



Planning &
Environment

**STATE SIGNIFICANT DEVELOPMENT ASSESSMENT:
Borg Panels Timber Processing Facility Expansion
SSD 7016**



Assessment Report
Section 89H of the
Environmental Planning and Assessment Act 1979

May 2017

ABBREVIATIONS

Applicant	Borg Construction Pty Ltd
Council	Oberon Shire Council
DA	Development Application
DA 27/95	Development Application DA 27/95 (as modified) and accompanying documents, approved on 5 October 1995 by the then Minister
Department	Department of Planning and Environment
Development	The construction and operation of a particle board facility and other modifications to the existing MDF facility
DPI Water	Department of Primary Industries - Water
EIS	Environmental Impact Statement titled <i>Environmental Impact Statement Timber Processing Facility (Particle Board)</i> prepared by the Design Partnership, dated June 2016
EPA	Environment Protection Authority
EP&A Act	<i>Environmental Planning and Assessment Act 1979</i>
EP&A Regulation	<i>Environmental Planning and Assessment Regulation 2000</i>
EPI	Environmental Planning Instrument
EPL	Environment Protection Licence
MDF	Medium Density Fibreboard, a type of reconstituted wood made from wood fibres and primarily used for internal applications such as doors, furniture and panelling
MDF facility	Located at 124 Lowes Mount Road, Oberon (Lot 26 DP 1200697), the MDF facility manufactures MDF products for kitchen and joinery applications
Minister	Minister for Planning
Particleboard	An engineered wood product made from wood chips and primarily used for furniture and joinery products
RMS	Roads and Maritime Services
RTS	Response to Submissions titled <i>Response to Submissions Timber Processing Facility (Particle Board)</i> , prepared by The Design Partnership, dated December 2016
Secretary	Secretary of the Department, or nominee
SEPP	State Environmental Planning Policy
SEPP 33	<i>State Environmental Planning Policy No. 33 – Hazardous and Offensive Development</i>
SRD SEPP	<i>State Environmental Planning Policy (State and Regional Development) 2011</i>
SSD	State Significant Development

Cover photo: View point looking north-west to the Borg Panels Timber Processing Facility (Source: Environmental Impact Statement, 2016)

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Published May 2017
NSW Department of Planning and Environment
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EXECUTIVE SUMMARY

Borg Construction Pty Ltd (the Applicant) has lodged a Development Application (DA) and accompanying Environmental Impact Statement (EIS) seeking consent to construct and operate a particle board facility and to continue operating, and make alterations and additions to, its existing medium density fibreboard (MDF) facility at 124 Lowes Mount Road in the Oberon local government area.

The site is located 1.5 kilometres (km) north of the Oberon town centre and covers approximately 60.5 hectares (ha) of industrial zoned land. The site has been in use for timber manufacturing since the 1980s and is a significant contributor to Oberon's economy. The timber manufacturing industry provides around \$51.3 million to the local and regional economy.

The site was once part of a larger timber operation, operating on either side of Lowes Mount Road, known as the Oberon Timber Complex (OTC). The OTC was formerly owned and operated by CSR Timber and was the largest integrated wood processing operation in Australia incorporating the MDF facility, doorskin facility, an existing particle board facility and sawmill. These facilities currently rely on an existing Ministerial consent (DA 27/95), which was approved on 5 October 1995 by the then Minister for Urban Affairs and Planning.

Over the years, the OTC has changed ownership and was subsequently subdivided and sold to separate companies. Today, the Applicant owns and operates the MDF facility, which manufactures MDF and joinery products for kitchen, shelving and joinery applications. The existing particle board facility (known as Structaflor) and sawmill (later expanded to become Highland Pine Products) are owned and operated by separate companies.

The proposed particle board facility would be located within the existing footprint of the MDF facility and would produce up to 500,000 cubic metres (m³) of particle board a year. The proposed development would be comprised of a press production hall, particle board warehouse, log yard, chippers, debarkers, silos and conveyors. As part of this proposal, the Applicant also proposes to undertake works to its existing MDF facility including building extensions, installing additional sanding and paper treatment lines, additional warehousing, hardstand areas and parking.

Given the scale of operations and its proximity to Oberon, there has been a history of air, noise and surface water management issues associated with operations at the site. The Applicant also proposes to undertake works to improve the environmental performance of the site such as installing best available air pollution control devices and upgrading the site's existing surface water management system.

The proposal is classified as State significant development (SSD) under Part 4 of the *Environmental Planning and Assessment Act 1979* (EP&A Act) because it involves the construction of a timber processing facility that meets the criteria in Clause 4 of Schedule 1 in *State Environmental Planning Policy (State and Regional Development) 2011*. Consequently, the Minister for Planning is the consent authority for the proposed development.

The proposed development has a capital investment value of \$106.1 million and would provide up to 230 jobs during construction and 70 jobs during operation.

The Department exhibited the EIS for the proposed development from Friday 10 June 2016 until Wednesday 27 July 2016 and received a total of ten submissions, including six from public authorities, and four from the general public. Of the ten submissions received, one public submission objected to the proposed development. Key issues raised in the submissions related to air quality, noise, surface water, traffic and transport. The Applicant submitted a Response to Submissions (RTS) in December 2016 to address and clarify matters raised in the submissions.

The Department's assessment of the application has fully considered all relevant matters under Section 79C of the EP&A Act, the objects of the EP&A Act and the principles of ecologically sustainable development. The Department identified the following key issues for assessment:

- air quality, particularly formaldehyde emissions (a chemical used in resins for MDF and particle board products), nitrogen dioxides and particulate matter emissions;
- surface water impacts and management; and
- noise impacts and management.

The Department has also evaluated other issues relevant to the proposed development including traffic and transport, hazards and risk, soil and contamination, biodiversity and waste management. In addition, the Applicant has requested to consolidate all of its operations (including the MDF facility which currently relies on DA 27/95) under a single development consent. To facilitate this process, the Department has considered the removal of the Applicant's land and relevant conditions associated with the MDF facility from DA 27/95. Where required, the Department has carried over a number of relevant conditions into the recommended SSD consent.

The Department's assessment concludes the proposed development would:

- meet operational noise criteria at the closest residential receivers, provided the Applicant implements noise attenuation measures on existing and proposed plant and equipment;
- meet air quality criteria for particulate matter, nitrogen dioxides and formaldehyde emissions at all residential receivers; and
- result in improvements to surface water quality, subject to implementation of the Applicant's proposed surface water mitigation measures including new stormwater basins and stormwater harvesting and reuse.

The Department has recommended a number of conditions to manage and monitor air quality, surface water and noise, including but not limited to the implementation of:

- air quality measures including dust management, an operational air quality management plan and air emissions verification study;
- surface water measures including a surface water management plan detailing the proposed surface water measures and monitoring requirements for the development; and
- noise measures including noise attenuation of noisy plant and equipment, noise verification, and preparation of a construction and operational noise management plan.

Further to this, the Department recommends consolidating the Applicant's existing operations into a single development consent, which will assist with compliance and ongoing management at the site.

The proposed development would continue to provide economic support and ongoing employment for Oberon and the Orana and Central West region. The proposal also represents a significant investment for the timber industry and manufacturing sector in NSW.

Consequently, the Department considers the development is in the public interest and should be approved, subject to conditions.

1. BACKGROUND

1.1. The Department's Assessment

This report details the Department's assessment of a State significant development application (SSD 7016) for the Borg Panels Timber Processing Facility Expansion. The proposed development involves the construction and operation of a particle board facility and continued use of, and alterations and additions to, Borg Construction Pty Ltd's (the Applicant) existing Medium Density Fibreboard (MDF) facility. The Department's assessment considers all documentation submitted by the Applicant, including the Environmental Impact Statement (EIS) and Response to Submissions (RTS), and submissions received from government authorities, stakeholders and the public. The Department's assessment also considers the legislation and planning instruments relevant to the site and the development.

This report describes the proposed development, surrounding environment, relevant strategic and statutory planning and the issues raised in submissions. The report evaluates the key issues associated with the development and provides recommendations for managing any impacts during construction and operation. The Department's assessment of the Borg Panels Timber Processing Facility Expansion has concluded the development is in the public interest and should be approved, subject to conditions.

1.2. Project Background

The Applicant is seeking development consent to construct and operate a particle board facility at its existing MDF facility, located at 124 Lowes Mount Road, Oberon in the Oberon local government area (LGA) (see **Figure 1**). The particle board facility would have the capacity to manufacture up to 500,000 cubic metres (m³) of particle board a year and would consist of additional infrastructure including debarkers, a chipper facility, silos and warehousing. The Applicant also intends to continue operating, and undertake further works to improve the MDF facility, and proposes to consolidate all of its operations under a single development consent.

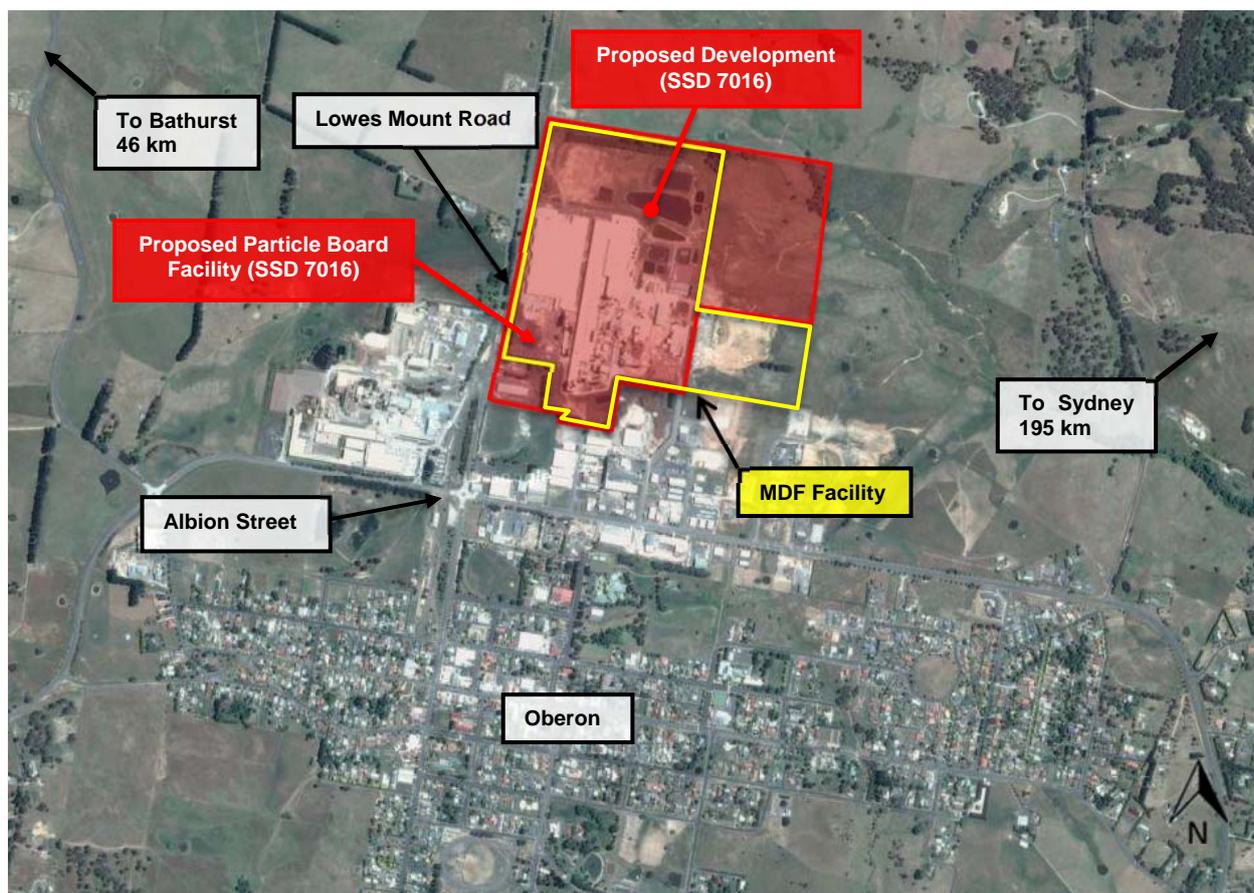


Figure 1: Local Context (Proposed Development in Red)

The timber industry has been a significant source of employment in the Oberon region since the late 1920s when the first timber plantations were established in the Vulcan and Jenolan State Forests. The MDF facility has been in use for timber manufacturing since the mid-1980s and produces MDF and joinery products for kitchen, shelving and joinery applications. Timber manufacturing provides around \$51.3 million to the Oberon and regional economy.

The MDF facility was formerly part of a larger timber operation, operating on either side of Lowes Mount Road, known as the Oberon Timber Complex (OTC). The OTC has had a succession of owners and consisted of the MDF facility, doorskin facility, particle board facility and saw mills (see **Figure 2**). Further details of the OTC are provided in **Section 1.4**.

1.3. The Site and Surrounding Land Uses

The proposed development is located at 124 Lowes Mount Road, and is approximately 46 kilometres (km) south-east of Bathurst and 195 km west of Sydney in the NSW Central Tablelands (see **Figure 1**). The site is located approximately 1.5 km north of the Oberon town centre and the closest residential receiver is around 600 metres (m) south of the site.

The topography of the site is mostly flat and is around 60.5 hectares (ha) in area. The site is situated within an existing industrial area and is surrounded by (see **Figure 2**):

- parcels of vacant land to the north and west of the site;
- the Boral sawmill, Structaflor particle board facility and Highland Pine Products to the south-west of the site. These facilities are discussed in detail in **Section 1.4**;
- the Oberon Rugby Leagues Football Club, Australian Native Landscapes facility and a number of light industries to the south;
- a vacant land parcel to the east (currently owned by the Applicant); and
- the Woodchem resin manufacturing facility (Woodchem facility), located within the MDF facility's footprint, on the eastern boundary.

1.4. Site History – Key Developments

The OTC is comprised of several timber operations which are covered under various development consents. These operations are discussed below and shown in **Figure 2** and **Table 1**.

Oberon Timber Facilities Expansion – DA 27/95

On 5 October 1995, the then Minister for Urban Affairs and Planning approved the Oberon Timber Facilities Expansion Project (DA 27/95). This consent allowed the expansion of the following existing operations on either side of Lowes Mount Road (see **Figure 2**, as outlined in yellow):

- MDF facility;
- doorskin facility;
- Structaflor particle board facility; and
- Sawmill 2 (later known as Highland Pine Products).

