Region B-double and Strategic Freight Routes Hume Region Arterial Roads

B Double Gazetted and Permit Routes x LGA Strategic Freight Routes x LGA Freight Impacted Local Roads x LGA

- D TIRES Priority Road Upgrades 2013-15
- E Survey Formats Freight Generator Survey T&L Carrier Survey
- F Higher Productivity Vehicles

Page 42 of 73

APPENDIX A Summary of Consultations x LGA

Alpine Shire

Geography limits freight routes

Access is limited to VicRoads managed arterials (Great Alpine Rd, Kiewa Valley Highway) used by all vehicles with relatively short local access routes.

Key townships are located directly on these routes. They tend to be freight destinations, as users of the through route to the coast tend to be tourists rather than freight.

The limited number of routes means that the roads are used by cyclists, tourist coaches and an increasingly elderly resident population (one third) so safe sharing of road space is a key consideration in the Shire. For example, sealing of shoulders on the Great Alpine Rd would enable cyclists to travel safely with trucks.

Freight generators

Land use in the Shire is dominated by national parks and Crown Land (92%). Tourism and plantation timber are dominant industries and livestock and horticultural activities also generate freight.

In recent years water extraction has become more common, with water tankers accessing sealed and unsealed local roads to deliver water for bottling in Albury. Council has poor capacity to manage this access as it is not a local business.

The timber industry works well with Council. It provides communication around timber trucks to the local schools and Council. Timber trucks come off the mountain at Bakers Gully Road and pass a school, but there is little issue.

Servicing the supply needs of the Alpine resorts for the 12 week snow season generates freight vehicles on the snow roads.

Periodic cattle sales generate freight movement but this is well managed and causes no issue.

The loss of the tobacco industry has seen a gap in agricultural production. It is unclear at this stage which product will replace this activity. Most secondary processing of agricultural product takes place on or near the arterials so local access tends to be a short distance.

Truck parking and marshalling

There are a number of informal and designated rest areas along the main arterials which are used by trucks. There is one located on the Kiewa Valley Hwy at Tawonga.

Council has provided long parking spaces in Myrtleford near Highett Park for trucks, particularly those accessing the timber mill. Truck parking is limited or not available at other town centres. Some owner drivers park in townships but this has not created complaint.

While the local roads used by the timber industry are notified in the TIRES process, the scale of operations in the Shire generally doesn't give a high priority in the process despite the challenging topography.

Bridge capacity

Bridges on several local routes cannot cope with heavier vehicles, so in future this will be a concern.

Page 43 of 73

Local Deliveries

Back Porepunkah Rd to Bright is used as a rat run off the Great Alpine Rd.

Loading direct from the truck at the Bright IGA uses parking spaces and is opposite medium density housing. Deliveries interfere with local traffic on Holland St in Bright for a limited time each day. A similar situation occurs in Mount Beauty.

Future development

Town development is likely to be restricted in Bright due to the Ovens Valley being affected by the Bushfire Overlay. Demand is steady across the Shire for residential land and slow for industrial. Industrial land supply is focused in Myrtleford where there is 15 + years supply available.

Relationship with T&L suppliers

This is ad hoc and limited as freight has not been a significant issue. No data is collated on freight volumes moved on local roads or from local sites. This is mainly because the activity takes place largely on Vicroads-controlled assets.

Rural City of Benalla

How to realise the strategic value of infrastructure investment to benefit the LGA?

The Hume Freeway, Midland Highway, Benalla-Yarrawonga Rd and main Melbourne-Sydney rail line intersect the municipality. This is an opportunity to service freight movement in all directions, with available land and excellent access for both rail and road.

However, the district does not generate sufficient freight in its own right. It has advantages in relation to suitability for freight agglomeration and fatigue management, as it is a point for rest breaks on interstate journeys to and from Melbourne.

Council owns an IN1 zoned 300 hectare site to the north of Benalla which articulates with the Benalla-Yarrawonga Rd and the Oaklands standard gauge rail line on a 1.5km frontage, with high capacity power and gas supply. This site could also be developed for freight activity.

Higher Productivity Vehicle rollout on the Hume

Geometry of Hume Freeway intersections and turning lanes will require redesign to accommodate super B-doubles and HPVs. This may entail amendment to Vicroads standards.

Heavy Vehicle local access

- Midland Highway Benalla CBD truck deviation utilises local roads (Faithfull St, Goodwin St, Ackerly Ave) not
 designed for HML movement. This route crosses Lake Benalla/Broken River over the Stock Bridge which requires
 cement sheeting to strengthen this bridge.
- Roundabouts on this route and other local freight routes will require redesign to accommodate PBS rated vehicles
- Current OD and B-double access routes are impacted by flooding, so contingency routes would need to be identified for these occasions
- Enforcement of access permits is limited
- The width of road reserves at roundabouts, intersections or passing lanes is often restricted and will require land acquisition

Trailer exchange/de-coupling site

Enterprise Park (Benalla – Winton Rd) accessed via ramps using Hunter Rd may be a suitable site for this facility to service freight leaving/entering the Hume needing to reconfigure trailers. An informal site (Tira) currently enables load restraint checking before entering the Hume from the Midland.

Fatigue management

The old weighbridge site on the Hume is frequently used for rest by heavy vehicles. Amenities are not supplied. Most trucks would use the formal truck park areas west and east of Benalla on the Hume or the Service Centre at Glenrowan.

Page 44 of 73

Provision of access locally to service stations for drivers to use amenities, refuel and buy refreshments is limited by HML limits, roundabout geometry and the height of weather shelters not accommodating trucks.

Economic growth

Agribusiness is experiencing organic growth through SMEs in the production sector. Manufacturing has experienced downturn with some large employers closing and uncertainty around employment levels and an ageing workforce. Thales Defence contracts are uncertain as procurement practices have changed. The LGA has an unemployment rate of 7%. Council is pursuing opportunities for ICT.

Key industries generating freight are timber (Henderson generated 27 B-doubles /day) and grain. Almost one third of the EFT workforce travels from adjoining LGAs.

Land use planning

Growth of residential development will be on the Mansfield Rd area, with est. 800 lots to be generated. The LGA has a 15 year supply of lots. Traffic entering the Midland Hwy and key intersections will require review.

Infrastructure funding

It is unclear what statistics can be gathered regarding accidents where only vehicular damage is involved. This may account for some of the collisions taking place on the local road network involving freight vehicles.

Gathering information about the road transport industry local access issues from carriers was discussed and there has been contact between Council officers and these companies that could be drawn on.

Indigo Shire

Indigo Shire has a mix of land uses. The townships and surrounding rural residential lots are largely lifestyle and commuter residential areas, servicing residents working in Wodonga, Albury, Corowa or Wangaratta. The AAGR of population is around 1%.

However, in the lowland western sector of the Shire larger holdings of fertile productive land is used for wine and cereal production. The Shire extends to the boundary of the Logic hub at Barnawartha and along the Murray beyond Wahgunyah.

Townships in the Shire have very high heritage values and were constructed with long main streets closely flanked with smaller homes, so setbacks are now an issue for what have developed as arterial routes. The townships of Rutherglen, Beechworth and Yackandandah are tourism attractors with around 50% of local economic activity in tourism, so the mix of high street road users is a concern.

The Shire is generally well serviced with arterial routes, being -

- B400 Murray Valley Hwy
- M31 Hume Highway
- · C381 Chiltern-Howlong Rd
- C377 Chiltern-Rutherglen Rd
- C315 Beechworth-Wodonga Rd
- C527 Yackandandah-Wodonga Rd
- C531 Kiewa Valley Hwy
- C524 Buckland Rd
- C525 Stanley Rd

Page 45 of 73

Freight generators

Dairy

Milk is transported through Yackandandah and along the Kiewa Valley to the Murray Goulburn Coop Co Kiewa factory in Tangambalanga using B-double tankers each day.

Wine

Rutherglen is central to winery production in the Shire, Much of the transport is semi-trailer shipments to processing and is seasonal around the harvest in autumn. It also involves farm machinery and production equipment movement.

• Grain

The Uncle Tobys mills are situated at Wahgunyah and generate heavy vehicle movements. There are 22 trucks per day accessing the site. Cereal production in the Shire is limited to the western lowlands. It was noted that farm machinery is growing in size.

Cattle and sheep

Livestock production occurs across the Shire. There is no data available on volumes held locally, however it was noted that the relocation of the saleyards to Barnawartha will increase movements on the E-W routes, including the Murray Valley Hwy.

Water Extraction

Water extracted from Myrtleford transits via Yackandandah in B-double tankers to Albury. Notice of the opening of a new extraction site was identified as a concern for the Shire, although the extraction point was in adjoining Alpine Shire. The company responded that there would be the same number of trucks transiting as one site was being closed, however the situation highlights the lack of consultation process with "transit" subject LGAs related to approval processes.

Quarrying

A previously closed high grade rock quarry is to be reopened at Chiltern. This development was recently determined by VCAT. The site will create additional truck movements.

Industrial development

Industrial development tends to be incremental. Most demand is for small "factoryette" sites for engineering or mechanical workshops. Lack of services to these sites is a higher order concern than transport access.

There is a small concrete batching plant at Beechworth. At Chiltern there is potential for further industrial or T&L uses near the rail and freeway network.

Land use and economic yield

Recent work undertaken as part of the Regional Growth Plan shows that land in the Shire is generally high cost and low output in terms of agriculture, indicating much of the land is used for rural living purposes.

Heritage assets and infrastructure

The Shire has several townships of high heritage value, which attract investors and visitors. Council is concerned at the impact of heavy vehicles on structures with heritage value. For example, Council funded a structural analysis of the Yackandandah Bridge even though it is a VicRoads route, given its local significance.

The main street of Rutherglen is narrow and lined with heritage buildings. This is also a concern in relation to heavy vehicle movements, despite the route being a VicRoads controlled asset.

Capacity to assess assets for HV access

Council pointed out the costs of assessing structures is prohibitive for a small rural shire. While the PBS Route Assessment Tool will help, data will still need to be collated on routes for assessment. Without expert assistance and resources, it will be very difficult for this Shire to undertake assessments, without an applicant funding the assessment. The Shire would like to know whether the NHVR has considered this predicament.

Truck parking

Council receives complaints regarding truck parking at Chiltern. This can be exacerbated if the truck has a refrigeration system active overnight.

Page 46 of 73

Rest areas

The southbound service centre at Chiltern is to reopen. The northern boundary of the Shire adjoins the Logic intermodal site so it is expected that driver facilities will be built there.

Local roads used by freight

- An increase in use of Indigo Creek Rd Beechworth Rd Barnawartha is expected. The relocation of saleyards to Barnwartha will generate risk in relation to the alignment of this intersection and line of sight.
- · Allans Flat Rd- between Lindsay St and the Kiewa Valley Highway avoid upgrade to discourage rat running.
- Soldiers Rd Barnawartha requiring upgrade for access between Barnawartha and Murray Valley Highway.

Greater Shepparton City Council

A major agglomeration point

Shepparton acts as a major point of agglomeration of freight, particularly perishable exports. It generates nationally significant food product for export and acts as a catchment area for the national food bowl.

The success of supply chains from this point is of concern to all levels of government because of the funnelling of so much freight to the Port of Melbourne.

Use of coolstores and packing sheds for general logistics

Orchards and small scale horticulture holdings with on-farm coolstores and packing sheds are being used for general merchandise storage and warehousing. Owners may have overcapitalised on their farm investment and are now able to recoup some funds from these surplus buildings. The land use complies with the planning scheme, but the transport activity has now increased as these sites are used for ad hoc buffer storage for manufacturers, as a cheaper option to major consolidated investment at a hub.

The issue is that the roads and the adjoining land uses are not compatible with the increase in volume of truck traffic. The facilities are not amenable to retrofit with suitable flooring, racking, ICT connections. It is considered inefficient to have a scattering of smaller sites creating multiple demands on local roads and multiple impacts on neighbourhoods.

Residential and community uses have extended to these areas, so issues of road safety, dust and noise are relevant.

This issue was the impetus for the Council becoming involved in the Toolamba GV Link intermodal site, to provide an alternative site for logistics activity to the fragmented sites available for industry.

While sites with good access to the arterial network are available at cheap rates, the commercial appetite for relocation to a purpose-built site is dampened. However, the outcome is conflict with adjoining land uses and infrastructure not designed for the level of heavy vehicle use.

Page 47 of 73

Case Study 1: Expansion of a dry/cool storage facility Prentice Rd, Orrvale

17 years ago, Council approved a coolstore to be built in fruit orchards east of Shepparton in Orrvale. Over a period of time a warehouse was added along with facilities for orchard workers. 3 years ago the site evolved from storage of orchard fruit, seen as rural service industry, to a generic storage site for a transport company servicing several food industry production sites in the area.

