Summary

Client:

Green Distillation Tech Corp Ltd

Property

437 Woolmers Lane, Longford

Identification

Zoning: Rural Resource (Northern Midlands Interim Planning Scheme 2013).

CT 105810/1 (1045 ha).

Proposal:

A Tyre Recycling Plant to be built on a portion of the property.

Assessment comments:

Under the Northern Midlands Interim Planning Scheme 2013, consideration of the impact on natural values under the E8 Biodiversity Code is required. A field inspection was conducted on the 3<sup>RD</sup> May 2016 to confirm or otherwise the desktop study findings.

Conclusion:

The development area supports no native vegetation communities. The development within agricultural land will have minimal impact on threatened fauna species that may forage in the area, no other natural values will be impacted

Scott Livingston,

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Master Environmental Management, Natural Resource Management

Consultant.

gement, AK Consultants

#### INTRODUCTION

The title CT 105810/1 (1045 ha) is located on Woolmers Lane, Longford. Current zoning is Rural Resource, (Northern Midlands Interim Planning Scheme, 2013).

Development of a tyre recycling facility is proposed adjacent to existing tire stockpiles in the central portion of the property. The majority of the property is agricultural, including irrigated cropping. Some areas of native vegetation occur on the property with (DAZ) Eucalyptus amygdalina inland forest and woodland on Cainozoic deposits occurring around 800m to the south and 1km to the south east. Under the Northern Midlands Interim Planning Scheme 2013, consideration of the impact on natural values from the proposed development is required.

An initial desktop assessment was undertaken followed by a field inspection on the 3<sup>rd</sup> May 2016 to confirm or otherwise the desktop study findings and determine the vegetation community and potential habitat for threatened species. This report summarises the findings of the desktop and field assessment.

# METHODS

A Natural Values report was accessed from the DPIWE website on 28/4/2015. This report covers know sightings within 5km and fauna species whose predicted range boundaries overlay the site.

This was followed by a site visit on 3/5/16 by Scott Livingston. The site inspection concentrated on the immediate vicinity of the proposed development and adjacent tire storage area. Given the small area of the assessment the site was inspected with a narrowly spaced wandering meander technique, with all areas of variation within the site vegetation inspected.

The survey was conducted in May, which is outside a peak flowering period of many flora species. No survey can guarantee that all flora will be recorded in a single site visit due to limitations on seasonal and annual variation in abundance and the presence of material for identification. While all significant species known to occur in the area were considered, species such as spring or autumn flowering orchids may have been overlooked. Given the small area of vegetation assessed and the conversion to agricultural use the likelihood of plants being overlooked is low.

All mapping and Grid References in this report use GDA 94, Zone 55, with eastings and northings expressed as 6 & 7 digits respectively.

Flora taxonomy nomenclature used is consistent with Census of Vascular Plants of Tasmania, Tasmanian Herbarium 2015, From Forest to Fjaeldmark, Descriptions of Tasmania's Vegetation (Edition 2) Harris & Kitchener, 2005, Little Book of Common Names for Tasmanian Plants, Wapstra et al.

#### DESCRIPTION

The title is zoned as Rural Resource. TasVeg 3.0 maps the subject title as Agricultural Land (FAG) this was confirmed on the site inspection.

There are records of threatened flora species recorded on the title, however these are within the native forest (DAZ) and greater than 3km from the site. There are no records of threatened fauna species on the title (Department of Primary Industries, accessed 28/416).

See Appendix 1 for maps and Appendix 2 for photos.

# **NATURAL VALUES**

# **VEGETATION**

Vegetation on and surrounding the proposed development area is exotic pastures, a *Pinus radiata* shelterbelt bounds the recycling plant to the south. A single *Eucalyptus pauciflora* (Cabbage Gum) occurs south of the shelterbelt, outside the proposed development area. All other vegetation is exotic grasses, pasture weeds with gorse common.

#### FLORA

No record of exotic pasture and weed species was taken.

#### **FAUNA**

The Natural Values Atlas has records of threatened species *Pseudemoi pagenstecheri* (tussock skink) and *Sarcophilus harrisii* (Tasmanian devil) within 500m of subject title. Table 3 includes suitable habitat for threatened fauna species within 500m of the subject title (based on range boundaries).

Construction of buildings and associated infrastructure will have an impact on native vegetation and habitat, however the surrounding land provides similar habitat and the free ranging fauna species, which possibly forage in the area, will not be impacted to a great extent.

# RAPTOR NESTS

Nest for both Aquila audax (wedge-tailed eagle) and Tyto novaehollandiae (masked owl) have both been sited within 5000m of title. The site has a low (0-1/10) probability for Eagle Nest (FPA Model) and a mature habitat rating of nil in the Forest Practices Biodiversity Database, no evidence of existing nests or suitably sized hollows for masked owl was found on title.