The Oberon Timber Facilities Expansion Project focused on integrating all of the wood processing operations and involved:

- an increase in the annual production at the MDF facility;
- construction of a new sawmill with planer and dryer on the western side of Lowes Mount Road; and
- construction and operation of a redtan plant within the Structaflor particle board facility, which extracts tannin from pine bark for use as a resin base in particle board.

At the time of approval, these operations were owned and operated by one company – CSR Limited. However in 2000, these operations were subdivided and sold to different companies including:

- Carter Holt Harvey Pty Ltd (CHH), who acquired the MDF facility, Sawmill 2 and the Structaflor particle board facility; and
- JeldWen Australia Pty Ltd (JeldWen), who acquired the doorskin facility.

In 2010, the Applicant purchased the MDF and doorskin facilities from CHH and JeldWen, respectively. Currently, the Applicant only operates the MDF facility and is not operating the doorskin facility.

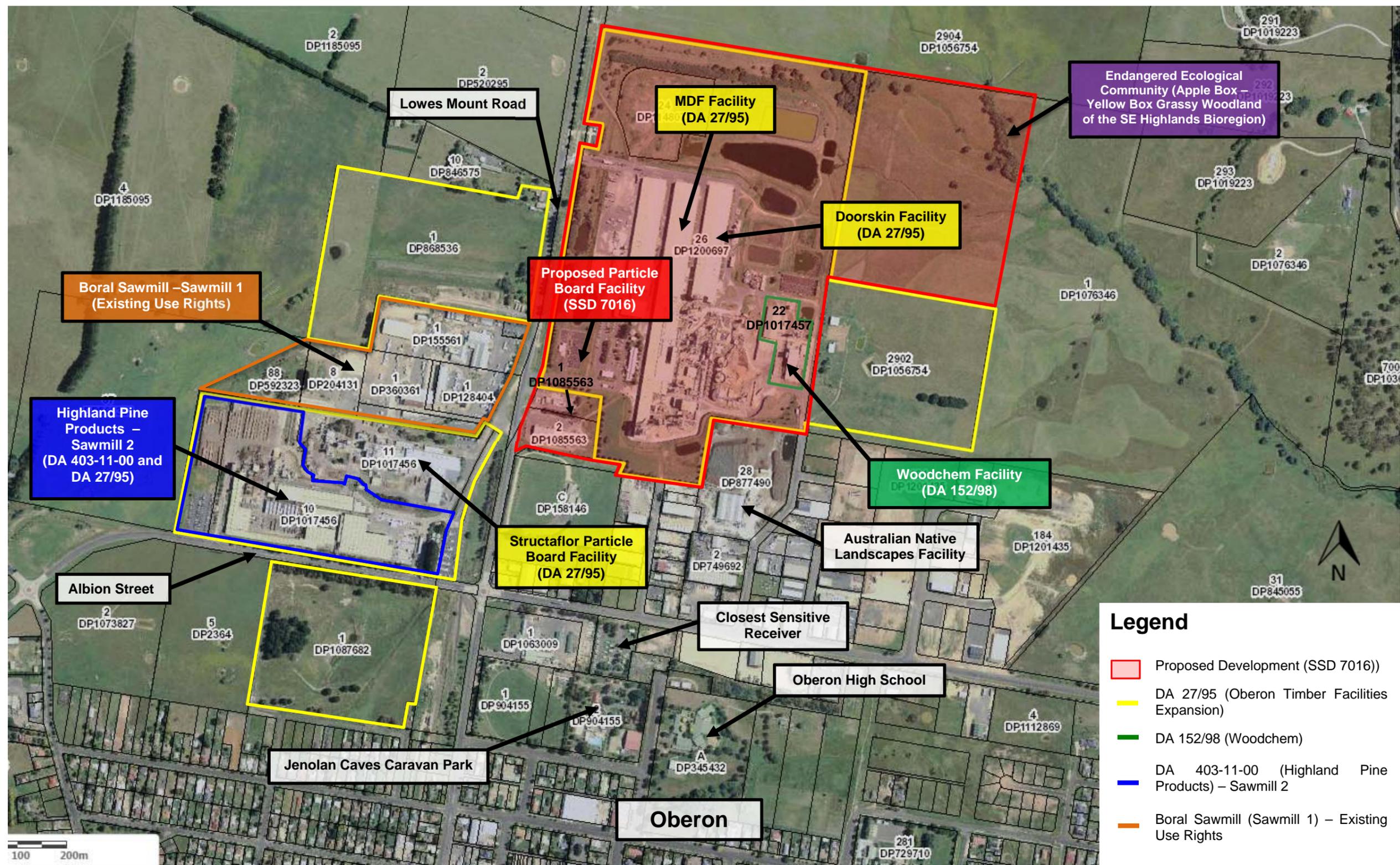


Figure 2: The Oberon Timber Complex – Land Associated with Key Developments

Highland Pine Products – DA 403-11-00

In 2000 after acquiring Sawmill 2, CHH entered into a joint venture with Boral Timber to combine their existing operations to become Highland Pine Products Pty Ltd (HPP). Boral Timber owns a separate sawmill west of Lowes Mount Road, which is referred to as Sawmill 1 (see **Figure 2**). Sawmill 1 currently operates under existing use rights.

The joint venture development was approved by the then Minister for Planning on 31 May 2001 (DA 403-11-00) and produce flooring and housing trusses for the construction and .

Woodchem Resin Manufacturing Facility – DA 152/98

A resin manufacturing facility (known as the Woodchem facility) is located within the existing footprint of the MDF facility and was granted approval on 10 November 1998 under a separate development consent (DA 153/98) issued by Oberon Shire Council (see **Figure 2** and **Table 1**).

The Applicant purchased the Woodchem facility in 2010, and advised it would not be included in this application. The facility is also classified separately as a Major Hazard Facility (MHF) under the *Work Health and Safety Act 2011* (WHS Act).

Table 1: Key Development Consents

DA No.	DA Description	Parties Relying on Consent
SSD 7016 (this DA)	<ul style="list-style-type: none"> Construction and operation of a particle board facility within the existing footprint of the MDF facility; and Alterations and additions to the MDF Facility. 	<ul style="list-style-type: none"> Not yet determined
DA 27/95 (Oberon Timber Facilities Expansion)	<ul style="list-style-type: none"> Increase in production capacity of the MDF facility; Construction of new sawmill with planer and dryer; and Construction of a tannin extraction plant for the Structaflor particle board facility. 	<ul style="list-style-type: none"> The Applicant (MDF Facility only) CHH (Structaflor and Sawmill 2)
DA 403-11-00 (Highland Pine Products)	<ul style="list-style-type: none"> Joint venture to combine the operations of two existing sawmills. 	<ul style="list-style-type: none"> HPP
DA 152/98 (Woodchem Facility)	<ul style="list-style-type: none"> Construction and operation of a urea and melamine formaldehyde resin facility. 	<ul style="list-style-type: none"> Woodchem (separate entity but owned by the Applicant)

1.5. MDF Facility Operations

As discussed in **Section 1.4**, the Applicant currently operates an existing MDF facility on the eastern side of Lowes Mount Road. MDF is a reconstituted wood product that is made from wood fibres mixed with resins. The MDF facility produces a number of MDF products with varying thicknesses, dimensions and moisture and thermal properties (see **Figure 3**). In addition, the facility also produces primed door skins and treated paper for laminating MDF and particle board.

The MDF facility consists of two production lines – one for MDF thick board and one for MDF thin board. These production lines share debarking, chipping and stockpiling facilities. The existing MDF production process is described as follows:

- logs are brought to site and are debarked and fed into a chipper to form woodchips;
- woodchips are heated with steam, grounded into wood fibres and mixed with resin;
- mixed fibre and resin are blown through a gas fired hot air stream which dries the material into a dried mix;
- the dried mix is transferred onto a conveyor which is passed through a continuous press where it is gradually reduced to the required size. The application of heat and pressure also cures the resin to form MDF; and
- the product is cut, trimmed and sanded, and stored on-site in a warehouse prior to distribution.



Figure 3: Types of MDF Products Produced at the Applicant's MDF Facility

2. PROPOSED DEVELOPMENT

2.1. Description of the Development

The Applicant is proposing to construct and operate a particle board facility and to continue operating, and make alterations and additions to, its existing MDF facility at 124 Lowes Mount Road, Oberon. The major components of the proposed development are summarised in **Table 2**, illustrated in **Figure 5** and **Figure 6** and described in full in the EIS (see **Appendix D**).

Table 2: Main Development Components

Aspect	Description
<i>Development Summary</i>	The development is for the expansion of an existing timber processing facility at 124 Lowes Mount Road, Oberon.
<i>New Plant and Infrastructure</i>	The new particle board facility would consist of: <ul style="list-style-type: none"> • new debarkers and chippers (including chip preparation area); • flaker building, drier, silos and conveyors; • wet electrostatic precipitator; • particle board warehouse; and • hot press. Other new plant and infrastructure including an automated storage warehouse for the MDF facility.
<i>Upgrade to Existing Infrastructure</i>	Upgrade of existing infrastructure on the site including: <ul style="list-style-type: none"> • two paper treatment lines within the existing doorskin facility building; • new sanding press and laminating press within the existing sawing plant; • additional carparking spaces and hardstand areas; and • upgrades to existing stormwater system including additional detention basins and swale drains.
<i>Demolition</i>	Demolition and removal of existing infrastructure including: <ul style="list-style-type: none"> • fuel depot and underground storage tanks; • administration building and associated carparking; • gatehouse structures, weighbridge and associated structures; and • infill existing dam located north of the MDF facility.
<i>Staged Construction works</i>	The Applicant proposes to undertake the proposed development in four stages over 24 months as described below (see Figure 5): <ul style="list-style-type: none"> • Stage 1 – site works, construction of detention basin and hardstand areas; • Stage 2 – construction of particle board facility and related infrastructure; • Stage 3 – alterations and additions to the MDF facility including new automated storage warehouse; and • Stage 4 – construction of a second debarker chipper building and chip preparation areas.
<i>Production capacity</i>	Particle board production capacity - 500,000 m ³ per annum No change to MDF facility production capacity of 380,000 m ³ per annum

Aspect	Description
Heavy Vehicle Movements	320 heavy vehicle movements a day (2029 scenario)
Construction Hours	Monday to Friday 7 am to 7 pm Saturday 8 am to 1 pm No work on Sundays and Public Holidays
Hours of Operation	24 hours a day, 365 days a year
Capital investment value	\$106.1 million
Employees	Construction – 230 Operation – 70
Lot Consolidation and Boundary Adjustment	Consolidate the following lots into Lot 26 DP 1200697: <ul style="list-style-type: none"> Lot 1 and 2 DP 1085563; and Lot 24 DP 1148073. Adjust the adjoining eastern boundary of Lot 26 DP 1200697 and western boundary of Lot 1 DP 1076346. This boundary would be relocated to the east, increasing the size of Lot 26 DP 1200697 and reducing the size of Lot 1 DP 1076346.

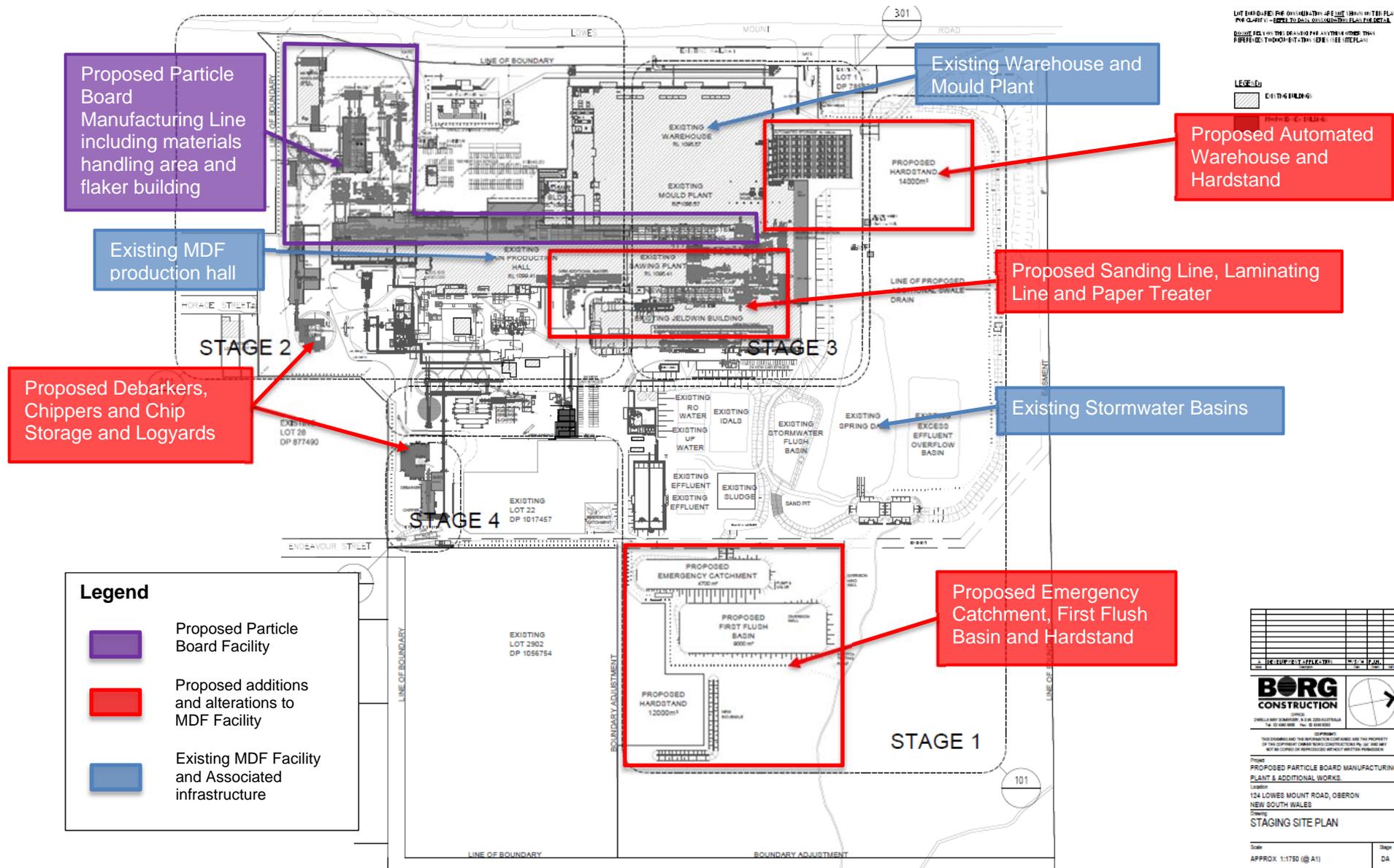
2.2. Proposed Particle Board Manufacturing Process

Particle board is an engineered wood product made from wood chips, sawmill shavings and saw dust which can be used in furniture and flooring (see **Figure 7**). The proposed development involves both the processing of virgin wood, residual wood waste from sawmills and the recycling and processing of used wood to create suitably sized particle board. The particle board manufacturing process is summarised as follows and illustrated in **Figure 4**:

- logs are brought to site and are debarked and fed into a chipper to form woodchips;
- recycled wood products including pallets and sawdust are also transported to site, primarily sourced from the Applicant’s other operations in Charmhaven and Somersby. The sawdust requires minimal processing however; pallets are fed into a sizing mill to break down the material into an acceptable size before being mixed in with the fresh chips;
- all fresh chips are milled into fine flakes in a flaker and mill, and dried before any further processing;
- dried flakes are sorted and screened into different sizes and taken into the particleboard plant where it is mixed with resins and additives;
- material is then transported to the forming station to form a sheet which is then conveyed into a hot continuous press to form the particle board; and
- the product is cut, trimmed, sanded and stored on-site in a warehouse.