The land use has not changed per se, however the transport activity associated with the site has increased exponentially. Nearby residents have complained to Council regarding truck volumes, road safety on the three local roads used to access the site and noise levels from night operations.

Council is now confronted by an application from the transport operator to expand loading facilities, hard stand area and road access.

Case Study 2: Packing Shed/cool storage and Transport Depot - Verney Rd, Shepparton

A transport company operates from a site surrounded by orchards with residential development located along the south and east side of the site. The original activity on the site was as an orchard and fruit packing shed and in 1998 approval was given to extend the storage area. A decade ago the site access was adapted for larger vehicles with a condition that any costs associated with heavy vehicles accessing the site may be levied on the land owner.

Over the decade volumes and size of vehicles accessing the site has incrementally grown. The increase in residential land uptake adjoining the site in the next decade is a concern in relation to conflict with land use and road safety which Council must deal with, while coping with the demand for fit for purpose infrastructure to service the site.

Planning definition

A number of sites in industrial areas have not required a planning permit. However the distinction between a business with trucks to operating as a transport depot without a planning requirement means that conflict with adjoining land uses is not being managed as well as could be. "As of right" uses that evolve into more intensive transport activity are difficult to regulate, so requirements regarding access, buffering etc are not able to be part of any consent process.

Dispersed freight generation sites

Shepparton has a proliferation of manufacturing and production sites that generate two-way freight movements. They are not confined to one or two industrial areas, but are scattered across the LGA, creating a wide impact on local roads. Council previously surveyed and mapped these sites and this is being revised at present.

Rat runs between arterials on local roads

Lemnos North Rd is an example of run running between Koonoomoo and Katamatite for trucks. Another is the alternative access to Campbells Soups.

Sub-optimal Infrastructure for the freight task

The convergence of freight traffic through Mooroopna – Shepparton and the mixing of local, tourist traffic with heavy vehicles results in accident risk and amenity loss for this area. The situation reinforces the need for the Shepparton Bypass and the Strathmerton Deviation.

GV Link future development

Land acquisition for a national freight hub at Toolamba has been completed. The detailed design for stages 1-3 and the concept design for stages 4-6 are completed. In terms of future development, the Council as host is negotiating with the three key parties for future development – the businesses requiring T&L services, the suppliers and developer of floorspace to service this activity. Given contracts to suppliers are not "locked in" for long periods a developer perceives risk in providing assets that have a much longer economic life. The investment will largely be led by a manufacturer lead tenant or a major logistics supplier with several customers to offset any contract vicissitudes.

Commitment to the GV Link by all levels of government will assist in facilitating the development.

Page 48 of 73

Trailer breakdown/fatigue management facilities

A trailer break up point is required, probably near Doyles Rd interchange before the dual lane section of the GV Hwy finishes. In the short term, prior to completion of the Shepparton Bypass, consideration could be given to placing the break up/decoupling point at the north end of Shepparton Alternative Route. This will facilitate any demand for bringing HPVs from NSW. Longer term, Shepparton needs to provide facilities to operate as a natural changeover point for drivers between Melbourne and Brisbane. Fatigue management will be improved by having facilities at a properly designed site linked to the Goulburn Valley Highway and the Shepparton Bypass.

Need for current data on freight movements

A Freight & Land Use Study has been funded by Dept Transport. Council will align the priorities between this Greater Shepparton-specific Study and this Planning for freight Pilot.

Industry investment in the network

No special rating schemes or joint ventures have been introduced to make improvements to the local network.

Local deliveries

Deliveries to business districts are often impacted by lack of route access knowledge. Length of vehicles creates difficulties on local access routes. Mapping of preferred routes may assist.

Mansfield Shire

The Shire was mooted to be part of the Benalla LGA in the mid 1990s local government amalgamations. In retaining separate status, the viability of the Shire may be affected by its low population. 50% of the ratepayers are non-resident. With two major tourist attractions of Lake Eildon and Mount Buller, the Shire's economic base is focused on tourism, generating 65% of activity.

There is not a lot of freight generated within the Shire and most traffic is generated by tourists.

For this Shire, the Maroondah Hwy is the key arterial and it was noted that this was not mentioned in the project Brief.

Freight generators

Quarries - there are 2 quarries, one near Mansfield and another at Lima East.

Forestry -1-2 coupes are commenced each year in pine plantations, which operate on a 25 year cycle of plantings. One sawmill has recently closed down.

Seed production – there are three operators in the Shire and one processing plant at Yarck. It is noted that the equipment used on farms is getting larger.

Livestock — the saleyards at Mansfield have closed, so livestock is trucked out weekly to Wangaratta, Wodonga and Yea (generally not to Euroa)

Resort supplies - deliveries are made using 4 tonne all wheel drive vehicles in Winter.

Local access issues

There are few manufacturing or processing sites in the Shire to generate freight.

Deliveries to local sites cause few issues. Supermarkets – one built in the last 5 years was able to demonstrate loading facilities were adequate, despite Council preferring a longer loading bay for heavy vehicle access. Another supermarket has a generous car parking area for heavy vehicles to manoeuvre in. Loading is off-street, albeit serviced by forklift.

Truck parking is not provided for in Mansfield. Tourist buses parking in the retail area create more concern. Refuelling is available 20km away.

At the eastern end of the town there is an intersection of concern however it has not shown up on blackspot statistics.

There was a study conducted on a bypass route to the east of the town and upgrading was recommended.

Page 49 of 73

Accidents on the Maroondah Highway involving skiers returning to Melbourne after a weekend away are a risk.

Issues around new areas developing and interface with freight generating areas might arise in relation to Dead Horse Lane and the Lakins Estate. Consideration of future HPV access is of interest to Council.

Mining operations in the Shire operate on private roads accessing the Vicroads arterials e.g., Woods Point/Golden Star/A1 mines.

Mitchell Shire

The Shire is in a renewal phase and redefining itself as a peri-urban Shire.

Freight generally moves through the Shire on arterials. Activity in the Shire is not the major generator of freight activity.

Development in the south of the Shire

Council has been working with the Growth Area Authority to plan for residential development in the south of the Shire, particularly at Wallan and Beveridge.

Growth has not been as rapid as expected, but the Shire is going through a major change in its makeup. 25-30 new stages of subdivisons are being built per annum, each with 10-20 dwellings.

Wallara Waters and Devine developments have generated a large volume of materials for site preparation. Roads impacted by this are:

Wallan-Whittlesea Road

Northern Highway

Maccsfield Road

Epping-Kilmore Road may be impacted in the future.

Other townships in the Shire (Kilmore, Broadford) will experience low growth. Until the levee bank is completed in Seymour growth is likely to be subdued.

Freight generators

Nestle has a factory in Broadford. Access involves one local road to the industrial estate. If HPVs were to use the Hume, access would be sought by industry to this site.

The paper mill is off the arterial and would need works to facilitate HPVs.

Timber trucks around Wandong

Quarries in Kilmore and Seymour

Poultry farms (3) and horse studs are serviced with feedstock

There are a limited number of freight generators, most using a very limited number of routes.

Road network

The Shire is well serviced with N-S routes

Council has a gazetted O_D route in Seymour which requires upgrading as some pavement sections and the roundabout are substandard (Wimble and Oak St roundabout)

At Kilmore East there is a rail bridge height issue with trucks crossing out of their lane to move through the bridge. This is a route accessing a quarry site.

Plans for a wind farm development will impact Homewood - Kobbyboyn Rd Seymour

Hume Hovell Rd, Seymour has an equine industry cluster and broiler farm which uses a ford river crossing. This is being reviewed.

Beveridge Intermodal site

This site is located in an area adjoining the Melbourne-Sydney rail line and Hume Freeway. Council is concerned that a declared access road to this intermodal is planned and designed with a north facing half diamond intersection on the Hume Freeway to facilitate northbound freight) and buffered accordingly.

Page 50 of 73

Development is moving towards the candidate local road. The intermodal itself is located just outside Mitchell Shire's boundary, but has large impacts on the adjoining Shire managed area.

Kilmore bypass and freight access

There an industrial estate to the north west of Kilmore, including bridge fabrication, a concrete plant generating heavy large freight. On the north east are two quarries.

Depending on the alignment to be determined in the next 12 months, access for freight and passenger vehicles and intersection alignment and design will need to be considered.

Kilmore experiences traffic congestion around peak times and weekends as visitors stream up the northern highway. The mix of local, through and heavy traffic is an amenity and safety concern recognised by VicRoads.

Informal truck parking

Wallan is affected by owner-driver truck parking in residential areas with some residents requesting "no truck parking" signs to be erected. The BP service centre on the Hume has capacity for truck parking and it would be a potential solution if an area at the service centre could be secured for local carriers.

Local deliveries

Local tipping sites and landfills are located around Seymour e.g. Tooborac Rd. Council has transfer stations at the Wallan industrial area, Broadford, Seymour and Pyalong.

Delivery to local retail areas is constrained, often because the activity districts were built when smaller delivery vehicles prevailed. As many of these areas adjoin residential uses, retrofit is difficult.

In Wallan deliveries to retailers is via Wellington St, which has a residential interface. In Kilmore, deliveries to businesses along High St and Powlett St access to small light industry sites can create traffic conflict.

In Station St Seymour access is narrow and damage to buildings has resulted from trucks accessing the supermarket.

Rail

There are only 3 passive rail crossings out of 9 left in the Shire. While there is an old spur line into the paper mill, there are no loading facilities for freight to rail.

Engagement with T&L industry

Involvement with the industry has been limited.

Moira Shire

Seasonal freight activity

The focus of freight movement is on harvesting of grains and horticulture product. General freight movement the remainder of the year is centred on industrial precincts in the towns of the Shire, however at harvest time it moves onto a number of local roads, coinciding with the holiday period when arterials and local roads are used by visitors.

Marshalling at grain receival sites and trucks parking in local streets creates frustration for residents. Limited knowledge of grain logistics pre-drought and consolidation in the industry has meant poor anticipation of the congestion at receival sites, particularly Yarrawonga.

The dairy industry is significant in the Shire. The presence of larger milk tankers on local roads is not a major concern. The companies have a schedule and this seems to be accepted by local residents.

The horticulture industry is smaller than grain but the product is high value. Dust from the unmade roads coats the fruit and the rough pavements bruise fruit.

Page 51 of 73

Numerous intersections on the Murray Valley, Goulburn Valley Highways and the Benalla-Tocumwal Rd are used by heavy vehicles. The mix of through (often interstate) trucks and local traffic accessing properties creates vehicles "propping" to turn. This increases accident risk.

Farm access via dry weather roads

Moira Shire is a farming district which formed part of the widespread soldier settlement scheme post – WW1. The Shire is largely divided into a road grid designed to provide access to these farms. This grid of unsealed roads covers a wide area and is not able to be maintained as all weather road. All weather roads provide access for farm houses, but dry weather roads access crops. The extent of the impact on Shire assets is evident.

Harvesting is time-constrained and with the breaking of the decade-long drought, the Shire is experiencing increased grain yields and soaked dry weather roads used by heavy vehicles accessing local farms. Farm machinery and harvesting equipment, often shared between sites and contracted by multiple farmers, increases mass on vehicles.

This exacerbates the road condition and frustrates transport operators and farmers. While on-farm storage silos provide some relief in terms of timing of transport activity, these dry weather roads are creating an unsustainable burden on the Shire.

Enforcement of heavy vehicle access

Restricting heavy vehicle access to permitted roads, controlling rat runs on rural roads and in townships could make a material difference to the cost burden of repairing roads in this Shire, particularly during harvest season.

While larger companies apply for HV permits, others take their chances on the network, perceiving enforcement activity to be low.

Mookari St Cobram, Tungamah Rd, residential areas in Numerkah are affected by freight transport.

Labuan Rd is an example of where Council upgraded the road to improve access, to support economic activity to find it used by through traffic as an alternative to the N-S arterial connecting Shepparton and the Murray Valley Highway.

Most industrial areas have truck parking. Yarrawonga does not. The Yarroweyah service station provides truck rest, refuelling and driver break facilities.

As the network is so permeable, it is difficult to control freight routes so that the arterial network is used more frequently; so use of the local road network is often parallel to arterials.

Future development

Two new industrial areas in Yarrawonga and Nathalia will add 6-10 additional sites in each area. There are 30-40 sites across the Shire fur further industrial development.

Bridges

Bridge strength on local roads will be a larger issue for heavier vehicles carrying milk, beef, canola and wheat and for moving farming equipment.

Network Infrastructure Upgrades

Improvement to "B" class roads is required, with additional passing lanes, right turn lanes for trucks and shoulder sealing.