Table 2: Threatened flora within 500m of subject title, Natural Values Atlas

Scientific Name	Common name	State	National	Within 500m	within 5km	Habitat Description	Habitat suitability development area	Survey time
Caesia calliantha	blue grasslily	R		Yes*		Found predominately throughout the Midlands in grassland or grassy woodland habitat, including grassy roadsides.	no suitable habītat	Oct-Dec
Isoetes elatior	tali quillwort	R		Yes*		Aquatic plant. Low altitudes with roots in gravel and silt substrates in moderately flowing waters. In calmer waters it grows in mud or silt. Only found in South Esk, St Pauls, Prosser, Break O'Day and Apsley Rivers.	no suitable habitat	Oct-Dec
Rhodanthe anthemoides	chamomile sunray	R		Yes*		Montane grasslands, heath and heathy scrub in central and north western Tasmania	no suitable habitat	

<sup>\* &</sup>gt;500m from development area

Table 1: Threatened fauna recorded on or with suitable habitat within 500m of the subject titles from the Natural Values Atlas.

Common name	Scientific Name	State	National	within 500m	within 5 km	Range class	Habitat Description	Habitat suitability development area
grey goshawk	Accipiter novaeholiandiae	e	~	NO	Yes	Potential Range	Potential habitat for the grey goshawk is native forest with mature elements below 600 m altitude, particularly along watercourses. FPA's Fauna Technical Note 12 can be used as a guide in the identification of grey goshawk habitat. Significant habitat for the grey goshawk may be summarised as areas of wet forest, rainforest and damp forest patches in dry forest, with a relatively closed mature canopy, low stem density, and open understorey in close proximity to foraging habitat and a freshwater body (i.e. stream, river, lake, swamp, etc.). FPA's Fauna Technical Note 12 can be used as a guide in the identification of grey goshawk habitat.	No suitable nesting/foraging
wedge- tailed eagle	Aquila audax subsp. fleayi	Pe	PEN	No	Yes	Potential Range	Potential habitat for the Wedge-tailed Eagle comprises potential nesting habitat and potential foraging habitat. Potential foraging habitat is a wide variety of forest (including areas subject to native forest silviculture) and nonforest habitats. Potential nesting habitat is tall eucalypt trees in large tracts (usually more than 10 ha) of eucalypt or mixed forest. Nest trees are usually amongst the largest in a locality. They are generally in sheltered positions on leeward slopes, between the lower and mid sections of a slope and with the top of the tree usually lower than the ground level of the top of the ridge, although in some parts of the State topographic	No suitable nesting habitat with SOOm, foraging may occur.

					shelter is not always a significant factor (e.g. parts of the northwest and Central Highlands). Significant habitat for the wedge-tailed eagle is all native forest and native non-forest vegetation within 500 m or 1 km line-of-sight of known nest sites (where the nest tree is still present).	
Green Lined Ground	Catadromus lacardairei	NO	Na	Potential Range	Potential habitat for the Green-lined Ground Beetle is open, grassy/sedgy, low altitude grasslands and woodlands associated with wetlands and low-lying plains or flats adjacent to rivers/streams. Key habitat elements that need to be present include sheltering sites such as patches of stones, coarse woody debris and/or cracked soils. The species is a highly active and mobile flyer that often comes to ground close to water sources and is rarely found further than 250 m from such a source.	No native grasslands

spotted- tailed quoll	Dasyurus maculatus	r	VU	No	Yes	Core Range	Potential habitat for the spotted-tailed quoil is coastal scrub, riparian areas, rainforest, wet forest, damp forest, dry forest and blackwood swamp forest (mature and regrowth), particularly where structurally complex areas are present, and includes remnant patches in cleared agricultural land or plantation areas. Significant habitat for the spotted-tailed quoil is all potential denning habitat within the core range of the species. Potential denning habitat for the spotted-tailed quoil includes 1) any forest remnant (>0.5ha) in a cleared or plantation landscape that is structurally complex (high canopy, with dense understorey and ground vegetation cover), free from the risk of inundation, or 2) a rock outcrop, rock crevice, rock pile, burrow with a small entrance, hollow logs, large piles of coarse woody debris and caves. FPA's Fauna Technical Note 10 can be used as a guide in the identification of potential denning habitat.	No suitable denning habitat, foraging may occur.
eastern quoll	Dasyurus viverrinus	E		No	Yes	Potential Range	The species is found in a variety of habitats including rainforest, heathland, alpine areas and scrub. However, it seems to prefer dry forest and native grassland mosaics which are bounded by agricultural land.	No suitable denning habitat, foraging may occur.