Figure 4: Particle Board Manufacturing Process



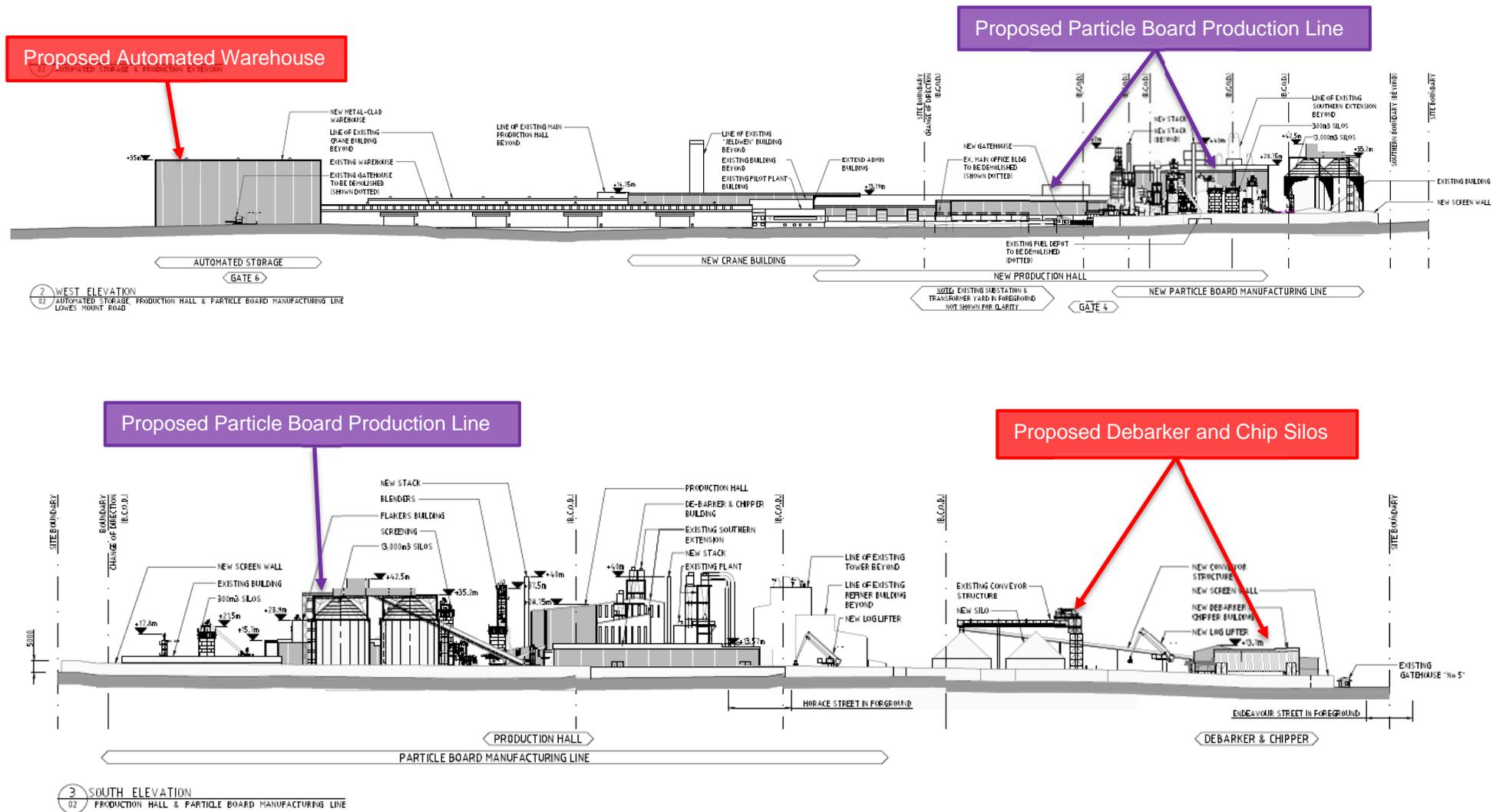


Figure 6: Site Elevation of the Existing and Proposed Development (West and South Elevation)



Figure 7: Plain Particle Board

2.3. Applicant's Need and Justification for the Development

The proposed development is needed to meet current and forecasted demand on the Applicant's existing range of products. Currently, the Applicant relies on off-shore and interstate external suppliers for particle board. The proposed development would:

- allow the Applicant to be self-sufficient and increase efficiencies by creating a streamlined process in which all major components and products are produced in-house rather than relying on external suppliers;
- enable the Applicant to utilise local plantation timber and recycled wood waste from on-site in the manufacture of particle board, which would minimise transport impacts, costs and waste products; and
- have benefits for the Orana and Central West region and the town of Oberon through increased investment and direct and indirect employment generation from the construction and operation of the development.

The Applicant also intends to consolidate all of its operations into a single development consent such that it will no longer rely on DA 27/95. The Department's consideration of the Applicant's request to rely on a single consent for its operations is discussed further in **Section 5.4**

3. STATUTORY AND STRATEGIC CONTEXT

3.1. Strategic Context

The NSW Government has announced the Premier's Priorities which cover 12 key areas including economic growth, provision of infrastructure, protection of vulnerable communities, improving education and environmental protection. One of the Premier's key priorities is 'Creating jobs'. The NSW Government aims to provide 150,000 new jobs in NSW over the next four years.

The proposed development would contribute toward 'Creating Jobs' by providing 230 construction jobs and 70 ongoing operational jobs in the Oberon LGA. The development also represents a \$106.1 million capital investment in an existing industrial development which would have flow on economic benefits for the Oberon and the Orana and Central West region.

The proposal also correlates with the aims and objectives of the *Draft Central West and Orana Regional Plan*. The regional plan aims to support a growing and diverse regional economy with a strong focus on transforming the region's manufacturing and resources sector, as well as protecting and enhancing the region's productive agricultural lands, local environment and communities.

3.2. State Significant Development

The development is State significant development (SSD) pursuant to Section 89C of *Environmental Planning and Assessment Act 1979* (EP&A Act) because it meets the criteria in Clause 4 of Schedule 1 in *State Environmental Planning Policy (State and Regional Development) 2011* (SRD SEPP). The proposal is for the development of a timber processing facility with a capital investment value of more

than \$30 million. Consequently, the Minister for Planning is the consent authority for the proposed development.

3.3. Permissibility

The IN1 – General Industrial land use zone applies to the site under the *Oberon Local Environmental Plan 2013*. Development for a timber processing facility is permissible with development consent in the IN1 zone. Therefore, the Minister or delegate may determine the carrying out of the development.

3.4. Consent Authority

On 16 February 2015, the Minister delegated the functions to determine SSD applications to the Executive Director, Key Sites and Industry Assessments, Planning Services where:

- the relevant local council has not made an objection; and
- there are less than 25 public submissions in the nature of objections; and
- a political disclosure statement has not been made.

Council did not object to the proposed development, however there was one public objection to the proposed development. No reportable political donations were made by the Applicant in the last two years and no reportable political donations disclosures were made by any persons who lodged a submission.

Accordingly, the application can be determined by the Executive Director, Key Sites and Industry Assessments under delegation.

3.5. Other Approvals

Under Section 89K of the EP&A Act, other approvals may be required and must be approved in a manner that is consistent with any Part 4 consent for the SSD under the EP&A Act.

In its submission, the Environment Protection Authority (EPA) advised that an Environment Protection Licence (EPL) has been issued for the site but the proposed development would require a variation to the EPL. The Department has considered the relevant issues relating to the variation of the EPL in the assessment of the proposal (see **Section 5** of this report).

3.6. Consideration under Section 79C of the EP&A Act

Section 79C of the EP&A Act sets out matters to be considered by a consent authority when determining a development application. The Department's consideration of these matters is set out in **Section 5** and **Appendix B**. In summary, the Department is satisfied the proposed development is consistent with the requirements of Section 79C of the EP&A Act.

3.7. Environmental Planning Instruments

Under Section 79C of the EP&A Act, the consent authority, when determining a development application, must take into consideration the provisions of any environmental planning instrument (EPI), draft EPI (that has been subject to public consultation and notified under the EP&A Act) that apply to the proposal.

The Department has considered the development against the relevant provisions of several key EPIs including:

- *State Environmental Planning Policy (State and Regional Development) 2011* (SRD SEPP);
- *State Environmental Planning Policy (Infrastructure) 2007* (the ISEPP);
- *State Environmental Planning Policy No. 33 – Hazardous and Offensive Development* (SEPP 33);
- *State Environmental Planning Policy No. 55 – Remediation of Land* (SEPP 55); and
- *Oberon Local Environmental Plan 2013*.

The Department's assessment concludes that, subject to the implementation of the recommended conditions of consent, the development is generally consistent with the aims, objectives and provisions of these instruments (see **Appendix C** for further detail).

3.8. Objects of the EP&A Act

The Department has fully considered the objects of the EP&A Act, including the encouragement of Ecologically Sustainable Development (ESD), in its assessment of the application.

The Department considers the following objects are most relevant to the assessment of this application:

- (a) to encourage:

- (i) *the proper management, development and conservation of natural and artificial resources, including agricultural land, natural areas, forests, minerals, water, cities, towns and villages for the purpose of promoting the social and economic welfare of the community and a better environment,*
- (ii) *the promotion and co-ordination of the orderly and economic use and development of land,*
- (vi) *the protection of the environment, including the protection and conservation of native animals and plants, including threatened species, populations and ecological communities, and their habitats, and*
- (vii) *ecologically sustainable development, and*
- (b) *to promote the sharing of the responsibility for environmental planning between the different levels of government in the State, and*
- (c) *to provide increased opportunity for public involvement and participation in environmental planning and assessment.*

The Department has fully considered the objects of the EP&A Act, including the encouragement of ESD, in its assessment of the application (see **Table 3**).

Table 3: Objects of the EP&A Act and relevance to the development

Object	Consideration
5(a)(i)	The proposal would ensure the proper management and conservation of natural resources, as it would utilise an existing industrial site. The site is zoned for industrial use and has been used as a timber processing facility for the last 30 years. Development of the site would promote economic welfare for the local community through the provision of 230 construction jobs and 70 operational jobs.
5(a)(ii)	The proposal would ensure the orderly and economic use of the land, which is zoned for industrial use. The proposal would enable the site to continue to be used for industrial purposes consistent with its zoning.
5(a)(vi)	The Department's assessment in Section 5 of this report demonstrates that with the implementation of recommended conditions of consent, the impacts of the development can be mitigated and/or managed to ensure an acceptable level of environmental performance.
5(a)(vii)	The development is consistent with the principles of ESD as the proposal would provide a timber processing facility on existing industrial zoned land.
5(b)	The Department has assessed the development in consultation with, and giving due consideration to, the technical expertise and comments provided by Council and other government authorities. This is consistent with the object of sharing the responsibility for environmental planning between the different levels of government in the State.
5(c)	The Department provided the public with opportunity to comment on the proposal and considered all issues raised in the public submissions during its assessment of the application (Section 4).

3.9. Ecologically Sustainable Development

The EP&A Act adopts the definition of ESD found in the *Protection of the Environment Administration Act 1991*. Section 6(2) of that Act states that ESD requires the effective integration of economic and environmental considerations in decision-making processes and that ESD can be achieved through the implementation of:

- a) *the precautionary principle;*
- b) *inter-generational equity;*
- c) *conservation of biological diversity and ecological integrity; and*
- d) *improved valuation, pricing and incentive mechanisms.*

The potential environmental impacts of the proposed development have been assessed and, where potential impacts have been identified, mitigation measures and environmental safeguards have been recommended.

As demonstrated by the Department's assessment in **Section 5** of this report, the development is not anticipated to have any adverse impacts on native flora or fauna, including threatened species, populations and ecological communities, and their habitats as it would utilise an existing industrial site. Any environmental impacts from the proposed development would be minimised through the provision of management and mitigation measures. As such, the Department considers the proposal would not adversely impact on the environment and is consistent with the objectives of the EP&A Act and the principles of ESD.

4. CONSULTATION AND SUBMISSIONS

4.1. Consultation

The Applicant, as required by the Secretary's Environmental Assessment Requirements (SEARs), undertook consultation with relevant local and State authorities as well as the community and affected landowners. The Department undertook further consultation with these stakeholders during the exhibition of the EIS and throughout the assessment of the application. These consultation activities are described in detail in the following sections.

4.1.1. Consultation by the Applicant

The Applicant undertook a range of consultation activities throughout preparation of the EIS including:

- an initial meeting with the public authorities prior to the preparation of the EIS;
- preparation and distribution of community factsheets which were distributed throughout the township of Oberon;
- meeting with the Oberon Timber Complex Community Consultative Committee (a committee representing the community and stakeholder groups and engages regularly with Applicants) to provide information about the proposed development; and
- an open public forum and targeted stakeholder meeting with key community representatives including the Oberon Tourism Association.

4.1.2. Consultation by the Department

After accepting the EIS for the application, the Department:

- made it publicly available from **Friday 10 June 2016** until **Wednesday 27 July 2016**:
 - on the Department's website;
 - at the Department's offices (Bridge Street, Sydney);
 - at the Oberon Shire Council (Council offices);
- notified landowners in the vicinity of the site about the exhibition period by letter;
- notified relevant State government authorities and the Oberon Shire Council by letter;
- advertised the exhibition in the Oberon Review newspaper; and
- met with a member of the community who made a submission on the proposed development.