The greatest challenge is the sheer size of the road asset in the Shire. While volumes are low in comparison to other shires, the impacts are widespread and difficult to manage. The current business case models consistently disadvantage the Shire. Safety becomes the first priority and this must be maintained to the same standard as any network in the State. This leaves no resources for strategic access management which is beyond the capacity of the Shire.

Page 52 of 73

Murrindindi Shire

Legacy of disaster

The Shire has experienced a substantial loss of ratepayers since the February 7 2009 fires. This will materially affect the financial capacity of the Shire to sustain its assets, including those built post-fire. The scale of impact involved 40% of the Shire's area being damaged. It is now in the process of recalibrating its asset management and operational systems in the post-recovery phase.

The Shire has produced a map of business and economic activity used for DSE fire management purposes. This provides a useful resource to identify freight generating activity.

Since the fires, heavy equipment accessing State and national parks and Crown Land has used access roads in the Shire, including logging roads. Materials for the reconstruction have been freighted throughout the Shire, generating an impact on assets. This activity has now declined to a consistent but lower level.

High dependence on VicRoads arterials

The Shire is serviced by the Melba (B300), Maroondah (B360) and Goulburn Valley (B340) Highways and several key collector roads, including the Whittlesea-Kinglake/Whittlesea-Yea Rd (C725); Buxton-Marysville Rd (C508); Marysville Rd (C508);

There are few alternatives to these key routes, so commonly industry locates within close proximity of these routes.

The Shire is impacted by traffic leaving Melbourne's eastern suburbs and reaching the area late in the day en route to Benalla to access the Hume Freeway or Goulburn Valley Highway.

The major traffic on these routes is passenger, often visitors following a designated touring route from the Yarra Valley. This creates a risk with heavy vehicles in the opposite direction to tourism traffic on narrow winding sections of the highway (e.g. Black Spur between Narbethong and Healesville). A lack of viable alternative for freight creates risk and rollover accidents occur each month.

An alternative route for trucks was mooted between Marysville and Toolangi, however the cost to build to heavy vehicle standard was estimates some time ago at \$23 million.

Freight generators

Construction of the North-South Water Pipeline (aka Sugarloaf pipeline) from the Goulburn River near Yea along the Melba Highway south to Sugarloaf Reservoir has generated freight movement.

• Seasonal agricultural harvest of cherries, fruit and potatoes around Kinglake generates freight.

The Shire is a dominant producer of trout with aquaculture (e.g. Kinross) generating freight in small refrigerated trucks accessing Melbourne and interstate routes. Seed and turf production generate movement of equipment and freight at harvest. Most activities are within close proximity to arterials and generate minimal impact. Agricultural equipment is becoming larger and is moved from farm to farm during the season.

Timber industry

Forest covers a large area in the Shire. The timber industry has softwood and hardwood plantations in the Shire and native forest is located on large areas of public and private land. Processing in the Shire takes place at the Murrindindi Mill and softwood sawmilling will resume when the GB timbers site is rebuilt. The mill in Alexandra closed in 2010. A large area of timber has been destroyed in the 2009 fires and timber salvage operations will continue in the area until 2013. Timber is transported to local and regional processing and to port for woodchip export. The timber generates logging trucks and relocation of equipment between logging coupes throughout the Shire e.g. Rubicon Rd, Snobs Creek Road. Use of local roads without a permit by logging trucks takes place in Marysville and Yea outskirts and on Murrindindi Rd and at Limestone. A code of conduct for timber vehicles worked for local carriers but not for out-of-area carriers. An example was Spring Creek Rd. Now the logging company will be responsible in a change managed by VicForests, so Council is hopeful this will improve behaviour of logging trucks. At Rubicon the intersection of the logging routes is near the local school.

Page 53 of 73

Heavy vehicles generate dust. The TIRES 2011 report has identified Myers Ck Rd, Toolangi, as requiring shoulder widening and delineation to move 420,000 tonne of timber. The TIRES process is affected by the small financial allocation. There is high acceptability of timber trucks in the LGA given the employment the industry generates, so there are few complaints. For the most part, the timber industry transport of freight is responsible and communicative. Buxton, Marysville and Alexandra have been identified by the timber industry as towns having a high economic dependency on this industry.

Water extraction

Heavy vehicles on Extons Rd Kinglake mix with farm and school traffic. The extraction site is only 600m from the arterial

Livestock

The saleyards at Yea are being expanded and these will attract livestock transport from Murrindindi.

- Houseboats being moved for repairs to the Eildon boat yard are a regular wide and high load movement.
- Quarries

Issues relating to quarry materials on local roads include -

- Ghin Ghin Rd, Yea bridge with a 20 tonne limit;
- Local access for HPVs
- Castella Quarry truck noise; low density residential adjoins the access route (braking noise and early starts disturbing neighbours)
- Yea Sand & Gravel a short local section of road to the Goulburn Valley Hwy
- As part of permit approvals, a tonnage due scheme was introduced but has not been collected. Access to tonnage data
 was to be via Dept Primary Industries. There may be more success if the operator is made the road manager, but this
 depends on the size and capacity of the operator.
- There is not a great deal of communication between the industry and Council
- Council owns a quarry
- There are other land fill and concrete batching sites that have not been mentioned.

TAFE Conference-training centre at Eildon

Supply of equipment and goods to this new centre which provides short courses and conference and training for TAFE.

Rat runs

Miller St Yea is used by both passenger and freight as a short by-pass of Station St, which is the arterial. In some respects, it would be sensible to exchange routes with Vicroads, as Council prefers usage of Miller St, keeping heavy vehicles off the high street of Yea. Miller St has a roundabout with Station St.

Trucks use the Melba-Goulburn Valley Highways as an alternative route from the East of Melbourne rather than CityLink. It is unclear whether this is to avoid delays or speed detection, faced with pressure to meet delivery windows. The Broadford-Flowerdale Rd link requires improvement. The King Parrot Creek Rd and Murchison Gap sections are used frequently by heavy vehicles accessing the Hume Freeway. The pavement is damaged.

The bridge on the Yarck Rd is used as a shortcut to the Hume. It is the only one lane bridge on this road and is used by heavy vehicles.

Alexandra hospital relocation resulted in cars and delivery vehicles moving from the arterial to the local road,

Local freight access issues

For a rural shire, the cost of developing good heavy vehicle access to an industrial area is so high that it becomes a disincentive to development. The access effectively "outprices" itself. Uptake of industrial sites tends to be incremental and developer contributions would not cover the costs for few incumbents and are often contested.

Intersections will need reconfiguring from current 6m wide to accommodate heavy vehicle access to industrial sites e.g. adjoining DSE offices at Alexandra.

New industrial land and redevelopment of former industrial sites e.g. 10 acre mill site in Alexandra, will need to be considered in relation to freight movement. There are currently 3 sites in Alexandra and 1 site in Yea.

Page 54 of 73

Parking of heavy vehicles, rest areas and de-coupling yards

No parking is provided specifically for heavy vehicles to access town centres for banking, meals etc. Buses parking for tourism to Lake Mountain, Buller and Mount Beauty are prevalent.

Informal truck parking occurs at Buxton Hall car park. Cottons Pinch on the Goulburn Valley Highway between Moleswoth and Yea is used as a rest area: Smaller trucks use a rest area outside of Yea. The area around the mill and hardware store in Station St Yea is also used. Owner drivers tend to park in residential areas of Kinglake. There are few complaints.

3.7.1 Strathbogie Shire

Driver Fatigue and behaviour

The pilot should outline technology that can be used to manage driver fatigue and behaviour e.g. optalert glasses. This would be useful awareness raising for transport operators.

Driver fatigue on the Hume is best managed through the service centres. Potentially these could be combined as truck secure parking areas and this would avert local carriers parking trucks in residential areas.

The Caltex Avenel Roadhouse is a popular truck stop where informal parking is common.

Land Use

Council has been updating its Municipal Strategic Statement. As part of this work, new structure plans are being prepared for townships. Preferred sites for industrial development and freight activity are being identified. There is potential for industrial sites to adjoin service centres.

At present, power and water trunk supply is limiting agribusiness in the Shire.

Beyond current townships, there is demand for rural residential development along the Violet Town- Murchison Rd and around Avenel.

Freight generators

Council has drawn up maps of freight generators and will prepare maps of potential PBS access routes.

Local deliveries

Supermarket access

Mangalore future hub/logistics site

This strategic site combines transport modes at an axis of two main arterial freeways and the Northeast and GV Rail line. RDV has provided funds for master planning at the site, which is currently land held by Colin Rees. It is servicing general aviation and pilot training. The facility would require connection of reticulated water and a runway upgrade.

It has been mooted as an ideal site for Biosecurity Australia quarantine. This has a synergy to the horticulture and equine industry in the Shire.

The site is zoned Special Use so is suitable for specific freight and logistics uses. It has sufficient area of 216 hectare and can be buffered, ie. Ideal for national and international freight centre for fresh produce and equine activities.

This intermodal site could provide an excellent freight hub. To date Council has not had resources to facilitate it and it is a privately owned site.

Page 55 of 73

Avenel

Heavy vehicles from Longwood Rd and across the rail crossing on the Nagambie-Avenel Rd converge on a roundabout in Avenel opposite the post office where vehicles park. The dangerous intersection requires redesign and a concept has been worked through with VicRoads. This is priority upgrade for freight. It is expected an interim solution will be constructed staged to a final configuration.

Planning for Freight at the regional level

The priority is to develop a package of works which represents an agreed regional freight priority set of projects. Strathbogie representatives believe that (as a general observation), engagement of some member councils needs be improved to gain a Freight Pilot of meaningful content and of overall benefit to the full Hume region.

Towong Shire

Timber Production and Harvesting

Towong is host to the largest softwood plantations in the NE region. It has around 0.5million hectares of timber including softwood, hardwood and native forest.

Haulage of the harvested timber to regional mills and for export is a major freight task within this Shire.

The Timber Towns TIRES process has highlighted 64 priority timber routes required 2013 to 2015. One third of these routes are located in Towng Shire.

Timber haulage through the shire is focused on the Muuray Valley Hwy, used to access mills in Tumbarumba and Myrtleford. Shelley Rd and intersections on the Murray Valley Hwy will require upgrade. Access to the Hancock Victorian Plantations is developed, however semi and B-double access to Agriwealth and some private plantations will require bridge and road upgrades.

The TIRES funding has been token in recent years and the Country Roads and Bridges project only funds additional renewal/maintenance works as opposed to upgrades for higher mass limits or larger trucks.

Mining

Plans are underway to commence production at the Dart Unicorn Mine located near Corryong in 2016, with a 20 year extraction period. This site will produce heavy vehicle movements which will require around 3 kilometres of access road from the nearest arterial. The site will produce specialised freight bulker bags loaded on flat wagons to be packed in 20ft containers for export via the Port of Melbourne. It is expected that the site will generate 2 trucks per day moving through Upper Murray Rd then on the Murray Valley Highway through Corryong. Alignment, intersections and pavement on the Upper Murray Rd will need to be reviewed.

Seed Production

Victoria's largest seed production company is located in the Shire. Freight generated includes harvesting and planting machinery on local roads as well as cleaned seed produced and shipped domestically.

Dairy

The Kiewa milk factory is located at Tangambalanga. The factory collects milk from nearby LGAs and within the Kiewa Valley and Corryong, operating a mix of equipment including 19m and 25m B-doubles and semis. The site generates waste disposal to a piggery in Corryong twice a week as well as the deliveries and dispatches from the site.

Livestock

Livestock operations are dispersed across the whole Shire. A mix of equipment is used depending on the accessibility of the properties. The key issue for livestock is the need for safety improvements to the Murray Valley Highway. All farm access will require review for HPV access.

Page 56 of 73

Murray Valley Hwy

Safety issues raised in regard to the Murray Valley Hwy include Cudgewa-Tintaldra Rd, west of Corryong, Kiewa East Rd intersection, west of Tallangatta and limited overtaking opportunities between Tallangatta and Corryong.

Network access assessment

Because of the topography of the Shire, access is via a collector road up a valley, on to an access road to the farm gate and back again. There are no connecting roads between valleys, so every road where there is a farm needs HPV access.

Many of the bridges are not adequate and some intersections will need improvement, as will farm entrances. Assessment of local access routes is dependent on resources.

Rural City of Wangaratta

Freight generators

Timber harvesting and manufacturing of timber product is a major local industry generating freight transport. Access roads often have difficult geometry. The TIRES Roads Study contains one local route that is identified as a State priority (Rose River Rd).

Beef cattle in the NE & South, grain in the NW, quarry sites, wineries, dairying in the King Valley are identified. Volumes of freight are not known, but available vehicle count data for HV will be collated.

Two road corridors intersect the LGA at Wangaratta in N-S and E-W diagonal directions.