4.2. Submissions

A total of ten submissions were received on the proposed development, including six from public authorities, and four from the general public. Of the ten submissions received, one objected to the proposed development and the remainder made comments. A summary of the issues raised in the submissions is provided below, with a copy of each submission included in **Appendix E**.

4.2.1. Public Authorities

Oberon Shire Council (Council) did not object to the proposal, but it required the Applicant to address potential impacts associated with works within the remediation area of Kings Stockyard Creek. Council also recommended a number of conditions relating to noise mitigation, landscaping requirements and traffic management.

The **Environment Protection Authority (EPA)** sought additional information and clarification on a number of issues including air quality (meteorology, emissions, nitrogen dioxide conversion and cumulative impacts), noise impacts particularly in regards to the use of the mobile wood chippers, stormwater management and waste management. The EPA's recommended conditions cover air quality, noise management, mobile wood chipper operation, surface water management and waste management.

The **Office of Environment and Heritage (OEH)** noted that around 1.1 ha of native vegetation would be removed, however no offset requirements were needed for the proposed development due to the poor condition of the vegetation. The OEH raised no issues with regard to Aboriginal heritage.

The **Department of Primary Industries (DPI Water)** sought additional information on the water requirements of the development including stormwater harvesting and licence requirements and requested further assessment be undertaken on the movement of the v-notch weir and impact to downstream users. DPI provided recommended conditions around the requirement for an erosion and sediment control plan and for the Applicant to update its stormwater management plan for the site.

SafeWork NSW raised concerns about the impact of the proposal on the adjacent Woodchem facility, which is a Major Hazard Facility (MHF). Safework NSW also asked the Applicant to provide justification for why the proposed development should not be considered a MHF and recommended the Fire Safety Study for the proposed development consider impacts to the neighbouring Woodchem facility.

NSW Roads and Maritime Services (RMS) did not make a submission.

4.2.2. Public submissions

A submission from **Carter Holt Harvey (CHH)** on behalf of Highland Pine Products (HPP) and the Structaflor particle board facility, raised a number of issues relating to air quality (formaldehyde emissions), noise and traffic issues, contamination and surface water management including easement requirements. CHH was concerned the cumulative noise impacts from the development and nearby industries were not addressed in the EIS.

Oberon District Museum supported the proposal and raised no concerns.

Two submissions were received from the general public, of which one submission objected to the proposed development. Both submissions raised the following issues:

- potential dust, odour, noise and traffic impacts from the proposal; and
- waste disposal and management issues.

4.3. Response to Submissions and Supplementary Information

In December 2016, the Applicant provided a response to the issues raised in the submissions (see **Appendix F**). The Response to Submissions (RTS) report was made publicly available on the Department's website and was provided to key agencies to consider whether it adequately addressed the issues raised. The RTS provided additional information on:

- air dispersion modelling;
- stormwater management;
- waste management; and
- the process description of the existing MDF facility.

Following further consultation with the EPA and CHH, the Applicant provided supplementary information to address the issues raised. This included further work on the air dispersion model to assess predicted formaldehyde impacts. The Applicant provided a revised Air Quality Impact Assessment (AQIA) to address these concerns. The Applicant also provided additional information to address CHH's concerns and reiterated the cumulative noise impacts of the development would be negligible as the proposed development would be required to comply with the site's existing EPL noise limits.

5. ASSESSMENT

The Department has considered the EIS, the issues raised in submissions and the Applicant's RTS and supplementary information in its assessment of the proposed development. The Department considers the key issues relate to air quality, surface water, noise and the consolidation of the site's operations into a single development consent. Other issues are considered to be minor and are discussed in **Table 11** in **Section 5.4**.

5.1. Air Quality

The timber processes associated with the proposed development have the potential to result in significant air quality impacts.

The primary emissions from the proposed development include:

- particulate matter including dust emissions from construction activities and from existing and proposed operational processes such as chipping and debarking; and
- formaldehyde and nitrogen dioxide (NO₂) emissions from existing and proposed operational processes.

The EIS included an AQIA which was prepared in accordance with the EPA's *Approved Methods for the Modelling and Assessment of Air Pollutants in New South Wales, 2005*. A number of issues were raised in submissions from the EPA and general public regarding the air dispersion modelling, process

description and predicted impacts of the proposed development. In response, the Applicant prepared a revised AQIA as part of the RTS to address these concerns.

Construction

During construction, dust and particulate emissions may be generated during minor earthworks, demolition of structures, excavation and stockpiling. The construction works would be carried out concurrently with the operation of the existing MDF facility and is expected to take 24 months to complete.

The EIS concluded the dust and particulate emissions during construction and demolition works would be minimal as the Applicant would implement standard mitigation measures which would be contained in a Construction Environmental Management Plan (CEMP) to manage key construction activities. These include:

- applying water sprays for dust suppression;
- managing the size of stockpiles; and
- suspending dust generating activities during high wind speeds.

The EPA and Council did not raise any concerns in relation to construction air quality impacts. The Department notes the nearest residential receiver is located 600 m to the south of the site and considers the potential dust and particulate emissions from construction activities would be short-term in nature and are able to be managed on-site. On this basis, the Department is satisfied construction air emissions can be adequately managed through a CEMP and has included a condition to reflect this requirement.

Operation

Key pollutants associated with the operation of the proposed development would be nitrogen dioxide (NO₂), particulate matter (PM₁₀, dust) and formaldehyde. The main emission sources would be from:

- existing and proposed stacks in the MDF facility and the proposed particle board facility; and
- fugitive emissions from the continuous press lines and outdoor activities such as the logyards.

Air emission sources from nearby industries were also considered in the AQIA. The existing air quality in the Oberon regional air shed is dominated by emissions from human activities including various commercial or industrial activities, motor vehicle exhausts and domestic wood heaters. The AQIA indicated that ambient air quality monitoring data for the site was not available, however the nearest OEH air quality monitors at Bathurst and Oakdale (located approximately 46 km north-west and 71 km south-east from the site, respectively) were used to determine the existing background levels.

To minimise key pollutant emissions from the MDF facility and proposed particle board facility, the Applicant proposes to install best available pollution control technologies. This includes installing:

- cyclones to capture materials and particles from the drying process;
- wet electrostatic precipitator (WESP)/scrubber system for the existing dryer to capture small particles and water soluble contaminants. This pollution device is also anticipated to remove up to 70% of formaldehyde emissions; and
- a press suction system for the press exhausts to reduce fugitive emissions generated by the existing and proposed press lines.

To determine whether the predicted emissions from the proposed development would comply with the relevant EPA assessment criteria, dispersion modelling was undertaken by the Applicant for the key pollutants, which are considered further below.

PM₁₀ and NO₂

The predicted impacts (background levels and proposed development contribution) for PM₁₀ and NO₂ at the most affected receivers are shown in **Table 4**. The assessment found the predicted annual average ground level concentrations for PM₁₀ and NO₂ and the predicted 1-hour average NO₂ would be below the relevant EPA criteria at all sensitive receivers at all times. For example, the maximum long-term (annual) average PM₁₀ and NO₂ concentrations is predicted to be 23.0 µg/m³ and 9.1 µg/m³ at R02 (Oberon football playing field), which is below the EPA's criteria of 30 µg/m³ and 62 µg/m³. The maximum 1-hour average NO₂ concentration was predicted to be 181.2 µg/m³ at R03 (Jenolan Caves Caravan Park) which is below the EPA criteria of 246 µg/m³ (see **Table 4**).

Table 4: Predicted Impacts of the Proposed Development (Background Levels and Proposed Development)

Receptor	PM ₁₀ (µg/m ³)		NO ₂ (µg/m ³)	
	Annual average		1-hour average	Annual Average
	Air Quality Impact Assessment Criteria			
	30		246	62
R02 – Oberon Football Playing Field	23.0		143.4	9.1
R03 – Jenolan Caves Caravan Park	17.5		181.2	6.7
R04 – Oberon High School	17.2		172.7	6.5

The assessment also considered short-term (24-hour) average PM₁₀ impacts. However, due to high elevated background concentrations (attributed to various seasonal activities such as use of domestic wood heaters and commercial and industrial activities), a more refined analysis was undertaken to predict whether additional exceedances of the EPA criterion (being 50 µg/m³) may occur as a result of the addition of the incremental impacts attributed by the proposed development compared with the background values. In this regard, the AQIA demonstrated the proposed development is not likely to result in additional days exceeding the EPA criterion of 50 µg/m³.

The EPA and the Department consider the predicted PM₁₀ and NO₂ emissions from the proposed development are unlikely to exceed the EPA’s air quality criteria, and is not likely to result in adverse air quality impacts.

Formaldehyde

Formaldehyde emissions from the proposed operational processes has the potential to result in adverse health effects (such as skin or eye irritations) on the surrounding community. The predicted formaldehyde impacts for the existing and proposed development at the most affected receivers are shown in **Table 5** and presented in **Figure 8**. The cumulative impacts for the proposed development and nearby industries was also considered. As can be seen in **Table 5**, the formaldehyde ground level concentrations for the existing development currently exceed the EPA criterion of 21.8 µg/m³ at R02 (Oberon football playing field). However, with the implementation of pollution control equipment such as a WESP and scrubber system, the proposed development is predicted to result in an overall improvement in formaldehyde concentrations. This is particularly evident at R02 where formaldehyde concentrations are predicted to reduce from 27.9 µg/m³ to 18.5 µg/m³, and as such comply with the EPA criterion of 21 µg/m³.

When considered with other nearby industries, the assessment found the proposed development would still meet the EPA criterion at all assessed receiver locations. For example, at R03 (Jenolan Caves Caravan Park) and R04 (Oberon High School), formaldehyde concentrations are predicted to be 10.7 µg/m³ and 9.9 µg/m³, which is well below the EPA criterion of 21.8 µg/m³.

Table 5: Predicted Formaldehyde Impacts at the Nearest Affected Receivers

Receptor	99.9 th percentile 1-hour average formaldehyde concentration (µg/m ³)			
	Existing MDF Facility	Existing MDF Facility and other industries	Proposed Development (includes MDF facility)	Proposed Development (includes MDF facility) and other industries
	Air Quality Impact Assessment Criteria			
	21.8			
R02 – Oberon Football Playing Field	27.9	28.0	18.5	18.5
R03 – Jenolan Caves Caravan Park	11.7	11.8	10.7	10.7
R04 – Oberon High School	10.6	10.6	9.9	9.9

Note: Bolded numbers denotes an exceedance of the EPA criterion

Figure 8 also shows the maximum formaldehyde impacts from the proposed development are predicted to remain essentially within the site boundary, with the exception of a minor exceedance at the south-eastern corner of the site (see inset). The Applicant stated this exceedance is only marginally above the EPA criterion. The Applicant undertook further analysis using the World Health Organisation’s (WHO) formaldehyde guideline of 100 µg/m³ (over a 30-minute averaging period) to demonstrate these levels would not result in any adverse health impacts. The analysis found the proposed development would not exceed the WHO guidelines at any location outside the site boundary. Based on this analysis, the

Applicant concluded the maximum formaldehyde concentrations at the site boundary would not have significant health impacts on the general public.

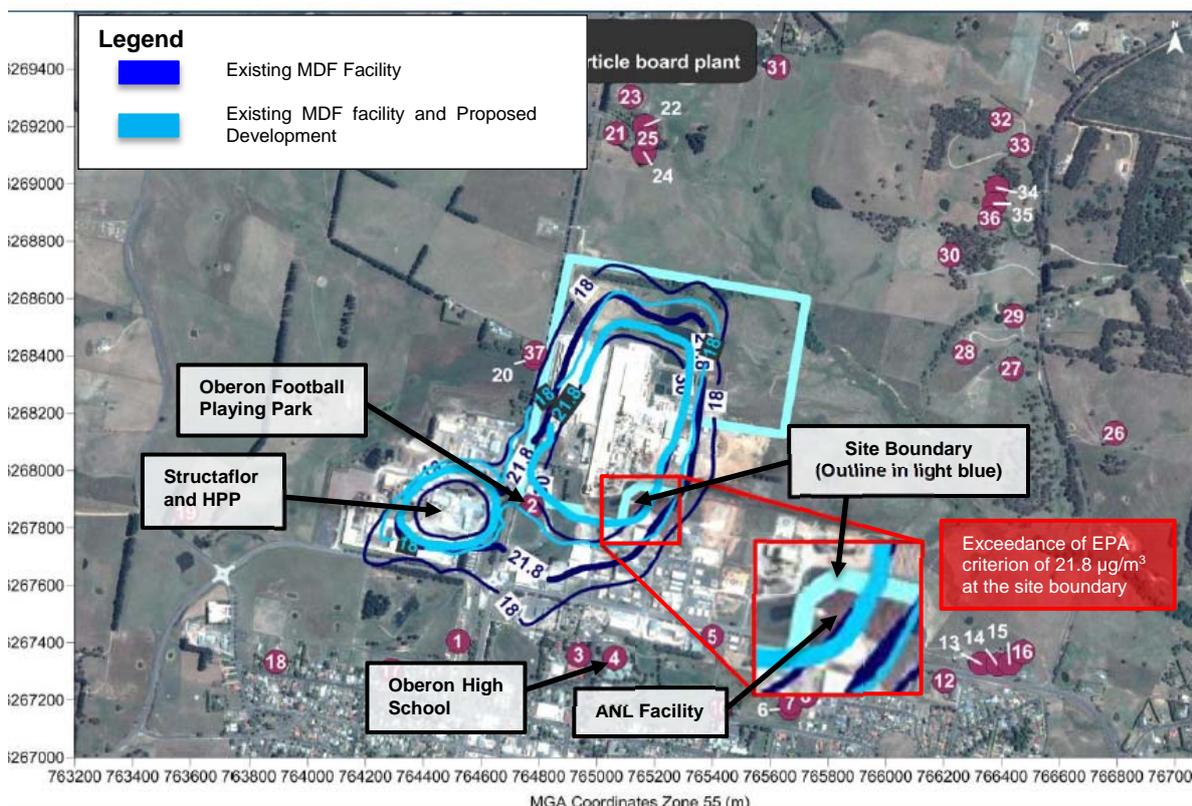


Figure 8: Predicted 99.9th Percentile 1-hour Average Cumulative Formaldehyde Concentration ($\mu\text{g}/\text{m}^3$)

The EPA raised concerns about the predicted exceedance of the EPA criterion and noted the application of the WHO guideline is not currently endorsed by the EPA. In its RTS, the Applicant confirmed the formaldehyde exceedance is only likely to occur for nine hours in a year in a small portion of the north-western corner of the neighbouring Australian Native Landscapes (ANL) facility, which is not accessible to the public. The EPA and the Department agree with the Applicant's analysis and conclusion and considers the AQIA adopted a conservative approach for input parameters including the use of historical stack testing results and formaldehyde destruction efficiencies of 30%. In reality, the Applicant's proposed pollution control devices would be capable of removing up to 70% of formaldehyde emissions, which is much greater than modelled.

With regard to minimising the exposure of workers and visitors on-site to formaldehyde emissions, the Department notes that workplace health and safety regulations exist for hazardous chemicals under the *Work Health and Safety Regulation 2011*. The Applicant is also required to undertake workforce and workplace exposure monitoring as per the applicable codes of practice. SafeWork NSW did not raise any concerns.

The EPA has recommended the Applicant undertake an air emissions verification study at all air discharge points identified in the AQIA to validate the conclusions reached from the air dispersion modelling. The Department has included this requirement in the recommended conditions. The Department also recommends a condition that requires the Applicant to implement an Operational Air Quality Management Plan (OAMP), which would incorporate an ongoing air emissions monitoring program. The Department also notes the Applicant is committed to investigating options to further reduce formaldehyde emissions. As such, the Department recommends that as part of the OAMP, the Applicant outline options and strategies for further reducing formaldehyde emissions.

The Department considers the proposed development would lead to an overall improvement in air quality beyond the site boundary and is satisfied the Applicant will continue to work with the EPA to improve air quality at the site. The Department is of the view that air quality impacts from the development can be adequately managed, subject to the implementation of the Applicant's commitments and relevant conditions of consent.

Conclusion

The Department's assessment concludes the construction impacts, including dust and particulate emissions, would be relatively low and are able to be managed through the implementation of standard management and mitigation measures, which are to be included in the CEMP.

In terms of operational impacts, the Department concludes the operational air quality modelling predictions demonstrate the relevant air quality impact assessment criteria for NO₂, PM₁₀ and formaldehyde would be complied with at all times at all receivers. Despite an exceedance of the maximum formaldehyde concentrations at the south-eastern end of the site boundary, the Department accepts the exceedance would only occur for nine hours of the year on neighbouring land that is inaccessible and of low risk of exposure to the public. The Department considers that with implementation of the Applicant's commitments, the proposed development is expected to result in a reduction in air emissions at the site, particularly for formaldehyde. The Department has recommended a number of conditions for the Applicant to undertake an air quality verification study and to prepare an operational air quality management plan for the development.

5.2. Surface Water

The proposed development would result in an additional 10.5 ha of impervious areas (roof and hardstand areas) which has the potential to impact surface water quality and increase surface water flows. Increased runoff has the potential to impact downstream catchments if not controlled by an adequate surface water management system.

The Applicant prepared a Water Cycle Impact Assessment (WCIA), in accordance with relevant guidelines which considered the potential surface water impacts of the proposed development during construction and operation.

Existing Surface Water Management System

The topography of the site is mostly flat and has an area of 60.5 ha. The site has not been identified as flood prone and mainly comprises of hardstand area with other land types being small parcels of unpaved areas, open dams and storage ponds (see **Figure 9**). Various storage ponds are used for effluent treatment, stormwater treatment, fire water storage and as treated effluent storage for later reuse. The site also has a system of open vegetated swales and pipes/culverts which convey water around the site.

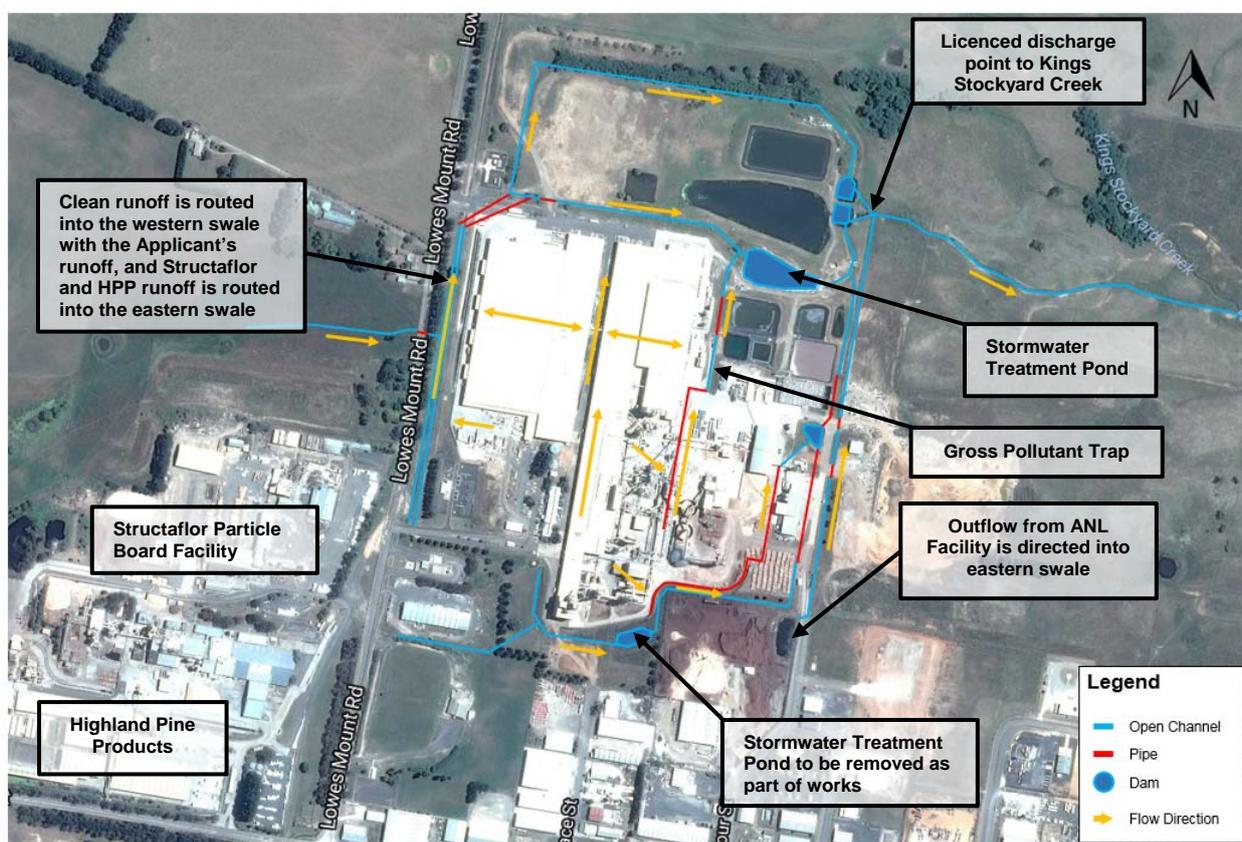


Figure 9: Existing Stormwater Management at the Site and Stormwater Flow Direction

Stormwater flows from the existing MDF facility are generally directed north to an existing stormwater treatment pond which ultimately discharges to Kings Stockyard Creek at a licensed discharge point, located in the north-eastern corner of the site (see **Figure 9**).

The site's surface water management system also accepts stormwater from neighbouring facilities including the HPP sawmill and the Structaflor particle board facility, which are owned by CHH and Boral Timber. Stormwater from these facilities is directed around the northern perimeter of the site via a series of swales, pipes and channels before being discharged to Kings Stockyard Creek, at the same licensed discharge point as the MDF facility (see **Figure 9**). An agreement is currently in place between CHH and the Applicant to ensure CHH's stormwater discharges comply with the concentration limits outlined in the EPL for the MDF facility.

Proposed Surface Water Management System

To accommodate for the increase in surface water flows, the Applicant proposes to physically alter the site's existing surface water management system by implementing the following surface water mitigation measures (see **Figure 10**):

- construction of a new additional swale drain on the northern boundary with a much longer flow path (to reduce total suspended solids (TSS) and removal of tannins) to convey HPP and Structaflor runoff around the site and into a new treatment pond;
- construction of a new stormwater drain along the eastern boundary to carry stormwater from Endeavour Street and the ANL facility as well as a new bioswale around the proposed hardstand area on the eastern side of the site;
- construction of an additional stormwater treatment and storage pond with a minimum volume of 6 mega litres (ML). The treatment pond would be designed to accept stormwater flows from the site and the adjacent Woodchem facility;
- conversion of a small existing aerated pond north-east of the Woodchem facility into an emergency catchment dam to allow spills to be captured and temporarily stored in the dam;
- construction of an additional 4,700 m³ emergency spill basin, which would be operated as a dry basin to collect accidental spills from the whole site; and
- implementation of a stormwater harvest and reuse scheme, which would harvest around 400 kilo litres (kL) of stormwater per day and around 120 ML per year.

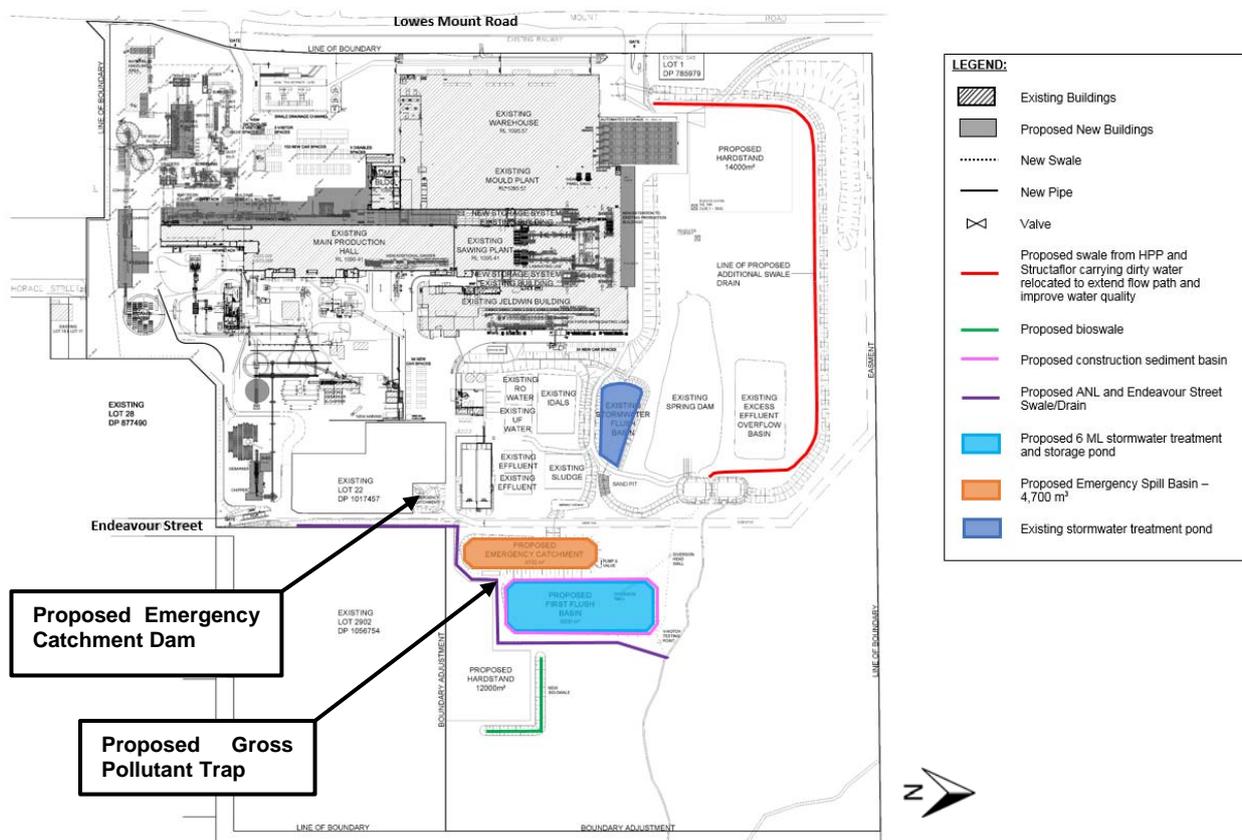


Figure 10: Proposed Stormwater Mitigation Measures

Surface Water Quality

During construction, approximately 2,720 tonnes (t) of soils would be excavated, which has the potential to result in water quality impacts through transport and discharge of sediment from the site into Kings Stockyard Creek. Other potential construction impacts include the risk of an accidental spill of a chemical during operation of plant and equipment.

To manage these impacts, the Applicant has committed to implementing a number of erosion and sediment controls for the site such as sedimentation fencing, vegetation strips, hay bales and flocculent blocks. The Applicant also proposes to construct a temporary sediment basin at the north-east corner of the site to capture any eroded or disturbed soil (see **Figure 10**). This sediment basin would be converted into a stormwater treatment pond following completion of construction works.

The EPA and Council did not raise any concerns, however DPI Water requested it be consulted during preparation of the Erosion and Sediment Control Plan. The Department has included this requirement in the conditions of consent and has also recommended the Applicant install and implement suitable erosion and sediment control measures on-site in accordance with the *Managing Urban Stormwater: Soils and Construction Volume 1* (the Blue Book). The Department's assessment concludes that with these controls in place, any potential construction impacts would be minimal and can be adequately managed by the Applicant.

The proposed particle board facility has been designed to lower the risk of polluting stormwater through fully enclosing the new buildings and covering the chipper silos and conveyors which carry wood chips. During operation, the key sources of stormwater pollution from the site are likely to come from the:

- increase in roof and other impermeable surface areas,
- storage of logs in the log yards;
- general handling and transport of woodchips; and
- general traffic movements on site.

Key pollutants of concern are tannins, TSS, total nitrogen and phosphorus and aldrin and dieldrin (an organochloride, commonly used as an insecticide). These pollutants have the potential to cause contamination and water quality issues to Kings Stockyard Creek. Historically, a number of water quality and contamination issues have occurred on site and within the broader Oberon Timber Complex as a result of the various timber processes. However, the facility's EPL has a requirement for the Applicant to monitor the concentration levels of these key pollutants at its licensed discharge point.

The Applicant developed a MUSIC (Model for Urban Stormwater Improvement Conceptualisation) water quality model of the existing and proposed development to predict the potential operational water quality impacts. The modelling showed that with the proposed surface water management system in place, the proposed development is predicted to result in a reduction in annual pollutant loads for TSS, total nitrogen and phosphorus (see **Table 6**). For TSS, annual loads are predicted to reduce by around 40% from 8,325 kg/year to 4,980 kg/year.