Key freight routes include -

- Federation Hwy to Corowa which passes through the city;
- Yarrawonga Rd
- Ovens Valley Hwy (Great Alpine Road)
- Snow Road
- Wangaratta-Whitfield Rd

Land Use strategy

Development in Wangaratta is constrained by the rivers and floodplains. These constrain further development on the northern and eastern areas of Wangaratta and future development is to the south and west of the city.

There is a predicted shortage of land zoned for residential development. This is likely to be addressed in the west and south of the city as part of a land use/land zoning review.

Four major sites are likely urban renewal/rezoning sites in South Wangaratta, Access for deliveries and waste collection will need to be planned. Council has its own waste management fleet with a landfill at Bowser. Its transfer station and a recycling business are sited in the South Wangaratta Industrial area.

Industrial areas

There are two industrial areas to the SW (smaller lots) and North of the city (larger sites).

Freight routes -

- Greta Rd interchange with the Hume. Tone Rd (old Hume Hwy) south and northbound access
- Hume Fwy intersection with Great Alpine Rd
- Bowser interchange North and South
- O-D routes from Yarrawonga Rd used by suppliers to the Peechelba Beef Feedlot and saleyards
- Yarrawonga Rd-Phillipson St(residential street) -Sisely Avenue to access South Wangaratta industrial area
- Murray Goulburn Coop travel through Wangaratta to access Cobram processing plant.

Page 57 of 73

Trailer Interchange area

An interchange for trailer exchange is currently being investigated for suitability at Wangaratta Aerodrome in Greta Rd. The impact of flood would need to be managed as would access to and from north bound lane of Hume Fwy at Greta Rd.

Another possible site in the industrial area in North Wangaratta is also being investigated with north and south bound access via the Bowser Interchange.

Rest Areas

There is a shortage of southbound rest areas. The aerodrome offers an opportunity for fatigue management.

CBD freight

Despite service centres on the Hume, heavy vehicles continue to visit Wangaratta. A traffic destination survey conducted as part of a Council and VicRoads traffic study showed for a high proportion of trucks passing through the CBD, Wangaratta was the destination.

A new outer ring road link/OD route to the west of the city would service freight to avoid moving through the CBD and residential areas. This would require land acquisitions and a new bridge. Funding would be required to bring the standard of existing roads up to collector level. Meantime, Rowan St and Phillipson St continue to be the route for freight moving to/from Yarrawonga.

T&L Industry Engagement

There are 4 major transport companies based in the area -

- Milawa Transport Services (Osboldstone Rd)
- Canny Carrying Co (Murrell St)
- Greenfreight (Hay Ave)
- Francis Transport (Tone Rd)

3.7.1 City of Wodonga

The LGA is the second smallest in size in Victoria. It features mountainous topography and hosts the major interstate arterial road and rail corridors. Wodonga has a younger age profile than Victoria and is growing at 2.2% p.a. There is a need to grow jobs to employ population (see Council's Economic Development Strategy outlining the SWOT analysis).

Logic Hub, Barnawartha

The focus is on establishing a case for a rail terminal on the site. There is a need for recognition in the COAG National Freight Strategy and for further investment facilitation.

The relocation of the Wodonga saleyards to a site near the Logic Hub in 2014 will increase the need for access for heavy vehicles on east-west arterials, the Murray Valley Hwy west of Logic and the Rutherglen to Logic route. Access for HPVs to and from the Hume Freeway is essential. A Fatigue Management Centre is soon to be put to tender at Logic for completion in early 2013. The facility will accommodate 45 heavy vehicles and be able to take B-triples.

Regional Cities planning

The suite of planning strategies cascading from Metropolitan Strategy and Regional Growth Plans to Regional Cities, Township and Rural area plans highlights the opportunity for central Wodonga redevelopment

Industrial Land Use Strategy

There is 1,100 ha supply of industrial land which will suffice for at least 15 years. Growth tends to be organic and demand is for existing built facilities. Use of the saleyards site will need to be considered. The release of a 23 lot subdivision adjoining the Baranduda Industrial Estate may require consideration of buffering and passenger-truck interaction and access.

Page 58 of 73

Strategic Land Use

Laneva Valley strategic planning is subject of a current planning study. It will supply a long term residential growth area for Wodonga. Part of the planning will need to include consideration of how to ensure access for freight to existing generation sites is not compromised and the interface of industrial and residential land is managed.

Wodonga Integrated Transport Strategy

The Victorian Government and Council have funded an Integrated Transport Strategy which is at the EOI stage. Elements discussed regarding freight will now need to be incorporated into this work.

Freight activity areas

Access via well designed VicRoads-managed arterials and ring roads is available from most of the current industrial areas, so problems are limited. Heavy vehicle issues reported to Council relate to —

Melrose Drive roundabout; Maloney Drive; Roundabout on Bandiana Link Rd; Beechworth-Wodonga Rd passing lanes and access; Foundry; Wholesale perishables area in Osburn St.

Local amenity concerns include dust at transport depots; noise e.g. Trafalgar St Australia Post depot and nearby motels; and informal truck parking.

Infrastructure Design Manual

Design issues associated with freight will need to be retrofitted to the manual developed by a group of Hume region councils. Issues such as supermarket deliveries (e.g. Hovell St Coles supermarket) will need to be included.

Industry interaction re freight

This has tended to be project-specific. T&L industry infrastructure issues, industry requirements are not systematically gathered. Council maintains a database of companies and has a quarterly newsletter to businesses.

Page 59 of 73

APPENDIX B Listing of "C" Roads

Route Number	Description	
311	Kilmore – Broadford	
312	Euroa	
313	Benalla-Winton	
314	Wangaratta South-Bowser	
315	Tarrawingee – Gateway Island	
320	Mansfield- Mt Buller	
324	Kilmore-Woodend	
325	Tooborac-Sunbury	
344	Heathcote-Nagambie	
345	Goornong-Violet Town	
346	Tahbilk-Avenel	
352	Tongala	
355	Wyuna-Mooroopna	
356	Rushworth-Tatura	
357	Undera-Wahring	
358	Barmah-Shepparton North	
359	Kyabram-Wyuna	
361	Nathalia-Yarrawonga	
362	Rochester-Kyabram	
363	Congupna-Katamatite	
364	Devenish-Shepparton	
365	Dookie-Violet Town	
366	Kialla-Merton	
367	Koonoomoo-Cobram	
368	Cobram-Muckatah	
369	Mooroopna-Murchison	
370	Cobram	
371	Cobram-Benalla	
372	Yourang-Tungemah	
373	Yarrawonga-Benalla	
374	Esmond-Wangaratta	
375	Wahgunyah-Bowser	
376	Wahgunyah-Springhurst	
377	Springhurst-Beechworth	
378	Barnawartha-Browns Plains	
381	Browns Plains-Chiltern	
382	Broadford-Flowerdale	
383	Tallarook-Whiteheads Creek	
384	Seymour-Tooborac	
391	Kialla-Congupna	
511	Mansfield-Warburton	
516	Yarck-Koriella	
517	Benalla-Tolmie	
518	Barjang-Mansfield	
519	Mirimbah-Mount Buller	
521	Mansfield-Wangaratta	
522	Wangaratta South-Gapsted	
523	Laceby-Wangaratta	
524	Murmungee-Beechworth	
525	Beechworth-Stanley	
526	Myrtleford-Buffalo River	
527	Myrtleford-Baranduda	_
528	Yackandandah-Dedarang	_
529	West Wodonga	

Page 60 of 73

APPENDIX B Listing of "C" Roads continued

531	Bandiana-Falls Creek
532	Woragee-Yackandandah
533	Tangambalanga-Staghorn Flat
534	Ovens-Running Creek
535	Porepunkah-Mount Buffalo
536	Germantown-Tawonga South
537	Tangambalanga-Eskdale
541	Ebden-Bonegilla
542	Bethanga-Granya
543	Tallangatta-Omeo
544	Mitta Mitta-Dartmouth
545	Omeo-Nariel Valley
546	Bullioh-Towong
547	Walwa-Shelley
548	Cudgewa-Tintaldra
724	Healesville-Kinglake West
725	Whittlesea-Yea
727	Greensborough-Wallan
746	Wattle Glen-Kinglake

APPENDIX C See separate Map Document

Page **62** of **73**

APPENDIX D TIRES Priority Road Upgrades 2013-15

	_		
Burnwye-Kortong Rá (mid)	Towong		
Burnseye-Kostong Rd (str)	Towning		
		Shoulder widening and delineation - and 1.5 km.	6.565
Myers Creek Rd	Murrededi		\$215,000
Churchil Avenue	Apen	Asphalt overtay 1000 m long x 7m ends for urban street	\$270,000,00
Running Creek Kancoonah 2 (IFVMC)	Ареж	Shoulder construction and seeing for curves (1.5 km), certire line marking	\$71,280.00
Mornes Cheek fild upgrade and seed 1.7 km	Apre	Rephaset 1.7 km x 6 m x 100 mm depth payement and 4.0 m width seas	\$245,000 00
Franch-Wrights Rd., Tallanguitta East	Apre	Recticed 1.3 km s 300 mm digth pavement and 1.0 km 4.0m-saul	\$102,600,00
Bullato River Rd 5 (Dam BW)	Apose	Shoulder contraction and sealing for curves (3 km), certite line marking quiedrale to bridge cultert 2 x 40 m langth	\$151,260.00
Spring Cross 3	Maristeld	Winter access requested	\$55,000
Spring Creek 2	Manafeld	Witter access requested	\$55,000
Avondere Rd	Towing		
Running Crook (off Mr.) ares Lame)	Apria	300 m x 4m seet for dust suppression with 100 mm resheet. Intersection bell mouth breakness	\$44,280.00
D. Dif Low, F Res.	Toering		
Merroscinds Rd	Marrideo	Rephoel and seal 1.4 km of shoulder 1.5 m wide. Bench out corners to increase paleoment width and legisli distance for a further 2 Own.	\$545,000
Latin Guthilo - Castoos Rd	Wangurata	Road upgrade (including retriebilitation and widening) and easi	\$342,000
Rissia Rainer Rist	Wangarata	Road ingrade (industrig rehybitation, wideling and improved geometry)	\$236,000
Soon Mountain Rd	Michell	Sealing of existing road pavement.	\$243,210
Rubicon Rd	Maredod	Notes to period to 2017	\$0
Old Melbourne Rd	Marredno	Repliced and seal 1.1 km of road and slewider. Bench out corners to ecrease paverned width and sight distance.	\$181,000
Liceáis Rd (Shew)	Marishad	Upgrade and seal	\$9.350,000
Sendy Crosk Rd. Wales	Tokong	Wildow and restreet 3.7km	\$148,000
Morroon (MY-0 9)	Apre	Asphall overlay 900 m long # 5 2 m sede	\$210,600.00
Spanisko	Marvided	Widen corners, restrape, widen and restreed 3.5 km of road and shoulder	\$436,000

Page **63** of **73**

APPENDIX D TIRES Priority Road Upgrades 2013-15

Ross Lin , Curgosee	Toward	HVP to construct access on environment	
		Name in period to 2017	
Plantation Rd / Andorson Lane.	Munyadada		\$12
Main Mountain Rd	Mischell	Switing of existing road povement	\$200,850
Hampenstalls Rd (Intersection of Mulmy Valley Highway), Stelliny	Towns	Saud Hitnespellion	\$8,000
Wellpoon Rd. Koetong	Towara	Widen and restreet 5 0km	\$180,000
Ranco Ro. Tirded a	Towong	Widen and resheet 5 Octs	8195,000
Scots Creat Rd	Mirrodedi	Reseal first 370m. None on balance in period to 2017	\$60,000
Meson's Rd, Hurdle Flat Rd, Chambeyton Rd	Indigo	Seek pawersect, line marking, goode posts	\$305,959.50
Roberts Bridge: Berningsmis	Towoog	Replace bridge supershurture	\$105,000
Hue Ringe Rd	Mureodedi	None in period to 2017	50
Atrichiels Rd	Benefit	Re-construct and stabilitie gravel powersed.	\$35£ 000 00
Maleseorth - Dropmone	Murandedo	Resheat and seel 16.6 km	\$2,450,600
Tirreletion Rd., (bullout)	Faircong	Replace bridge and resheef road 1 Skin	\$220,000
Bullencop Rid	Mensileki		\$170,500
Price Hith Rd , Cudgewe	Towong	Widen and restrict 1 tion	\$60,000
Distrijon Rd	Becala	Re-surface road (5 km s 6.2 m = 37,200 m2)	81,000,000 0
Datrisin Rd	Berinta	Resurface road (1 km s 6.2 m = 6.200m2)	\$200 000 00
Daves Rd	Benefit	Resurface rood (4.2 km + 6.2 m = 26,040m2)	\$500,000,00
Mi Mergeret Rd	Muninded	Finel Soid 2 52 km	\$390,000
Calleghams Creek Rd. Dertimath	Tewong	Replace bridge and realign road	\$225,000
Prins Google Bay	Manshest		809.550
Fridays Lane Bonne Over 3730	Mensheet		\$330,000
Lady Tebel Rd	Murrordedi	Resheld and soal 2.5 km	\$300,000
Myles Rd	Mutnindarde	Rephast and soul 2.5 km	\$390,000
Old Bonnie Doon 3 (G-P)	Strehboger		1253,627
Spring Creek 1	Mansheld		\$51,000

Page **64** of **73**

APPENDIX D TIRES Priority Road Upgrades 2013-15

Spring Creess 1	Manshing		\$55,000
Bostock Rd	Boruka	No contract and idebtus grassi passensor	\$350,000.00
Mr Almod Rd , Mr Alfred	Towong	More readgreened and rephosit 5 Okto	\$220,000
Did Grenya Hd , Grenya	Timony	Widow and restined 1.0km seaf 0.3km	\$80,000
Yatios flui	Towneg		
Old Boonse Davie 2((Si-B))	Strathbage	No Work Regured	50
(Stylena	Muritainti	Richard and sout 7.2 km	\$1,140,000
Maintengoon Hal	Municipal	Rieshwall and said 5 6 ten	\$1,090,000
Annendale - Cooks Rd Wallich	Towarg	Moor realignment and reshoot 1 Nm	\$72,000
tipur Re	Michael	Safety improvements (grand retarg)	\$304,190
Serwage Rid	Municipal	None in period to 2017	50
Cannoireanie Rib	Mechan	Smiling of existing road polesment	\$248,230
Lacyania Rd.	Towns		
Samuel (G-McD)	Strathtogia	No Work Required	\$0
		Total o	\$24,567,297

Page **65** of **73**

APPENDIX E FREIGHT SURVEY FORMATS

Page **66** of **73**

HUME PLANNING FOR FREIGHT PILOT FREIGHT OWNER SURVEY

			INCIG		IVER 30	RVEY					
COMP	ANY NAM	E:			19	CONTAC	TNA	ME:			
POSIT	ION TITL	E:									
	Pallowed) Dry bulk Liquid bulk Non-bulk/ Palletised Containers	parcel freight reight	ntainers 40 foot conta		sported	domestic	ally?	(ticki	ng mo	ore th	nan one
	percentage y your cor Road Rail		most com		ode/ or	modes of	dome	estic I	freigh	t trai	nsport
	etter und	ipping ase specify erstand the fi			% ge busin			he re	gion,	pleas	e assis
3) To I	Coastal sh Other, ple	ase specify erstand the fi		ks of lar	% ge busin			he re	gion,	pleas	e assis
3) To I us in Id i) Outb	Coastal sh Other, ple petter und dentifying	ase specify erstand the fi	f freight n	ks of lar	% ge busin y your c	ompany:		he re	gion,	pleas	e assis
3) To I us in i i) Outb The siz TEUs	Coastal si Other, ple Detter und dentifying ound freight	ippingase specifyerstand the fithe volume o	f freight n	ks of lar	% ge busin y your c	ompany:		he re	gion,	pleas	
3) To I us in io i) Outb The siz TEUs The nu	Coastal si Other, ple Detter und dentifying ound freight e of your comber of cou	ipping	of freight n	% of lar noved b	ge busin y your c	ompany:		he re	gion,	pleas	
3) To I us in i i) Outb The siz TEUs The nu	Coastal si Other, ple Detter und dentifying ound freight e of your comber of cou	ipping	of freight n	% of lar noved b	ge busin y your c	ompany:		he re	gion,	pleas	
3) To I us in i i) Outb The siz TEUs The nu Key de	Coastal si Other, ple Detter und dentifying ound freight e of your comber of cou	ipping	of freight n	% of lar noved b	ge busin y your c	ompany:		he re	gion,	pleas	
3) To I us in io i) Outb The siz TEUs The nu Key de	Coastal si Other, ple Detter und dentifying ound freight e of your co mber of cou stinations b	ipping	estic outboo year ostcodes (f	% s of lar noved b	ge busin y your c	num a list)		he re	gion,	pleass	
3) To I us in io i) Outb The siz TEUs The nu Key de ii) Inbo	Coastal si Other, ple Detter und dentifying Dound freight e of your co mber of con stinations b und freight e of your co	ipping	estic outboo	% s of lar noved b	ge busin y your c	num a list)		he re	gion,	pleas	tonnes

Page 67 of 73

iii) Exp	port/ Import freight	
	umber of containers imported by your company 20 ft	
	40 ft	
	401.	
The ni	umber of containers exported by your company 20 ft	
	40 ft	
	you give us an estimate of the growth your company can expect in future freight ntage)?	volumes (as a
% Cha	nge ± 1 – 3 years	ars %
5) In y	our opinion, rank the priority areas in which freight could be supported by council	s?
Rank	in order of importance: 1 = Very important; 7 = Least important)	
	Local road upgrades to enable Higher Mass Limits (HML) vehicles	
	Bridge upgrade on local road	
•	Faster approvals for heavy vehicle permits	
•	Improved development facilitation	
•	Greater improvements in safety standards	
	Protection of freight places/buffering.	
•	Account of the March State of the Control of the Co	
	Communication with residents	
	Other. If so, please specify	
5) Any		
5) Any	Other. If so, please specify	
6) Any	Other. If so, please specify	
6) Any	Other. If so, please specify	
6) Any	Other. If so, please specify	
	Other. If so, please specify	
Would	Other. If so, please specify other comments? you like to be sent a copy of the report findings? Yes	
Would	Other. If so, please specify other comments? you like to be sent a copy of the report findings?	
Would	Other comments? you like to be sent a copy of the report findings? Yes No	email address:

Page 68 of 73

Your feedback has been valuable and much appreciated. Thank you for your time.

Please mail or email a completed PDF copy to:

ADDITIONAL INFORMATION (Optional question)

If you are aware of the specific routes your company's freight travels on

- i) Help us identify which roads in the region are commonly used when transporting freight in your business
- ii) Indicate the impediments experienced; and
- iii) Indicate tonnage upgrades you would you like to see for the key routes you currently use

ROAD	SPECIFIC SECTION	IMPEDIMENT	TONNAGE INCREASE
e.g. Soldiers Rd Barnawartha Yackandandah-Wodonga Rd	Hume – MV Hwy Yackandandah township	Pavement width Narrow bridge for tankers	To 75T 77T

Note: You may prefer to mark up a local map

Your feedback has been very valuable and much appreciated. Thank you for your time and patience.

Page 69 of 73

Feedback From for Transport Companies in Hume Region

Introductory information, followed by

- Fleet size and equipment type: e.g. xxx prime movers and xxx trailers; xxx b-doubles; xxx rigids; xxx reefers; pig/dog combinations etc. Do you have any side loaders?
- Destinations and routes most commonly covered in the Hume region? This covers Wodonga, Wangaratta, Towong, Indigo, Benalla, Moira, Shepparton, Mansfield, Murrindindi, Mitchell, Strathbogie and Alpine.

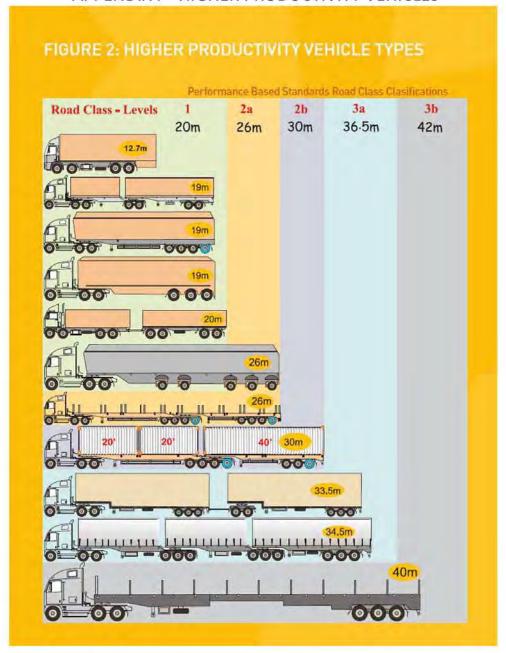
Thinking of the first and last mile controlled by the local council

- What facilities/infrastructure would you like to see provided? E.g. longer parking bays near CBDs; rest areas; sealed shoulders; passing lanes etc
- 4. What intersections/road segments most concern you from a safety and time perspective on the local network? On the VicRoads arterials? E.g. bridge weight limit on access road/poor geometry of roundabouts?
- Advice you would give to councils as a business in the region? E.g. faster permit process; improved facilitation of planning permits; come out and visit, better communication from council.

Page 70 of 73

HUME REGION PLANNING FOR FREIGHT PILOT

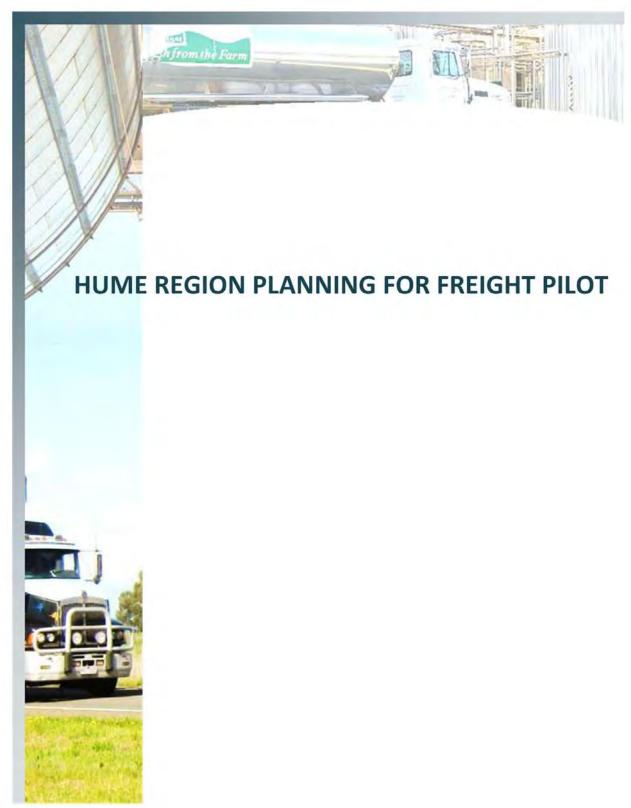
APPENDIX F HIGHER PRODUCTIVITY VEHICLES



Page **71** of **73**

HUME REGION PLANNING FOR FREIGHT PILOT

Page **72** of **73**



Page **73** of **73**

Hume Regional Development Australia Committee

Freight Directions in the Hume Region Summary Report







This report: has been prepared by GHD for Hume Regional Development Australia and may only be used and relied on by Hume Regional Development Australia for the purpose agreed between GHD and the Hume Regional Development Australia as set out in this report and in line with the authorized DPCD Agreement for Provision of Services (August 2012).

GHD otherwise disclaims responsibility to any person other than Hume Regional Development Australia ansing in connection with this report. GHD also excludes implied warranties and conditions, to the extent legally permissible.

The services undertaken by GHD in connection with preparing this report were limited to those specifically detailed in the report and are subject to the scope limitations set out in the report.

The opinions, conclusions and any recommendations in this report are based on conditions encountered and information reviewed at the date of preparation of the report. GHD has no responsibility or obligation to update this report to account for events or changes occurring subsequent to the date that the report was prepared.

The opinions, conclusions and any recommendations in this report are based on assumptions made by GHD described in this report. GHD disclaims liability arising from any of the assumptions being incorrect.



Table of contents

1.	Intro	Introduction				
	1.1	Purpose of this report	1			
	1.2	Project Background	1			
2.	Strat	egic Directions for Hume	2			
	2.1	The Goal	2			
3.	Freight impacts on the region's public transport.					
	3.1	Wodonga Passenger Rail Impacts	21			
	3.2	Shepparton Passenger Rail Impacts	21			
	ure 1	The Hume Region				
Fig	ure 1	The Hume Region	1			
Fig	ure 2					
Figure 3		Hume RDA Freight Directions				
Fig	ure 3	Hume RDA Freight Directions Existing Rail Network indicating rail gauge	3			
	ure 3 ure 4		5			
Fig		Existing Rail Network indicating rail gauge	5 9			
Fig:	ure 4	Existing Rail Network indicating rail gauge Heavy Vehicle, comparative lengths	3 5 9			
Fig Fig	ure 4 ure 5	Existing Rail Network indicating rail gauge Heavy Vehicle, comparative lengths. Key road network in the Hume Region.				
Fig Fig Fig	ure 4 ure 5 ure 6	Existing Rail Network indicating rail gauge Heavy Vehicle, comparative lengths Key road network in the Hume Region Existing East West Connections in Hume	39911			

1. Introduction

1.1 Purpose of this report

GHD has been engaged by Department of Planning and Community Development (DPCD) on behalf of Hume Regional Development Australia (RDA) Committee to provide a concise, high level strategy document which will enable the committee to confidently engage with the Commonwealth and State governments, local government authorities and key stakeholders. The key aim of the project is "to develop strategic directions for freight that can be used to attract investment in the Hume region."