Table 6: Annual Pollutant Export Loads

Parameter	Annual Loads		
	Existing Development (kg/year)	Proposed Development (kg/year)	% Reduction from Existing to Proposed Development
Total Suspended Solids	8,325	4,980	40.2
Total Phosphorus	42.2	30.45	27.8
Total Nitrogen	1,230	1,130	8.1

The EPA and DPI Water generally supports the proposed upgrades to the surface water management system however, EPA noted any surface water runoff from the log yards and wood chip processing areas must go through an appropriately designed gross pollutant trap prior to discharging into the surface water management system. The Applicant confirmed surface water from these areas would be directed into a new gross pollutant trap which would be located between the proposed emergency catchment basin and proposed stormwater treatment pond (see **Figure 10**). The Applicant's proposed emergency spill basin and emergency catchment dam would also ensure any accidental spills or fire-fighting water can be prevented from migrating into receiving waters.

The Department considers the enclosure of key production processes such as buildings and chipper silos would lower the risk of surface water pollution from the site. The Department also considers the Applicant has demonstrated the proposed upgrades to the surface water management system would improve water quality on-site which would continue to be monitored under the EPL. The Department recommends the Applicant prepare a Surface Water Management Plan (SWMP) in consultation with the EPA and DPI Water, which would include:

- the procedures for the inspection and maintenance of the existing and proposed surface water management structures;
- a surface water monitoring and reporting program for early detection of potentially adverse surface water impacts; and
- surface water response plan to respond to any exceedances of the surface water performance criteria, including the contingency measures that would be put in place to mitigate any adverse surface water impacts.

Surface Water Runoff and Flows

The proposed development has the potential to result in increased stormwater run-off from the site which could alter flow regimes and have adverse impacts for downstream users on Kings Stockyard Creek such as farmers. Modelling was undertaken to determine the additional volume of runoff that would be generated by the proposed development, which was compared with a rural and current state scenario (see **Table 7**). The modelling showed the proposed development could potentially result in a substantial increase in the total volume of runoff from the site to around 407 ML per year (proposed development with a no harvest scenario, **Table 7**) when compared with the rural and current state scenarios.

To address this issue, the Applicant proposes to harvest and reuse stormwater collected from the existing and proposed roof and operational areas to reduce site runoff volumes to Kings Stockyard Creek. This would equate to around 400 kL per day or an annual yield of 120 ML per year. **Table 7** shows that with the proposed harvest scenario, the mean annual volume runoff from the proposed development reduces to around 287.5 ML per year, which is closer to the current state scenario (294 ML a year). The Applicant clarified the proposed development with a harvest scenario would result in almost no change to the receiving waters, with a minor reduction in flows of around 6.5 ML a year.

With regard to site water demand, the existing development currently relies on the Oberon town water supply to provide around 141.6 ML of water a year. It is anticipated the proposed particle board facility would be extremely water efficient and would only require a further 17 ML of water a year. Stormwater harvesting (at around 120 ML a year) has the potential to supply around 85% of the site's current and future water demand, thereby reducing the Applicant's reliance on the Oberon town water supply to around 21.6 ML of water a year.

Table 7: Mean Annual Flow Comparison

Parameter	Rural State	Current State (Existing Development)	Proposed Development (no harvest)	Proposed Development (with 400 kL/day harvest)
Mean Annual Flow (ML/year)	140.35	294	407	287.5

DPI Water sought clarification on the Applicant's proposed stormwater harvesting and reuse scheme including licensing, volumes and sources of water to be harvested. DPI Water also requested an assessment on the impact on downstream water users. EPA also sought confirmation that stormwater harvesting would be implemented as a primary component of its surface water management system. A submission from CHH also raised issues around potential impacts to downstream users and aquatic biota.

In its RTS, the Applicant clarified that stormwater would only be harvested from runoff collected from existing roads, hardstands, car parks and roof areas, which would not require a licence under the *Water Management Act 2000*. In terms of impacts on downstream users including aquatic biota (animal and plant life), the Applicant demonstrated that after harvesting, the level of flows would be similar to the current state (including 2% variation in flows due to rainfall) and is not likely to impact on any downstream users or aquatic biota. The RTS also stated stormwater harvesting would also reduce the amount of chemical and physical pollutant loads being released to the Kings Stockyard Creek, which would have positive impacts on aquatic biota.

The Department, DPI Water and EPA are satisfied the Applicant's proposal to harvest stormwater is an appropriate mitigation measure to manage the anticipated increase in surface water runoff from the proposed development. The Department further recommends details of the stormwater harvesting and reuse scheme be included in the SWMP, which would include details of a program to monitor surface water flows, storage and use. The Department's assessment concludes stormwater harvesting would contribute to reducing runoff at the site and the Applicant's reliance on town potable water supply.

Easement to Drain Water

In its submission, CHH raised concerns about the Applicant's proposal to move a registered easement to drain water which conveys HPP and Structaflor stormwater from the site (see **Figure 10**). The Applicant proposes this stormwater be redirected to the northern boundary of the site to accommodate a warehouse extension and new hardstand area. The Applicant confirmed it is in the process of negotiating the relocation of the easement with CHH and have advised that at a site operational level, CHH has agreed to the proposed easement relocation plans. The Department understands details of the final design would be provided to senior management at CHH for review. CHH raised no further issues. The Department considers the warehouse extension and hardstand area is located in a suitable location and that the easement is capable of being relocated. The Department has recommended a condition outlining the requirements for relocating the drainage easement as required under the *Conveyancing Act 1919*.

Conclusion

The Department concludes the impacts to surface water quality during construction can be managed through the implementation of erosion and sediment control measures including the use of a temporary sediment basin to capture any eroded soil. During operation, the Department considers the surface water quality of the site is likely to improve as a result of the proposed upgrades to the surface water management system including new swales and emergency spill basins. In addition, the proposed particle board facility including the chippers and silos would be enclosed to minimise the risk of stormwater pollution from the site. The Department has included conditions requiring the Applicant to prepare a SWMP which would include details of a water quality monitoring plan, response plan and procedures for maintaining the proposed surface water management structures.

The Department concludes the Applicant's proposed stormwater harvest and reuse scheme is an appropriate measure to manage the expected increase in surface water flows from the proposed development. The Department has recommended that details of the stormwater harvest and reuse scheme be included in the SWMP. The Department's assessment concludes the potential impacts of the proposed development on existing surface water resources are able to be minimised and managed by the Applicant via the implementation of proposed stormwater measures and upgrades to the site's surface water management system as well as consent conditions recommended by the Department.

5.3. Noise

The proposed development has the potential to generate additional noise impacts at the nearest sensitive receivers during construction and operation. The proposed development is located within the site footprint of the MDF facility, which currently operates 24 hours a day, 7 days a week. The site also has a history of noise issues associated with the operation of the MDF facility due to its close proximity to Oberon. The nearest sensitive receiver is located 600 m to the south of the site (see **Figure 11**).

The MDF facility currently has noise limits under DA 27/95, however these noise limits were set in 1995 and pre-date the *NSW Industrial Noise Policy (INP)* and *Interim Construction Noise Guidelines (ICNG)*. The MDF facility's EPL includes operational noise limits that are based on the INP and are more contemporary. Therefore, the Department has considered the Applicant's assessment of operational noise against the noise limits in the EPL.

The Applicant prepared a Noise and Vibration Impact Assessment (NVIA) in accordance with the ICNG and the INP, which considered the worst-case noise emissions during construction and operation of the proposed development.

Construction Noise

The key noise sources during construction would be from plant and equipment during key construction activities, which are proposed to be undertaken during the regular operation of the MDF facility. Construction activities are proposed to occur during the following times: Monday to Friday 7:00 am to 7:00 pm, Saturday 8:00 am to 1:00 pm and no works on Sundays and public holidays. Construction works are expected to take up to 24 months to complete.

The Applicant indicated the MDF facility's operational EPL noise limits would be adopted for the construction works (see **Table 8**). Evening noise limits would be applied for construction works occurring between 6:00 pm and 7:00 pm. For short duration high noise emitting tasks such as rock/concrete breaking, the construction noise criterion of 75 dB(A) would be applied as per the ICNG.



Figure 11: Sensitive Receivers and Monitoring Locations

Table 8: Proposed Construction Noise Limits and EPL Operational Noise Limits

Period	Construction Noise Limits dB(A)	EPL Operational Noise Limits dB(A)
Day (7:00 am to 6:00 pm)	55	55
Evening (6:00 pm to 10:00 pm)	50	50
Night (10:00 pm to 7:00 am)	N/A	45

The NVIA modelled six construction scenarios for earthworks, infrastructure installation and rock/concrete breaking activities, which were modelled with and without the operation of one mobile wood chipper. The scenarios also included the operation of the MDF facility. The assessment was considered conservative as it assumed all construction plant within each scenario would operate concurrently at full power.

For the earthworks and installation construction scenarios, the assessment predicted noise emissions would generally comply with daytime noise limits. However between 6:00 pm and 7:00 pm, evening noise limits are predicted to be exceeded at a number of receivers (R02, R03, R06, R08, R09 and R10) ranging from 1 to 8 dB above the criteria of 50 dB(A) when modelled with a mobile wood chipper operating concurrently with construction plant (See **Figure 11**).

The assessment also found the noise predictions for rock breaking scenarios with mobile wood chippers would comply with the construction noise criterion of 75 dB(A), with the highest predicted noise level being 65 dB(A) at R09 (15-19 Albion Street) during the evening period.

The Applicant has committed to implementing a number of mitigation measures to manage construction noise including:

- restricting the use of the mobile wood chippers under certain meteorological conditions and when several construction plants are in use to reduce noise. The NVIA noted mobile chippers are currently restricted to daytime periods only and recommended the mobile wood chippers should not operate during high noise emitting rock/concrete breaking activities; and
- undertaking noisy construction activities during the daytime period.

Council and the EPA raised no concerns in relation to construction noise, however the EPA noted the existing operational noise limit of 50 dB(A) would apply for construction works being undertaken between the proposed 6:00 pm and 7:00 pm period. The Department considers the overall impacts would be

acceptable, and any potential exceedance during the evening period would be minor and irregular in occurrence.

The Department also considers the construction impacts would be short term and could effectively be managed through the implementation of mitigation measures. The Department has recommended the Applicant prepare a Construction Noise Management Plan which would detail the specific mitigation measures to be implemented including those outlined in the NVIA, as well as consultation procedures for informing residents of noisy works and procedures for responding to noise complaints. With these management measures in place, the Department's assessment concludes the potential construction noise impacts of the proposed development would be acceptable.

Operational Noise

The key noise sources from the proposed development include operation of the dry mills, flakers (converts wood chips into flakes), screens, debarker and chipping plant, in addition to existing operational noise sources including fixed plant (such as fans and exhaust stacks), front end loaders and an existing enclosed electric chipper and debarker. The MDF facility also operates two mobile wood chippers which are only used when there is a breakdown or scheduled maintenance of the existing enclosed electric chipper. As the mobile wood chippers emit the highest level of noise at the site, it is currently restricted to daytime operation only.

The existing EPL operational noise limits are shown in **Table 9**. The EIS noted the site as it currently operates, is approaching the EPL noise limits and with the addition of the proposed development, there is potential for overall noise levels to exceed the existing EPL noise limits.

The NVIA modelled four scenarios including two day scenarios (one with a mobile wood chipper operational and the other with an electric chipper operational), an evening and night-time scenario. Under a worst-case scenario, the modelling predicted compliance with the existing EPL noise limits for all receivers at all periods, except at R09 (15-19 Albion Street) for which a minor 1 dB exceedance (56 dB(A)) is predicted for the daytime period, when a mobile wood chipper is operational (see **Table 9**). The NVIA stated these noise predictions are dependent on the Applicant achieving adequate sound power reductions on existing plant and equipment at the MDF facility.

Table 9: Predicted Noise Impacts at the Nearest Affected Receivers – L_{Aeq} , 15 minute

Receptor	Day 1 (with mobile chipper)	Day 2 (no mobile wood chipper)	Evening	Night
	EPL Operational Noise Limits			
	55	55	50	45
R03 – Oberon High School	53	44	44	43
R09 – 15 -19 Albion Street	56	47	47	45
R10 – Jenolan Caves Caravan Park	53	45	45	44

Note: Bolded numbers denotes an exceedance of the noise criteria

To ensure the site complies with the EPL noise limits, the Applicant is committed to implementing the following noise mitigation measures:

- reducing the sound power levels for existing plant and equipment at the MDF facility including the Conti 1 dryer fan, booster fan drive and main fibre fan drive through sound attenuation structures and enclosures;
- enclosing all new structures and installing acoustic panelling for plant and equipment associated with the proposed particle board facility; and
- restricting the use of the mobile wood chippers during periods of meteorological enhancement and only using the mobile wood chipper as a backup if the electric chipper fails.

The EPA advised the current operational noise limits in the EPL would not change and noted the predicted exceedances would likely be the result of the mobile wood chippers. The EPA recommended restrictions be placed on the operation of the mobile wood chippers under certain weather conditions, in addition to installing acoustic enclosures for the mobile wood chippers. In its RTS, the Applicant demonstrated placing restrictions on the mobile chippers under certain weather conditions would be sufficient enough to control noise from the mobile wood chippers without the need for acoustic enclosures. The EPA was satisfied with the Applicant's response.

The Department has formalised the EPL noise limits in the conditions of consent so that is it consistent with the INP. The Department also agrees with the EPA's recommendations and has included a condition

to restrict the operation of the mobile wood chippers under certain meteorological conditions (i.e. wind directions), as well as requiring the Applicant to prepare a Mobile Wood Chipper Operation Management Plan which would outline measures for managing noise from the mobile wood chippers. To ensure compliance with the noise limits, the Department recommends the Applicant verify the predictions in the NVIA particularly in relation to the proposed sound power level reductions for key plant and equipment, as committed to by the Applicant. This requirement has been included in the recommended conditions of consent.

Council also recommended the Applicant prepare an Operational Noise Management Plan which incorporates the Applicant's mitigation measures. The Department has included a condition to reflect this requirement. Public submissions received from the Jenolan Caves Caravan Park and CHH raised concerns about night-time noise and potential cumulative impacts with other nearby facilities. With regard to night-time noise levels, the Applicant demonstrated the predicted evening and night time levels would be well within the noise criteria, particularly as the mobile wood chippers would be restricted to daytime periods only. In terms of cumulative impacts, the Applicant also demonstrated noise emissions at the site are not expected to increase, therefore the cumulative noise impacts are expected to be minimal.

Based on the findings of the NVIA, the RTS and the Applicant's proposed mitigation and management measures, the Department considers the noise emissions from the proposed and existing operations can be adequately managed to meet the EPL noise limits and minimise impacts on the surrounding community, including the issues raised in the public submissions. The Department also notes the Applicant has previously undertaken a number of works at the site to improve the existing noise environment, such as installing silencers, a noise wall and enclosing an existing electric debarker and chipper.