The report summarises key directions and benefits which are available through changes in the Hume region. Additionally the report provides high level commentary on the impact of the freight directions on the passenger network.

1.2 Project Background

The Hume region (illustrated in Figure 1) covers north east Victoria and the Goulburn Valley and extends over 40,000 square kilometres from the northern boundary of greater Melbourne in the south to the Victorian border in the north. To the west of the Hume Region is the Loddon Mallee Region which includes Bendigo, and to the east and south east is the Gippsland region. The region to the north includes the Riverina area of New South Wales which also has many key links and similarities to the Hume Region.



Figure 1 The Hume Region

The Hume Region contains a total of twelve local government areas. It is geographically diverse as it includes Victoria's alpine areas, farming communities, the regional cities of Wodonga, Wangaratta and Shepparton and regional centres of Benalla and Seymour.

2. Strategic Directions for Hume

The Hume Region has a number of opportunities to grow and develop, with the need to align industry outputs and general population growth with freight transport needs to provide efficient supply chains and support industry growth. Parts of the region have recently been through a period of drought and economic downturn where the region's strong horticulture/agriculture and food processing outputs have been reduced with significant impact on the region. Better conditions are now providing a foundation for growth and development around adjustments made during difficult times.

To ensure the strategic directions are relevant to the region and aligned with state and Commonwealth policies and directions, a key goal was developed to guide the process and focus freight directions towards outcomes which would provide benefits in the Hume region, in particular freight managers and customers and support improvements on key high use arterial corridors such as the Hume Freeway.

2.1 The Goal

The goal for the development of strategic directions has been set as the following:

"To maintain and improve the efficiency of the transportation of freight across all modes in the Hume region in order to support continued sustainable economic development."

Examination of recent changes and trends within industry and the freight market in the Hume region have led to a number of key strategic directions on which planning for development of freight can occur within the region. Four key drivers of change, support the goal and the development of Freight Directions as shown in Figure 2.

These directions seek to address key opportunities for improvement and development which can provide a framework for the identification of key freight nodes now and in the future. Collection, consolidation and distribution of freight can be configured to achieve efficiencies, while taking new development away from general residential and other areas where amenity may be impacted.

The directions included in Figure 2 and discussed in the following sections provide a high level summary of the actions that the Hume RDA committee can take forward to support the development of freight across the Hume region. Further details and actions for the partners to achieve the directions are presented in the accompanying detailed Freight Direction in the Hume Region report. The directions provide a framework on which further detail of specific projects can be assembled to support the regional growth directions.

Facilitate industry support for **Building the** rail gauge standardisation in the Work capacity of the Hume Region Promote opportunities to with Hume Freight develop the region's national Network partners road corridors In collaboration with partners explore the development of a consistent heavy vehicle road network for the Humeregion Policy linked to NSW Promote development of the secondary road corridors and network connections Regional Development Support further development of Advocacy Supporting the the Region's Intermodal terminalnetworks development of regional freight Advocate for a clear policy for opening and closing lightly used facilities raillines Facilitate the development of Supporting a Integrated land use and freight Facilitate planning (i.e. advocate for freight and logistics precincts in planning the region) framework that Seek further assessment of the takes account of Melbourne/Brisbanerail linkthe Hume Region clarifying regional growth opportunities and connections. Strategic Directions Actions Strategies

Figure 2 Hume RDA Freight Directions

Strategic Direction One - Building the Capacity of the Hume Freight Network.

There are two key strategies:

1.1 Facilitate industry support for rail gauge standardisation in the Hume Region

Context

Standard gauge rail track is used for the national rail network and provides flexibility and common requirements for rail operators.

The Goulburn Valley, Tocumwal, Echuca and Deniliquin in southern NSW are located on Victorian broad gauge rail restricting broader access and limiting the scope of operators.

Rail operators provide limited resources and investment to the broad gauge network particularly regions with variable freight volumes (e.g. grain).

The rail corridor north east of Seymour was recently converted to standard gauge to facilitate additional capacity on the national link.

The main driver for conversion is improvement in access for rail operators, a basis for investment and increased competition for rail freight.

Conversion of the Goulburn Valley line to standard gauge also impacts the regional passenger services with a need for alterations to rolling stock, standard gauge capacity and passenger train stabling within the Melbourne area.

Benefits

The potential benefits for pursuing this strategy are:

- Increased opportunity for competition on rail within the Hume region (with increased focus on the Goulburn Valley line). Flexibility for rail operators across the broader network and potential growth in rail use.
- A network on which supports investment in equipment and strengthens connections for the Hume region to its markets.
- Greater ability to connect directly to the interstate network which improves efficiencies and provides for more direct movements on rail to the north.
- After the relocation of the Dynon Terminals there will be capacity within the freight network to accommodate for increased freight access to the port precinct and passenger volumes within Melbourne.

Hume

RDA Actions

The key actions for the Hume RDA to pursue for this strategy are:

- Promote rail standardisation in the Goulburn Valley to support growth and economic benefits along with connecting to the potential development of the Melbourne–Brisbane inland freight line.
- Support the investigation of current limitations of Standard and Broad gauge access to Melbourne to clarify key elements required for a conversion of the Goulburn Valley rail tracks to standard gauge operations.

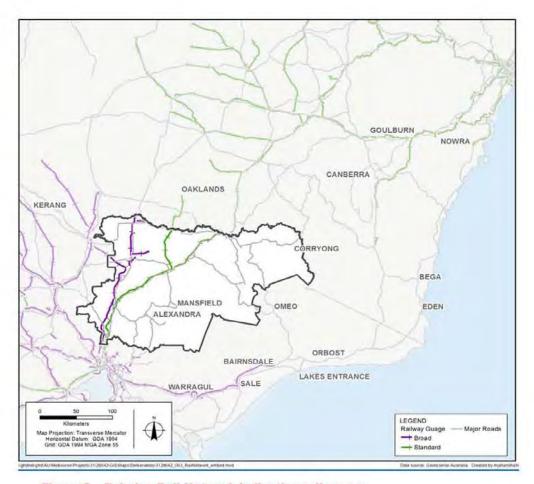


Figure 3 Existing Rail Network indicating rail gauge



1.2 Promote opportunities to develop the region's national road corridors.

Context

The Hume Highway corridor provides the principal link between Melbourne, Sydney and regional NSW with the highest freight volumes. The Goulburn Valley Highway provides the key link between Melbourne and Brisbane. Traffic volumes are increasing on both highways.

High Productivity Freight Vehicles have been trialled on the broader road network and scoping is underway for a trial on the Hume Freeway.

The Goulburn Valley/Newell Highway is progressing development towards a dual carriageway connection to the NSW border region. The Nagambie Bypass will soon be open bringing additional efficiencies and access closer to Shepparton.

Some development of additional rest areas and fatigue management facilities on these highways is underway to improve safety.

Benefits

The potential benefits for pursuing this strategy are:

- Improved freight efficiency on higher quality roads providing national connections on the relevant heavy vehicle networks.
- Enhanced connections between the Hume region and northern adjoining regions, providing opportunity for flow of freight and integration with Freight and Logistics Precincts (FLP's) in the Hume region.
- Duplicated highways provide options for higher capacity vehicle access with lane segregation for safety.
- Continuity of higher capacity vehicle capabilities for road vehicles along major corridor routes reducing trailer drops and enhancing efficiency.
- A reduced number of trucks on roads due to capacity improvements.
- Improved access, safety and connections to ports and major freight nodes via the key Hume corridor.

Hume

RDA Actions

The key actions for the Hume RDA to pursue for this strategy are:

- Continue to promote the development of capacity improvement options which support national and local efficiencies including the connection to LOGIC facilities and the Shepparton Bypass.
- Advocate for the continued development of additional rest areas incorporating trailer exchange locations on the Hume and Goulburn Valley/Newell corridors.





Strategic Direction Two - Improving freight efficiencies within the Hume Freight Network

There are two key strategies:

2.1 In collaboration with partners explore the development of a consistent heavy vehicle road network for the Huma region linked to NSW.

Context

Inconsistencies in road vehicle regulations have existed between states and adjoining regions due to state based approaches and policies.

A National Heavy Vehicle Regulator is being introduced in January 2013 with the aim of consistent regulation of heavy vehicles in all states.

A Performance Based Standards (PBS) scheme which alters the focus of heavy vehicle assessment to performance based criteria has been introduced by the National Transport Commission (NTC).

State based road authorities and local councils will retain responsibility for the access of heavy vehicles to roads they manage.

Councils and road authorities are developing clearer definition of the Heavy Vehicle Network which can be utilised by industry.

Consistency of approach for heavy vehicle users across northern Victoria and NSW is essential in order to support value add and supply chain productivity. Infrastructure Australia has recommended a trial of High Performance Freight Vehicles on the Hume Freeway.

Benefits

The potential benefits for pursuing this strategy are:

- Consolidated heavy vehicle usage in agreed areas of municipalities and major roads.
- Greater focus for maintenance programs and the upgrade of relevant truck routes.
- Promotion of the use of higher productivity vehicles on appropriate infrastructure.
- · Reduces overall carbon emissions.
- Consistent approaches which provide an integrated network for the use of higher capacity and PBS approved vehicles.
- Improvements in amenity for residents with more defined heavy vehicle routes.

Hume

RDA Actions

The key actions for the Hume RDA to pursue for this strategy are:

- Advocate with partners for the development of a consistent approach to the development of a heavy vehicle road network in the region, inclusive of communication with councils in Victoria and Southern NSW.
- Identify and advocate for the upgrade of a defined heavy vehicle network (road and rail networks) for higher productivity travel between key freight nodes.

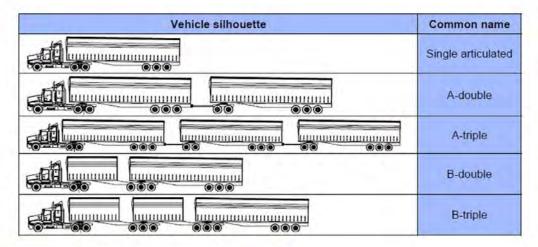


Figure 4 Heavy Vehicle, comparative lengths

(Source: AustRoads - Design Vehicles and Turning Path Templates, 2006)

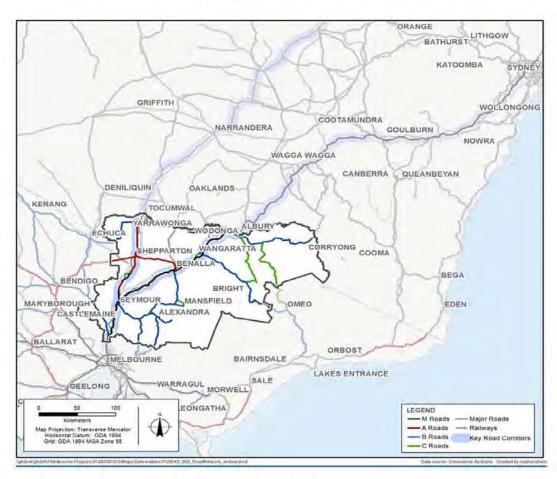


Figure 5 Key road network in the Hume Region

2.2 Promote development of the secondary road corridors and network connections

Context

Industry and freight movements in the Hume region are highly visible on the main north south corridors however the movements on east west connections are also substantial and feed to the main north south corridors. These links include:

- The Midland Highway from Benalla through Shepparton to Bendigo.
- . The Murray Valley Highway from Wodonga's east along the Murray River.
- The Northern Highway from Echuca to Kilmore and Wallan.
- The Maroondah/Melba Highway from Benalla to the east of Melbourne.
- Kiewa Valley Highway from Wodonga to the snowfields.

These highways connect industry to the major corridors and need development at key connection and traffic points.

Likely secondary corridor needs in the Hume region include:

- Development of the LOGIC centre at Barnawartha leading to changes on the Murray Valley Highway through increased concentration of heavy vehicles and the new fatigue management centre.
- East west truck traffic through the Shepparton urban area is the subject of significant delays requiring improvements to Midland Highway links through the area. Partial construction of the Shepparton bypass could assist
- Links from the west to the future Shepparton bypass can provide an alternative to the Northern Highway which has limited access through towns and will require road improvements for much of its length.
- Further development of efficient connections to key employment precincts at regional centres along the Hume Freeway.

Benefits

The potential benefits for pursuing this strategy are:

- · Improved access to and through major regional secondary road links.
- Future efficient access from the north west of the region to link with the proposed Shepparton Bypass and provide a 110 kph highway to the Melbourne metropolitan area.
- Improved amenity, safety and maintenance efficiencies at the key junction points along corridors.
- Relevant connections for the enhanced LOGIC facility and improved access on the Murray Valley Highway.

Hume

The key actions for the Hume RDA to pursue for this strategy are:

RDA Actions

- Promote secondary road corridor improvements in key areas which support regional development (e.g. LOGIC, regional city industrial developments, GV Link linkages and the Midland Highway access through Shepparton).
- Advocate for improvements to other secondary connector roads to the main national North South Corridors. Include links to the Shepparton

- Bypass from the west as an alternative to the Northern Highway.
- Advocate for a local government freight improvement package (localised roads) for the Hume Region.

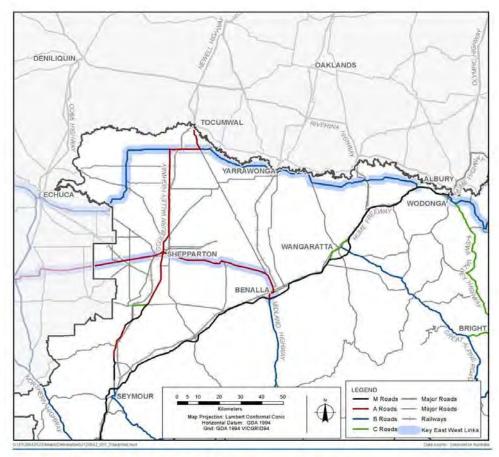


Figure 6 Existing East West Connections in Hume

Strategic Direction Three - Supporting the development of regional freight facilities

There are two key strategies:

3.1 Support further development of the Region's intermodal terminal networks

Context

- A number of intermodal (rail/road) terminals operate around Victoria and NSW providing supply chain links to the ports for exports.
- An intermodal terminal exists in the Hume Region at Mooroopna with further planning in place for the existing LOGIC intermodal terminal and the GVLink terminal (likely to replace the Mooroopna site). Additional freight/rail terminals currently operate just outside the Hume boundaries at Tocumwal, Ettamogah and Deniliquin.
- Poor seasons and some industry relocations have impacted services. Efficiency improvements and community benefits will occur with increased regularity and reliability of services.
- The current broad gauge network which operates in the Shepparton area restricts the options for flexibility and ramping up and down to meet market needs.
- Options exist for a future terminal at Mangalore adjacent to the airport site given its location next to the Hume and Goulburn Valley Highways. Linked with further business development this site could contribute to unlocking and revitalising Seymour's economy.
- Feasible to explore the creation of a network of FLPs in the future at Beveridge, Benalla and Wangaratta based on demand.
- Intermodal terminals and FLP's form examples of "freight places" in the National Freight Plan which should be connected as part of a national freight network.
- The use of intermodal terminals supports the planning objectives of consolidation of freight and land use planning objectives in line with state and national governments' policy agendas.

Benefits

The potential benefits for pursuing this strategy are:

- Reduced road traffic and use by heavy vehicles.
- Improved environmental outcomes by use of rail.
- Further fit to freight planning and consolidation objectives.
- Reduced road maintenance and increased road safety.
- Improved freight movement and safety both within the state and interstate.

Hume

RDA Actions

The key actions for the Hume RDA to pursue for this strategy are:

- Support advancement of the major intermodal terminals in the region.
- Promote planning for a network of Intermodal terminals within the region.
- Advocate for the inclusion of intermodal terminals and freight and logistics precincts into the National Freight Network.

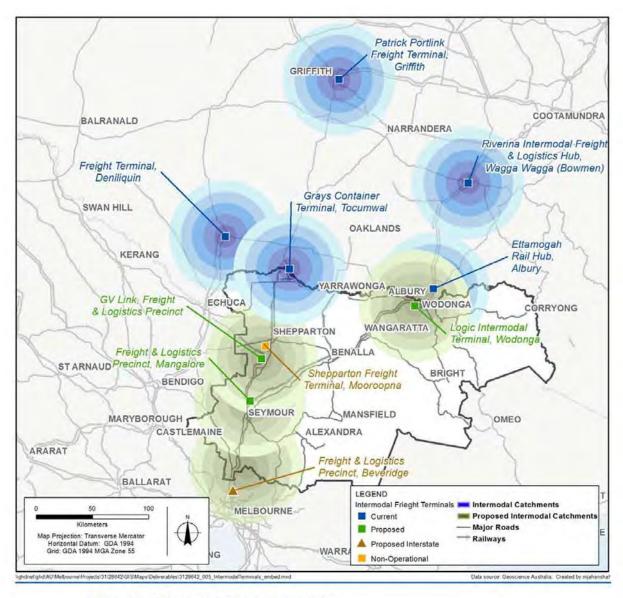


Figure 7 Intermodal Freight Terminals

3.2 Advocate for a clear policy for opening and closing lightly used rail lines

Context

The Hume region has rail spur lines, used for grain which are closed due to poor seasons and limited output.

Closed rail spur lines include the line from Toolamba to Echuca and the Dookie line which branches from Shepparton to major grain facilities.

As better seasonal conditions have returned demand for the use of both of these lines has increased to a level where industry wishes to utilise the asset. There is a need for upgrade maintenance to be undertaken to return these lines to active service.

There is a need for certainty from industry as to the viability and opportunity for use of these lines and the connectivity and benefits they provide. Industry needs a known mechanism and cost for reopening these vital links.

Benefits

The potential benefits for pursuing this strategy are:

- Certainty for industry in the provision of transport mode share opportunities and potential cost reductions.
- Clarity over when rail lines will be open and shut and therefore allow for efficient industry planning.
- · Increased mode share of rail.
- · Reduced road usage and carbon emissions.
- · Reduced road maintenance costs.
- · Opportunity for additional rail usage opportunities.

Hume

The key actions for the Hume RDA to pursue for this strategy are:

RDA Actions

- Seek discussion with Industry to understand their long term needs for closed rail lines and best transport solutions.
- Hold discussions with DoT with a view to seeking policy change for the reopening of closed lines including funding arrangements.

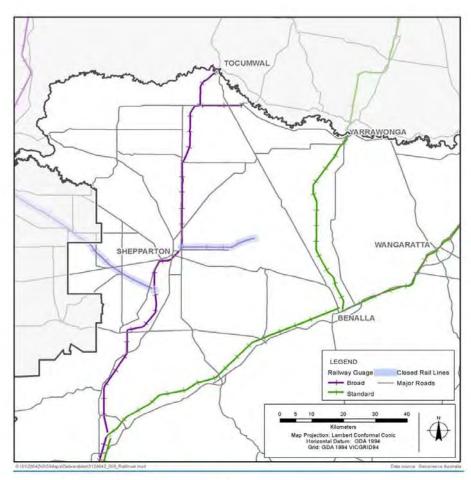


Figure 8 Rail Network - Closed Links



Strategic Direction Four - Supporting a policy and planning framework that takes account of the Hume Region

There are two key strategies:

4.1 Facilitate the development of integrated land use and freight planning (i.e. advocate for freight and logistics precincts in the region)

Context

The Hume region produces approximately 25% of Victoria's agricultural products and significant manufactured products.

The Freight Logistics Precinct concept provides for freight and logistics activities to take place within the one area. Industry may also be part of freight precinct development with warehousing and staging of freight.

Support facilities such as fatigue management centres and trailer interchanges can also be incorporated into a FLP.

A FLP consolidates freight in one place and allows for efficient consolidated movements which reduce the overall number of trips.

Integrated land use planning and FLPs move amenity issues away from residential areas.

Benefits

The potential benefits for pursuing this strategy are:

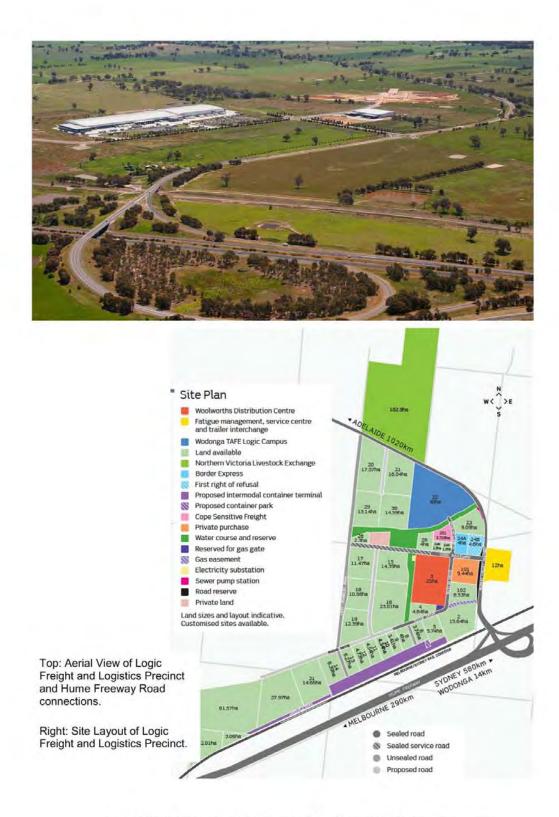
- A plan for consolidation and processing of products within the Hume region will provide links to other regional industries. LOGIC which is well progressed and a future GV Link may be supplemented by FLPs at other locations such as Mangalore, Wangaratta/Benalla and Beveridge (in the longer term).
- Positive land use planning outcomes and improved amenity for residents in regional towns and cities.
- Reduction of truck movements in residential areas and reduced road maintenance costs.
- More efficient supply chains through larger vehicle access with minimised impacts and improved safety.
- Reduced freight transfer costs and consolidation of freight places.

Hume

The key actions for the Hume RDA to pursue for this strategy are:

RDA Actions

- Collaborate and influence the development of a network of freight and logistics precincts based on LOGIC and GV Link in order to consolidate industry and freight activity.
- Support the land use planning aspects of these precincts which provide significant benefits in efficiency, cost and amenity.



Hume Regional Development Australia Committee - Freight Direction in the Hume Region 17

4.2 Seek further assessment of the Melbourne/Brisbane rail link – clarifying regional growth opportunities and connections.

Context

- Planning for the future alignment of a Melbourne Brisbane inland rail link is progressing with opportunities for freight efficiencies and increased rail mode share.
- Current rail freight between Brisbane and Melbourne travels through Sydney and is the subject of delays caused by curfews for passenger traffic in the Sydney metropolitan area.
- The preferred option at this stage has been identified as via Albury and Junee along the existing national rail corridor. This provides access for current rural and significant manufactured goods along this corridor.
- An alternative option is a route through Narrandera and Tocumwal with direct connections between the Riverina, the Goulburn Valley and the Melbourne area, including its ports.
- Evaluation of the regional economic and social growth prospects is required for an inland route linking the food bowl and manufacturing areas of Victoria, NSW and their markets.

Benefits

The potential benefits for pursuing this strategy are:

- Improved connections for the Hume region on the interstate rail connections.
- An inland route linking the food bowl and manufacturing areas of Victoria, NSW and their markets may provide increased benefits to the nation.
- Further evaluation of opportunities for growth and connectivity generated by the development of an additional national link which will in itself generate development along its length and opportunities to use this link into northern states.
- A basis for development of standard gauge access linking both northwards and south to the Melbourne area to improve access and transit times. This benefit is also a key outcome outside of the Hume region as locations such as Griffith would obtain easier, more direct and faster access to the ports.

Hume

The key actions for the Hume RDA to pursue for this strategy are:

RDA Actions

- Work with other regional RDA committees and Government to highlight and promote the benefits which may be available for business should the Melbourne-Brisbane Freight line be constructed through the food bowl areas of Victoria and NSW.
- Seek further assessment of potential growth and development benefits which could be generated by the Melbourne to Brisbane rail line along specific alignment options. Consider connectivity of regions, economic and social benefits.

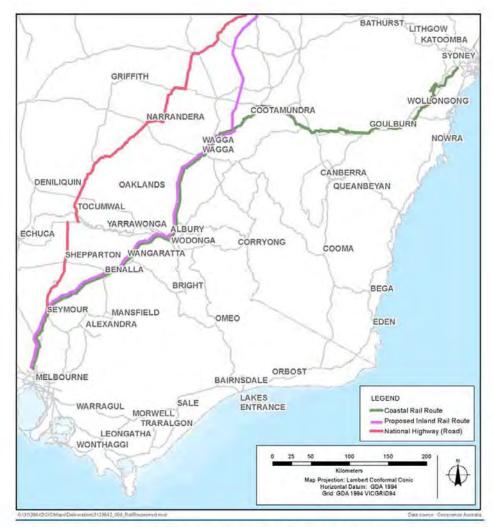


Figure 9 Melbourne to Brisbane Rail Line Alignment Options

Freight impacts on the region's public transport.