With regard to the operation of the mobile wood chippers, the Department is satisfied the mobile wood chippers would not be an ongoing noise generating activity and would only be used as a backup unit. As the Applicant proposes to construct and operate two additional fully enclosed electric debarker and chipper plants, the Department considers this would reduce the Applicant's reliance on the use of the mobile wood chippers.

The Department considers noise from the proposed development would not adversely impact on sensitive receivers. The Department has recommended conditions to adequately manage noise, including noise limits, the requirement to implement all reasonable and feasible measures to minimise noise, restrictions on the use of the mobile wood chippers and further noise monitoring to demonstrate compliance with the noise limits.

Conclusion

The Department is of the view that potential construction noise impacts would be short-term and are able to be managed through adequate noise mitigation measures. The Department also considers the predicted exceedances during the evening period are likely to be infrequent as the Applicant has agreed to restrict the operation of the mobile wood chipper during certain construction activities and weather conditions. The Department has recommended conditions requiring the Applicant to prepare a CEMP for the proposed development.

The Department considers the operational noise emissions associated with the proposed development would be acceptable and can meet the site's EPL noise limits, provided the Applicant's commitments are implemented and adequate noise mitigation measures are applied to key plant and equipment such as the mobile wood chippers. To ensure consistency with the INP, the Department has modernised the noise limits in the conditions of consent. The Department, in consultation with the EPA, has recommended a number of conditions requiring the Applicant to prepare an ONMP and a Mobile Wood Chipper Management Plan and undertake a noise verification study to verify noise levels from the site are consistent with or lower than the predictions made in the NVIA and the noise limits. The Department's assessment concludes the potential noise impacts of the proposed development are minimal and can be managed by the Applicant.

5.4. Operation Under a Single Development Consent

The Applicant wishes to consolidate all of its operations (with the exception of the Woodchem facility) under a single development consent. This will enable the Applicant to appropriately manage all of its operations and will clarify the Applicant's regulatory and compliance obligations.

The Department is recommending DA 27/95 be modified to remove the land description and relevant environmental performance conditions that relate only to the MDF facility. To facilitate this process, the Department has imposed a condition requiring the modification of DA 27/95 under Section 80A(1)(b) of the EP&A Act. A separate schedule in the SSD consent provides instruction for what is to be modified in DA 27/95 and Clause 97 of the EP&A Regulation sets out how the Applicant is to prepare the notice of modification to fulfil this requirement.

The Department considers imposing conditions requiring the modification to DA 27/95 is the appropriate pathway because this will ensure the continued operation of DA 27/95 for those parties that still rely upon that consent, and it will enable the relevant conditions that apply to the MDF facility to be transferred to the new consent. The Department has considered the modifications to DA 27/95 in **Table 10** below.

The Department has also included conditions in the new SSD consent which relate to the ongoing operation and management of the MDF facility, particularly hazards and risk and ongoing environmental management of the site.

The Department understands the Applicant has implemented an emergency plan (EP) and safety management system (SMS) for the MDF facility and that the EP and SMS will remain in place for the MDF facility during construction and will be updated prior to commencement of operation of the proposed development. A condition has been included in the recommended consent, requiring the Applicant to continue implementing the EP and SMS for the MDF facility, until the proposed development has commenced operation.

The Department also notes the environmental management requirements of the MDF facility will continue under the new SSD consent. The MDF facility currently operates under an EMP however, the Department considers this plan is not in line with modern EMPs. The Department recommends the Applicant prepare and implement a new Operational Environmental Management Plan and associated subplans for the operation of the MDF facility to be completed within six months from the date of determination. These plans would then be required to be updated again prior to the commencement of operation of the proposed development. In addition, existing conditions from DA 27/95 around trade waste and traffic routes have been duplicated and contemporised in the new SSD consent.

The Department considers the recommended SSD consent for the proposed development will be more efficient and modern and will simplify the Applicant's management and regulatory obligations for the site. The Department notes that DA 27/95 (as modified) will continue to operate on the residual land to which that consent applies (see **Figure 2**).

Table 10: Modifications to DA 27/95

Issue	Conditions/Description to be Modified	Consideration
<i>Land Description</i>	Lot 2, DP 785979, Lowes Mount Road; Part Lot 20, DP 661955, off Horace Street	<ul style="list-style-type: none"> The Applicant proposes to continue operating the MDF facility and wishes to combine all of its operations under a single development consent. The Department has recommended amending the land description so that the lot and deposited plans (DP) for the MDF facility are removed from DA 27/95. These lot and DPs are listed in the adjacent column.
<i>Noise</i>	Condition 35A	<ul style="list-style-type: none"> Condition 35A requires the Applicant to install acoustic panelling and insulation in the debarker enclosure. Construction of the debarker enclosure has been completed and therefore Condition 35A is no longer required. The Department has recommended deleting Condition 35A, however, the Department has recommended a new condition in the SSD consent requiring the Applicant to maintain all existing noise attenuation measures on-site for the life of the development. This is to ensure all existing noise attenuation measures and structures for the site remain in place.
<i>Cogeneration Units</i>	Conditions 35B, 35C, 37B and 37C	<ul style="list-style-type: none"> The Applicant has approval to install and operate two cogeneration units which are located within the MDF facility. The Applicant indicated the cogeneration units are not yet operational and will be commissioned at a later stage.

		<ul style="list-style-type: none"> The Department notes Conditions 35B, 35C, 37B and 37C require the Applicant to undertake post-commissioning noise and air verification studies. As such, the Department has recommended these conditions be deleted from DA 27/95 and carried over to the SSD consent to ensure the verification studies are still undertaken.
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5.5. Other Issues

The Department's assessment of other issues is provided in **Table 11**.

Table 11: Assessment of Other Issues

Consideration	Recommended Conditions
Traffic and Transport	
<ul style="list-style-type: none"> A Traffic Impact Assessment (TIA) was prepared which assessed the potential construction and operational impacts of the proposed development. Site access is provided off Lowes Mount Road at two gates (northern gate for staff and distribution trucks, and southern gate for staff). A third access gate is located off Endeavour Street which is mainly used by log trucks. The site currently has 114 car parking spaces supplied on site for staff. <p><u>Construction</u></p> <ul style="list-style-type: none"> Construction is expected to take around 24 months and would employ around 230 staff. During the peak construction period, there would be a maximum of 240 light vehicle movements and 60 heavy vehicle movements per day. The TIA found the construction works are likely to have a minimal impact on the existing transport network, with the majority of vehicle movements occurring outside the AM and PM peak periods. The Applicant has committed to preparing a Construction Traffic Management Plan (CTMP) which would include details of haulage routes and parking. RMS and Council did not raise any issues, however Council requested the Applicant prepare a dilapidation report on Council's pavement assets as part of the CTMP. The Department agrees with Council. A condition to this effect has been included in the consent. The Department considers the construction works would be temporary in nature and are not likely to impact on the local road network. <p><u>Operation</u></p> <ul style="list-style-type: none"> The number of light vehicle movements would increase from 292 (existing) to 388 (2029 scenario) vehicle movements per day. The number of heavy vehicle movements would also increase from 122 (existing) to 320 (2029 scenario) vehicle movements per day. The TIA stated all intersections would experience minor increases in queue lengths and average delays, but would continue to operate at a Level of Service (LoS) A (good operation). The Applicant also proposes to provide up to 231 new car parking spaces and access for heavy vehicles to the new particle board facility would be via the southern gate. RMS and Council did not raise any concerns. A submission from CHH raised concerns about whether the traffic study considered the current usage of other businesses along Lowes Mount Road. The Department notes the TIA included heavy vehicle movements from adjacent facilities like HPP and Structaflor and considers the road network has adequate capacity. The Department has included standard conditions requiring the Applicant to ensure heavy vehicles do not queue on the public road network and should only use specific heavy vehicle routes which bypass the Oberon town centre. The Department's assessment concludes the potential traffic impacts would be acceptable, subject to the recommended conditions. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> prepare a construction traffic management plan and dilapidation report; ensure there is no queuing onto the public road network; and ensure heavy vehicles only utilise Oberon bypass roads.
Hazards and Risk	
<ul style="list-style-type: none"> The EIS included a SEPP 33 risk screening analysis to determine whether the proposed development should be considered a 'potentially hazardous industry'. SafeWork NSW also requested the EIS consider whether the site should be a Major Hazard Facility (MHF) given the proposed development and the adjacent Woodchem facility (which is a MHF) are owned by the same parent company. The site currently stores a number of dangerous goods including diesel, aviation fuel, liquid petroleum gas and hot oil. These dangerous goods are currently stored in above ground tanks near the existing warehouse (see Figure 3). 	<p>Require the Applicant to prepare and/or update the following hazard studies:</p> <ul style="list-style-type: none"> fire safety study; hazard operability study; final hazard analysis;

Consideration	Recommended Conditions
<ul style="list-style-type: none"> • The proposed development would not result in an increase in the volume of dangerous goods stored on site and does not trigger SEPP 33. • The risk screening document also identified other hazards that may arise from the proposed development including dust explosions, hazardous processing conditions (high temperatures and pressures) and reactions between materials. • The Department considers the above hazards are unlikely to result in off-site impacts, however, additional information was required to assess the propagation risk to nearby plant and equipment against the risk criteria in the Department's <i>Hazardous Industry Planning Advisory Paper No. 4 – Risk Criteria</i> (HIPAP No. 4). • The Applicant indicated a number of safeguards would be in place such as spark extinguishing and fire suppression systems and ensuring explosion panels face away from the site. The Department considers the additional safeguards would address the potential risks, particularly dust explosions. • FRNSW did not raise any concerns about the proposed development, however SafeWork NSW commented about the shared water and fire safety infrastructure between the MDF facility and the Woodchem facility. SafeWork NSW recommended the Fire Safety Study for the site be updated to consider any neighbouring impacts between the two facilities, particularly the impact of a potential methanol storage tank fire at the Woodchem facility. The Applicant has agreed to update the existing fire safety study for the site to address SafeWork's concerns. • The Department considers the proposed development is not a MHF as it does not meet the MHF requirements and notes the proposed development and the neighbouring Woodchem facility would operate independently of each other. SafeWork did not raise any further issues. • The Department's assessment concludes the risk to surrounding land uses satisfies the risk criteria outlined in HIPAP No.4, however a number of hazard studies are recommended to ensure the risk to the surrounding land uses is minimised. This includes pre and post-construction hazard studies and ongoing studies including hazard audits. 	<ul style="list-style-type: none"> • construction safety study; • emergency plan; • safety management system; • pre and post start up compliance reports; and • hazard audit.
<p>Waste Management</p>	
<ul style="list-style-type: none"> • The MDF facility's existing waste management system consists of recycling wood waste products (bark, wood dust) for fuel and recycling process wastewater via the site's water treatment plant. • Waste products that cannot be recycled on-site such as boiler ash, is disposed of to landfill. The Applicant also has a trade waste agreement with Council for off-site disposal of brine (by-product of the water recycling process) into Council's sewerage system. • During construction of the proposed development, the main waste products generated would include surplus construction materials, demolition waste and vehicle fluids. Demolition and construction waste such as steel, wood and building materials would be recycled where possible, with remaining material to be disposed of off-site. • During operation, the proposed development would result in an increase in a number of operational waste products including process wood dust, reject particle board, bark from log processing and wastewater from the wet scrubber pollution control device and WESP. • The Applicant indicated these materials would be reused or recycled on-site, however some wood waste materials such as untreated timber pallets may be sourced externally. These timber pallets would be used as a raw material in the particle board manufacturing process. • The EPA noted the Applicant is required to seek an amendment to its EPL to use any off-site wood waste materials. The Department has included this requirement in the conditions of consent. • The EPA also commented on whether the wastewater treatment plant has capacity to treat the additional volume of wastewater, which is expected to be around 128,000 litres per year. Council did not raise any concerns, however, one public submission raised concerns about the off-site disposal of boiler ash. • The Applicant confirmed the wastewater treatment plant is currently operating at approximately 50% capacity and has capacity to treat the additional volume of wastewater. In relation to boiler ash, the proposed development is not expected to generate a significant amount of ash, however the Applicant is currently researching alternatives to boiler ash disposal including its suitability for on-site reuse as fill. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> • prepare and implement a waste management plan during construction and operation of the proposed development; and • implement reasonable and feasible measures to minimise waste.

Consideration	Recommended Conditions
<ul style="list-style-type: none"> The Department considers the Applicant's proposed waste management strategy would be adequate for managing the anticipated increase in waste generated during construction and operation of the proposed development. The Department has included a number of conditions requiring the Applicant to prepare and implement a waste management plan. The Department's assessment concludes waste impacts would be minimal and can be adequately managed, subject to conditions. 	
Soil and Contamination	
<ul style="list-style-type: none"> The proposed development is located on land that has been extensively disturbed due to current and previous industrial uses at the site. The site also contains a number of former contaminated areas which have all been remediated including Kings Stockyard Creek and the CSR fibre dump, with the exception of a former fuel depot (Lot 1 DP 1085563, see Figure 2) at the south-west corner of the site which is currently being remediated by the Applicant. During construction, approximately 2,720 t of soil would be excavated but would be reused on site. The EIS indicated there is potential for erosion to occur and for soil contamination to be present at the former fuel depot site. The Applicant has committed to implementing appropriate erosion and sediment controls in accordance with the Blue Book and it would undertake investigations and remediate the former fuel depot site. The Department considers any potential soil impacts would be minimal due to the low quantities of soil proposed to be excavated and recommends formalising the Applicant's commitments in the conditions. The Department notes that part of the proposed development would be located on the former fuel depot site, which is currently being remediated by the Applicant. The Department has recommended the Applicant provide a site validation certificate prior to commencement of construction to ensure the land is suitable for the proposed development. During operation, potential soil impacts would be minor as the majority of the site would be sealed with permanent hardstand. Council noted any potential impacts associated with the remediation area of King Stockyard Creek (which was previously contaminated with Aldrin and Dieldrin) should be addressed. A submission from CHH also raised concerns about buried contaminated material in the CSR fibre dump, which may be disturbed by the proposed development. In its RTS, the Applicant confirmed the proposed development would not disturb any remediated areas on site particularly the Kings Stockyard Creek and CSR fibre dump. The Department considers the permanent hardstand proposed to be constructed over the capped CSR fibre dump would not result in any disturbance to the contaminated material. The Applicant also confirmed the works would require additional infilling (material to be sourced off-site) to level up the site. The Department has included a condition requiring the Applicant to only use virgin excavated natural materials (VENM) or natural excavated materials (ENM). The Department's assessment concludes the potential soil and contamination impacts would be minimal and can be managed by the Applicant. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> implement erosion and sediment controls in accordance with the Blue Book; and provide a site validation certificate of the former fuel depot to ensure it is suitable for its intended use; only use VENM and ENM.
Biodiversity	
<ul style="list-style-type: none"> A Biodiversity Assessment Report (BAR) was prepared in accordance with the OEHS Framework for Biodiversity Assessment (FBA), which assessed the potential impacts of the proposed development. The proposed hardstand and new stormwater basins would be located on disturbed land and modified native grassland in the north-east corner of the site (see Figure 2). This area was chosen due to its close proximity to the MDF facility. The proposed particle board facility would be located within the existing footprint of the MDF facility. The BAR found the proposed development would result in a minor impact (removal of 1.1 ha) on a degraded Endangered Ecological Community (Apple Box – Yellow Box Grassy Woodland of the SE Highlands Bioregion). The BAR also indicated there would be no impact on any Critically Endangered Ecological Communities and concluded offset requirements are not required for the proposed development. The OEHS did not raise any concerns and agreed no offsets were required due to the poor condition of the native vegetation. The Applicant has committed to implementing a number of conditions such as retaining all remaining native vegetation where possible, controlling and 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> manage and control noxious weeds; and retain native vegetation where possible.