The current flows of freight within the region are concentrated on major road and rail corridors including the Melbourne/Sydney traffic and Melbourne/Brisbane options on the Newell corridor.

Road freight on major highways and roads across the region have limited impact on public transport as these highways are progressively separated from local traffic through bypasses and diversions from residential areas. Impacts are generally part of general traffic congestion at major intersections in around cities during peak periods.

Rail freight on the north eastern (standard gauge) rail corridor from Melbourne to Wodonga forms a significant part of the traffic volumes on the standard gauge tracks which now service this area. These trains generally carry intermodal shipping container traffic, steel, grains and other bulk products between Melbourne and Sydney and regional areas to ports.

The volume of traffic is high in key periods of the day (which vary along the corridor) but the rail corridor generally has significant latent capacity in regional areas. The major constraints on the corridor are in the Melbourne metropolitan area and at key junctions where the corridor interacts with freight movements in inner Melbourne, and the Dynon precinct. This area also carries trains from the Adelaide and Perth corridor and traffic is consolidated into two tracks which pass through a tunnel to the Dynon and port precinct. This precinct is constrained by the need to move trains constantly around and through a key junction (Sim St rail junction) breaking them into sections which can be handled in rail terminals with limited lengths. The reverse occurs on exit from terminals where shorter sections need to be joined to form 1500m and 1800m trains for departure.

This constraint limits the capacity of the rail corridor, particularly within peak periods in the morning and evening where no further capacity is currently available. Additional trains need to be moved to off peak periods where capacity exists.

The standard gauge corridor also carries interstate passenger trains from Sydney, Adelaide and three trains daily from Wodonga at the current time. While these public transport services are included in current schedules and capacity limitations, capacity constraints restrict further train paths during peak periods. Opportunities for any additional services would require use of off-peak periods where capacity is available.

In addition, standard gauge services on the Wodonga line have been based on a limited supply of standard gauge rail rolling stock (e.g. sprinter style vehicles) and these require maintenance and stabling facilities when not in productive service. Additional services may require extra rolling stock applied to the service with implications to maintenance and stabling facilities. Specific service times and allocation of schedules would be necessary to define specific requirements.

Wodonga rail traffic has also been constrained by the standard gauge network manager's ongoing works on the corridor to address track conditions which have been impacted by a change in sleeper type and the gauge conversion process. These works have extended beyond expected timeframes and directly impact schedules with speed restrictions and on track equipment slowing trains through work areas.

Potential cessation of services to accelerate these track works have been considered and may impact the region in the short term.

The Shepparton line remains on a broad gauge rail corridor as is the Seymour traffic. Regular intermodal container trains and grain trains operate on the corridor. Container traffic is

increasing with better seasons and the intermodal service may return to a daily service. The corridor carries three passenger trains from Shepparton to Melbourne each day with options for coach connections to Seymour for connections with Albury and the local Seymour to Melbourne services.

The use of the broad gauge for rail freight has been limited in recent years and the gauge difference potentially restricts greater use of the corridor for new rail freight entrants who need specific equipment and have limited certainty of tenure on which to base investment.

Future freight needs will be better managed if this rail corridor is converted to standard gauge, providing a wider access to train operators with flexibility to move their vehicles between this area and other rail lines throughout Australia. A key factor in this conversion is the need to align this process with an approach to capacity improvements and changes which can provide greater access through the Dynon precinct and to Southern Cross station. The current limitations in the Dynon area will not allow this change and forecasts of container traffic growth will worsen access opportunities based on the current trends.

Longer term changes which may relocate the Dynon rail terminals to the west of Melbourne to a new facility is likely to free up capacity in the area and provide additional access on the standard gauge corridor however there appears little opportunity for change while the terminals need to operate in the Dynon area.

3.1 Wodonga Passenger Rail Impacts

Wodonga Passenger rail traffic has train paths available on the standard gauge corridor and these will be maintained to service current needs. There is unlikely to be additional opportunity for peak hour access to and from the Melbourne area in either the morning or afternoon peaks (in Melbourne) however access should still be available if required in off peak periods. Additional passenger rail rolling stock may be required to fit this need as V/Line currently only has limited rolling stock available for standard gauge operations.

This can provide for additional services on the corridor however this needs to be aligned to the specific market needs and clarification as to whether additional off peak services meet this demand.

If additional capacity is required for peak access to Southern Cross station there may not be capacity during many periods of the day or week, consideration would need to be assessed on options for services which stop at Seymour or short of the city with a change to suburban or other V/Line trains.

Medium to longer term planning with the Department of Transport will need to be undertaken to ensure an appropriate service offering can be developed which caters for current and future expectations and a reasonable scope of operations aligned to demand within the region.

3.2 Shepparton Passenger Rail Impacts

The Shepparton area public transport rail interfaces with freight traffic have been limited over recent years with low volume freight services. The Shepparton line is not generally the subject of capacity constraints with train crossing points on a single line creating the main issues. The improved seasons have brought some additional rail freight services to the area and some further development changes are planned to signalling arrangements at Murchison East to increase capacity in this area. This should ensure the interface between passenger and freight trains is not the subject of delays.

The current services to Melbourne (on broad gauge) are subject to capacity constraints relevant to overall traffic into the Melbourne area and utilise metropolitan tracks in conjunction with metropolitan electrified services. Priorities are set for regional trains in the timetable but there

remain limited train paths during peak periods. The train path for Shepparton and Seymour trains does not allow access to the proposed regional rail link tracks to the north west of Melbourne so constraints within the current access remain.

Increased capacity for Shepparton trains on the broad gauge network competes with metropolitan priorities and increases in services would need to fit within the available metropolitan windows and align to departure times to and from Shepparton.

Alternatively, options for services which link to Seymour or suburban trains are an option for increased service provision from the Shepparton area. Coaches currently provide some options in this way. Rail services could be built around this concept if sufficient demand was identified but customers would need to change to other services to complete the journey. Additional rail rolling stock and possible train turn around capacity at relevant locations would be required but may be considered as a better option than coach services.

If the Shepparton rail corridor was converted to standard gauge similar constraints would exist as mentioned above for Wodonga traffic. V/Line may need to acquire additional rolling stock for standard gauge and planning will need to occur with the Department of Transport to ensure capacity exists through the key junctions to enable rail pathways at appropriate times. The potential relocation of the Dynon terminals with interstate traffic moving from the area provides one opportunity in future planning when capacity may become available.

GHD

180 Lonsdale Street Melbourne, Victoria 3000 T: (03) 8687 8000 F: (03) 8687 8111 E: melmail@ghd.com.au

@ GHD 2013

This document is and shall remain the property of GHD. The document may only be used for the purpose for which it was commissioned and in accordance with the Terms of Engagement for the commission. Unauthorised use of this document in any form whatsoever is prohibited.

www.ghd.com



Greater Shepparton City Council - Strategic Freight (HPV level 2A access) Network upgrades

Road No.	Road Name	Length (km)	From	То	Upgrade Required Point Location	Upgrade Required Road Length	Indicative Cost \$
M39	Shepparton Freeway Bypass	8.8	Midland Highway (west of Mooroopna)	Wanganui Rd		Nation Building Program Stage 1 - single carriageway	191,000,000
	North Shepparton Arterial (East-West) Link – between proposed Shepparton Bypass and Shepparton Alternative Route		Proposed Shepparton Bypass	Shepparton Alternative Route	To be determine by VicRoads Study	To be determine by VicRoads Study	TBA by VicRoads
C391	Shepparton Alternative Route (VicRoads), PBS upgrade		Goulburn Valley Highway Sth	Goulburn Valley Highway Nth	To be determine by VicRoads	To be determine by VicRoads	ТВА
	Florence St/Midland Hwy Intersection, PBS upgrade				Intersection		350,000
	Lockwood Rd/Midland Highway intersection upgrade, PBS upgrade				Intersection		250,000
	Orrvale Rd/Midland Hwy intersection upgrade, PBS upgrade				Intersection		250,000
	Midland Hwy - East Goulburn Main Channel Bridge widening				Bridge Widening. To be determine by VicRoads	N/A	TBA by VicRoads
R807002	Old Dookie Rd - Freight Impacted road upgrade	1.39	Shepparton Alternative Route	Lockwood Rd	Nil Installation of traffic signals at	Widening/ reconstruction of 1.4km of urban carriageway Widen and Reconstruct	950,000
R902036	Welsford St - Freight Impacted road upgrade	0.92	Midland Highway	Goulbourn Valley Highway	Nixon St	0.45km urban carriageway	1,629,000
R807007 R808038	Lemnos North Rd - Central Ave Link , PBS upgrade	14.4	Katamatite - Shepparton Rd	Midland Highway	Channel Bridge upgrade. Install approach barrier rail to bridge.	Widen/ rehabilitation of 1.2km of road	749,000
R808004 R808504	Victoria Rd - Katandra Main Rd Link, PBS upgrade	18.2	Goulbourn Valley Highway	Cosgrove Rd	Replace 2 channel bridges. Replace a major culvert. Install approach barrier rails	Nil	1,089,000
R808151 R808001	Bowey Road and Tallygaroopna West – Bunbartha Rd Link, PBS upgrade	7.45	Barmah - Shepparton Rd	Goulbourn Valley Highway	Install bridge barrier rails. Minor intersection upgrade	Widen/ rehabilitation of 7.5km of road	1,102,000
R010393	Arcadia Road – between GV Hwy and Euroa-Shepparton Rd, PBS upgrade	7.00	Goulbourn Valley Highway	Euroa-Shepparton Rd	Replace Channel Bridge. Minor intersection upgrade.	Widen/ rehabilitation of 7.0km of road	2,191,000
R010152	Merrigum-Ardmona Rd – between Byrneside-Kyabram and Tatura-Undera Rd, PBS upgrade		Byrneside-Kyabram Rd	Tatura-Undera Rd	Channel Bridge replacement. Install approach barrier rails on 2 bridges.	Widen/ rehabilitation of 8.12km of road	2,668,000
R010248	Toolamba - Rushworth Rd between Murchison-Tatura Rd and Mooroopna- Murchison Rd, PBS upgrade	8.44	Murchison-Tatura Rd	Mooroopna- Murchison Rd	Major Intersection upgrade. Install approach barrier rails on 3 bridges.	Widen/ rehabilitation of 8.4km of road	1,289,000
R010246	Dhurringile Rd - Tatura between Toolamba-Rushworth Rd and Midland Hwy, PBS upgrade	8.00	Toolamba-Rushworth Rd	Midland Highway	Nil	Nil	230,000
R010173	Ardmona Rd - between Midland Highway and Echuca Rd	8.79	Midland Highway	Echuca Rd	Install bridge barrier rails on 2 bridges. Minor intersection upgrade	Widen/ rehabilitation of 6.2km of road	930,000
	Trailer exchange/driver changeover point near Doyles Rd				To be determine by feasibility study by VicRoads/ Council		TBA by VicRoads
						Total	204,677,000

Attachment 4

Hume Region Planning for Freight Pilot

Mapping Heavy Vehicle Access to Local Roads

In October 2012 the MAV initiated workshops with councils to prepare Heavy Vehicle network mapping for B-Double and Performance Based Standard (PBS) class 2A vehicle access to local roads in the Hume Region.

The MAV consultant (CCT Management) coordinated three workshops with 12 Hume Region councils.

Each council provided GIS mapping data for B-Double approved routes which were consolidated into a regional freight route network plan. Councils identified cross boundary routes and established classifications for their network into:

- Arterial road routes.
- Strategic local road B-Double routes
- · Proposed strategic local road B-Double routes

In addition, further mapping was undertaken to establish freight impacted roads based on usage by particular industries. Greater Shepparton local roads were mainly impacted by dairy (milk tankers), horticulture (fruit transport) and manufactured produce transported to warehousing, Melbourne ports and retail outlets.

To assist councils to respond to the new National Heavy Vehicle Regulator (NHVR) a PBS Route Assessment Tool has been made available to councils to ensure consistency in assessing HPV access to local roads. As the road manager, Council has the responsibility to grant consent to PBS class 2A vehicles (and above) access to its local road network.

Heavy Vehicle National Regulations now apply in all states. From the 10 February 2014 applications for B-Double (PBS class 2A vehicle) permits on local roads will be coordinated through the NHVR. The council has appointed a contact officer to be responsible for receiving and assessing applications forwarded by the NHVR.

The following map illustrates the Proposed Strategic B-Double Routes that have been determine by this process, some are not currently gazetted nor have B-Double vehicle permits.