Consideration	Recommended Conditions
<p>managing noxious weeds and implementing erosion and sediment controls. The Department has included these commitments in the recommended conditions.</p> <ul style="list-style-type: none"> The Department considers the proposed development would not impact on any critical habitat or any critically endangered or threatened species and populations. The Department's assessment concludes the potential biodiversity impacts would be minimal but has included standard conditions requiring the Applicant to manage and control weeds and retain native vegetation where possible. 	
Groundwater	
<ul style="list-style-type: none"> The proposed development has the potential to result in groundwater impacts during construction and operation of the proposed development. The EIS indicated the potential for this to occur would be low as the Applicant is committed to implementing a number of surface water mitigation measures as discussed in Section 5.2, such as directing dirty water into swales and gross pollutants traps to prevent groundwater contamination. The Applicant has a licence to extract water from an on-site spring fed dam but confirmed it would not be extracting additional water in excess of this licence. DPI Water did not raise any issues. However, a submission from CHH raised issues relating to potential groundwater impacts noting the aquifer is within 1 m of the stormwater drainage network, and any changes to groundwater flows could impact on the CSR fibre dump on site. In its RTS, the Applicant confirmed the proposed development, particularly excavation works would not intercept the groundwater nor disturb the CSR fibre dump. The Department has considered the Applicant's commitments and is satisfied that groundwater impacts would be adequately managed. The Department has recommended a standard condition requiring the Applicant to obtain any necessary licences should groundwater be intercepted. The Department's assessment concludes the groundwater impacts would be minimal and can be managed by the Applicant. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> obtain necessary water licences should groundwater be intercepted.
Visual Amenity	
<ul style="list-style-type: none"> A Visual Impact Assessment (VIA) was prepared which assessed the potential visual impacts of the proposed development. The site is located on the northern outskirts of Oberon within an existing industrial area. The surrounding area is characterised by rolling hills and State forests. Two large timber processing facilities, the HPP sawmill and the Structaflor particle board facility are located next to the proposed development, on the western side of Lowes Mount Road. The proposed development would be constructed within the existing footprint of the MDF facility (see Figure 2). The components of the proposed development which may have potential visual impacts include two new silos at a height of 42.5 m and a new warehouse at a height of 35 m. These buildings are large in scale but are consistent with the size and scale of the existing structures on site. The VIA found the proposed development would have an overall low impact on the visual character of the area. This is because the existing infrastructure and the adjacent timber processing facilities have been a visible part of the Oberon skyline for a number of years. The proposed development would be located within this area with structures of a similar height and scale to the existing buildings on site. The VIA recommended a number of mitigation measures including screening vegetation along the boundary, ensure building materials are similar to existing buildings and design external lighting in accordance with industry standards. Council did not raise any concerns but requested the recommendations in the VIA be included in the consent and further landscaping be undertaken along the boundary of the site. The Department considers the proposed development is not visually intrusive and complements the surrounding industrial land uses. The Department recommends the Applicant's commitments be formalised in the conditions of consent and that the Applicant carry out landscaping along the boundary of the site. The Department's assessment concludes the visual impacts of the proposed development would be minimal and can be adequately managed. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> implement all recommendations in the VIA; and ensure landscaping is undertaken on the boundary of the site.

Consideration	Recommended Conditions
Development Contributions	
<ul style="list-style-type: none"> The Applicant is required to make development contributions for the proposed development as set out under Council's development contributions plan. The plan only permits a contribution towards road maintenance works. Council recommended a development contribution of \$15,000 per annum (adjusted for consumer price index (CPI)), towards ongoing road maintenance of Lowes Mount Road as well as requesting that part of this contribution be used by Council to enhance community facilities in the Oberon area as identified in its contributions plan. The Applicant has agreed with Council to pay an annual contribution of \$15,000. As the agreed contribution is proposed to be used in a manner that differs from what the plan sets out, it is not possible to use Section 94 of the EP&A Act to impose a condition for contributions. The Minister does have the power to impose a condition under Section 94B of the EP&A Act where it has had regard to any contributions plan that applies to the development. The Department recognises the additional workforce would generate increased demand on a number of public services including roads, infrastructure and recreational facilities. The Department has considered Council's development contributions plan and notes the Applicant's contributions would go towards services, facilities and amenities already identified in the plan. The Department considers the proposed contribution is reasonable and in this regard, has recommended that a condition under Section 94B of the EP&A Act be imposed, requiring the Applicant to make an annual contribution of \$15,000 (adjusted for CPI) to Council for the life of the particle board facility. 	<p>Require the Applicant to:</p> <ul style="list-style-type: none"> pay \$15,000 per annum for the life of the particle board facility, within 12 months of the commencement of operation of the particle board facility.

6. CONCLUSION

The Department's assessment of the application has fully considered all relevant matters under Section 79C of the EP&A Act, the objects of the EP&A Act and the principles of ecologically sustainable development.

The MDF facility has been in operation since the 1980s and is a significant contributor to the local and regional economy. However, due to its large scale and close proximity to Oberon, the site has had a history of air quality, noise and surface water management issues. The proposed development would provide an opportunity to address these previous issues and would also assist the Applicant in ensuring the long-term sustainability of the site.

The Department's assessment concludes the proposed development would:

- meet operational noise criteria at the closest residential receivers, provided the Applicant implements noise attenuation measures on existing and proposed plant and equipment;
- meet air quality criteria for particulate matter, nitrogen dioxides and formaldehyde emissions at all residential receivers; and
- result in improvements to surface water quality, subject to implementation of the Applicant's proposed surface water mitigation measures including new stormwater basins and stormwater harvesting and reuse.

The Department has recommended a number of conditions to manage and monitor air quality, traffic, noise, surface water, hazards and risks including but not limited to implementation of:

- best practice technology and an air emissions program to manage air emissions from the proposed development;
- noise mitigation measures, including noise attenuation measures, measures to manage mobile wood chipper operation and preparation of an operational noise management plan;
- stormwater management measures to address surface water impacts during construction and operation of the development and preparation of a surface water management plan; and
- a number of hazard studies to ensure the risk from the proposed development to the surrounding environment is minimised.

The Department has also recommended conditions for ongoing environmental management, including regular and incident reporting and regular independent environmental audits. Further to this, the

Department has recommended consolidating the Applicant's existing operations into one development consent, which will assist with compliance and ongoing management at the site.

The proposed development would provide an investment of approximately \$106.1 million to the Oberon and Orana and Central West region and will generate 230 jobs during the construction phase and 70 jobs during operation. The proposed development also represents a significant investment for the timber industry and manufacturing sector in NSW.

The Department considers the proposed development would improve the overall environmental performance of the site. With the commitments made by the Applicant and the implementation of the recommended conditions of consent, the Department concludes the impacts of the proposed development can be mitigated and/or managed to ensure an acceptable level of environmental performance. Consequently, the Department considers the development is in the public interest and should be approved, subject to conditions.

7. RECOMMENDATION

It is recommended that the Executive Director, Key Sites and Industry Assessments:

- **consider** the findings and recommendations of this report;
- **approve** the development application under section 89E of the EP&A Act; and
- **sign** the attached development consent (refer **Appendix A**).

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29/5/2017

APPENDIX A: DEVELOPMENT CONSENT

APPENDIX B: CONSIDERATIONS UNDER SECTION 79C

Section 79C of the EP&A Act requires that the consent authority, when determining a development application, must take into consideration the following matters:

<p>(a) the provisions of:</p> <p>(i) any environmental planning instrument, and</p> <p>(ii) any proposed instrument that is or has been the subject of public consultation under this Act and that has been notified to the consent authority (unless the Director-General has notified the consent authority that the making of the proposed instrument has been deferred indefinitely or has not been approved), and</p> <p>(iii) any development control plan, and</p> <p>(iiia) any planning agreement that has been entered into under section 93F, or any draft planning agreement that a developer has offered to enter into under section 93F, and</p> <p>(iv) the regulations (to the extent that they prescribe matters for the purposes of this paragraph), and</p> <p>(v) any coastal zone management plan (within the meaning of the <i>Coastal Protection Act 1979</i>) that apply to the land to which the development application relates,</p>	<p>Detailed consideration of the provisions of all environmental planning instruments (including draft instruments subject to public consultation under this Act) that apply to the proposed development is provided in Appendix C of this report.</p> <p>The Applicant has not entered into any planning agreement under section 93F.</p> <p>The Department has undertaken its assessment of the proposed development in accordance with all relevant matters as prescribed by the regulations, the findings of which are contained within this report.</p> <p>The site is not located within the coastal zone and the Department is not aware of any coastal zone management plan that applies to the land to which the development application relates.</p>
<p>(b) the likely impacts of that development, including environmental impacts on both the natural and built environments, and social and economic impacts in the locality,</p>	<p>The Department has considered the likely impacts of the development in detail in Section 5 of this report. The Department concludes that all environmental impacts can be appropriately managed and mitigated through recommended conditions of consent.</p>
<p>(c) the suitability of the site for the development,</p>	<p>The development is a suitable land use for the site, given its location within the footprint of the existing MDF facility. In addition, the site is zoned for industrial purposes and the development is permissible with development consent in this zone.</p>
<p>(d) any submissions made in accordance with this Act or the regulations,</p>	<p>All matters raised in submissions have been summarised in Section 4 of this report and given due consideration as part of the assessment of the proposed development in Section 5 of this report.</p>
<p>(e) the public interest.</p>	<p>The recommended conditions of consent impose a range of controls, which the Department considers will mitigate any potential environmental impacts of the proposed development.</p> <p>On balance, the proposed development is considered to be in the public interest.</p>

APPENDIX C: CONSIDERATION OF ENVIRONMENTAL PLANNING INSTRUMENTS

State Environmental Planning Policy (State and Regional Development) 2011

State Environmental Planning Policy (State and Regional Development) 2011 (SRD SEPP) identifies certain classes of development as SSD.

In particular, Clause 4 of Schedule 1 of the SRD SEPP classifies timber processing facilities with a capital investment value of more than \$30 million as SSD. The proposal satisfies the classification of land use being a timber processing facility and meets the capital investment requirements as required by Clause 4.

State Environmental Planning Policy No. 33 – Hazardous and Offensive Development (SEPP 33)

SEPP 33 aims to identify proposed developments with the potential for significant off-site impacts, in terms of risk and/or offence (odour, noise etc). A development is defined as potentially hazardous and/or potentially offensive if, without mitigating measures in place, the development would have a significant risk and/or offence impact on off-site receptors.

The Applicant provided a SEPP 33 risk screening document as part of the EIS. Although no hazardous chemicals exceeded the screening assessment requirements when Applying SEPP 33 criteria, a number of hazards were identified which may arise from the proposed development including dust explosions, hazardous processing conditions (high temperatures and pressures) and reactions between materials. The Department's assessment of hazards and risk is contained in **Section 5.1** of this report.

State Environmental Planning Policy 55 - Remediation of Land (SEPP 55)

State Environmental Planning Policy No. 55 – Remediation of Land (SEPP 55) aims to provide a State wide approach to the remediation of contaminated land. In particular, SEPP 55 aims to promote the remediation of contaminated land to reduce the risk of harm to human health and the environment by specifying:

- under what circumstances consent is required;
- the relevant considerations for consent to carry out remediation work; and
- that remediation works undertaken meet certain standards and notification requirements.

The EIS stated the site contains a number of former contaminated areas which have been remediated including Kings Stockyard Creek and the CSR fibre dump. However, a former fuel depot at the south-west corner of the site is currently being remediated by the Applicant. The Department has recommended the Applicant provide a site validation certificate prior to commencement of construction to ensure the land is suitable for the proposed development. The Department reviewed the assessment and considers the development would be undertaken consistently with the aims, objectives and provisions of SEPP 55.

State Environmental Planning Policy (Infrastructure) 2007

The Infrastructure SEPP (ISEPP) aims to facilitate the effective delivery of infrastructure across the State by improving regulatory certainty and efficiency, identifying matters to be considered in the assessment of development adjacent to particular types of infrastructure development, and providing for consultation with relevant public authorities about certain development during the assessment process.

The proposal constitutes traffic generating development under Schedule 3 of the ISEPP and was referred to the RMS for comment. RMS confirmed that they have no objection to the proposed development. The development is considered to be consistent with the aims and objectives of the ISEPP, and the requirements of Clause 104 of the SEPP, as demonstrated by the response received from the RMS and in the assessment of the proposal contained in **Section 5** of this report.

Oberon Local Environmental Plan 2013 (Oberon LEP)

The Oberon LEP aims to preserve rural land for all types of primary production, facilitate a range of employment opportunities, promote ecologically sustainable development, protect area of natural significance, minimise land use conflicts and adverse environmental impacts, and to protect and conserve objects and places of archaeological and heritage significance. The site is zoned IN1 General

Industrial under the LEP. Under this zone timber processing facilities are permissible with consent. The Department considers the proposal is consistent with the aims of the LEP.

APPENDIX D: ENVIRONMENTAL IMPACT STATEMENT

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7016

APPENDIX E: SUBMISSIONS

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7016

APPENDIX F: RESPONSE TO SUBMISSIONS

See link: http://majorprojects.planning.nsw.gov.au/index.pl?action=view_job&job_id=7016