Swan galaxías	Galaxias fontanus			NO .	No	Potential Range	Potential habitat for the Swan Galaxias is slow to moderately fast flowing streams containing permanent water (even when not flowing), which have good instream cover from overhanging banks and/or logs, and shade from overhanging vegetation. A population can only be maintained where barriers have prevented establishment of trout and redfin perch. The nature of these barriers is variable and can include permanent natural structures such as waterfalls and chutes and also low flow-dependent features such as marshes, ephemeral water-losing and remnant channels, braided channel floodplain features. Significant habitat for the Swan galaxias is all potential habitat and a 30m stream-side reserve within the core range. This includes the Wildlife Priority Areas (Fauna Special Management Zones) on the upper Swan River, Tater Garden Creek and upper Blue Tier Creek, and other upper catchments of tributaries of the Macquarie, Blackman and Isis Rivers.	No suitable watercourses
white- bellied sea-eagle	Haliaeetus leucogaster	٧	~	NO	No	Potential Range	Potential habitat for the White-Bellied Sea-eagle species comprises potential nesting habitat and potential foraging habitat. Potential foraging habitat is any large waterbody (including sea coasts, estuaries, wide rivers, lakes, impoundments and even large farm dams) supporting prey items (fish). Potential nesting habitat is tall eucalypt trees in large tracts (usually more than 10 ha) of eucalypt or mixed forest within 5 km of the coast (nearest coast including shores, bays, inlets and peninsulas), large rivers (Class 1), lakes or complexes of large	No suitable nesting habitat with 500m, foraging may occur.

							farm dams. Scattered trees along river banks or pasture land may also be used. Significant habitat for the white-belied sea-eagle is all native forest and native non-forest vegetation within 500 m or 1 km line-of-sight of known nest sites (where nest tree still present).	
Hydroptila scamandr	caddis fly	R		NO	Yes	Outside Known Range	Upper Scamander River	Outside Range
Lathamus discolor	swift parrot	E	EN	NO	Yes			No suitable nesting or foraging
green and gold frog	green and gold frog	v	VU	NO	Yes	Potential Range	Potential habitat for the green and gold frog is permanent and temporary waterbodies, usually with vegetation in or around them. Potential habitat includes features such as natural lagoons, permanently or seasonally inundated swamps and wetlands, farm dams, irrigation channels, artificial water-holding sites such as old quarries, slow-flowing stretches of streams and rivers and drainage features.	No suitable waterbodies

eastern barred bandicoot	Perameles gunnii		VU	No	Yes	Core Range	Potential habitat for the eastern barred bandicoot is open vegetation types including woodlands and open forests with a grassy understorey, native and exotic grasslands, particularly in landscapes with a mosaic of agricultural land and remnant bushland. Significant habitat for the Eastern Barred Bandicoot is dense tussock grass-sagg-sedge swards, piles of coarse woody debris and denser patches of low shrubs (especially those that are densely branched close to the ground providing shelter) within the core range of the species.	May occur in adjacent gorse areas, no impact expected.
australian grayling	Prototroctes maraena			NO	NO	Potential Range	Potential habitat for the Australian Grayling is all streams and rivers in their lower to middle reaches. Areas above permanent barriers (e.g. Prosser River dam, weirs) that prevent fish migration, are not potential habitat.	
tussock skink	Pseudemoia pagenstecheri	v	2	No	Yes	Potential Range	Potential habitat for the tussock skink is grassland and grassy woodland (including rough pasture with paddock trees), generally with a greater than 20% cover of native grass species, especially where medium to tall tussocks are present.	No native grasslands
glossy grass skink	Pseudemola rawlinsoni			NO	NO	Potential Range	Potential habitat for the Glossy Grass Skink is wetlands and swampy sites (including grassy wetlands, teatree swamps and grassy sedgelands), and margins of such habitats.	No native swampy areas

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tasmanian devil	Sarcophilus harrisii	E	EB	Yes	Yes	Potential Range	Potential habitat for the Tasmanian devil is all terrestrial native habitats, forestry plantations and pasture. Devils require shelter (e.g. dense vegetation, hollow logs, burrows or caves) and hunting habitat (open understorey mixed with patches of dense vegetation) within their home range (4-27 km^2). Significant habitat for the Tasmanian devil is a patch of potential denning habitat where three or more entrances (large enough for a devil to pass through) may be found within 100 m of one another, and where no other potential denning habitat with three or more entrances may be found within a 1 km radius, being the approximate area of the smallest recorded devil home range (Pemberton 1990). Potential denning habitat for the Tasmanian devil is areas of burrowable, well-drained soil, log piles or sheltered overhangs such as cliffs, rocky outcrops, knolls, caves and earth banks, free from risk of inundation and with at least one entrance through which a devil could pass. FPA's Fauna Technical Note 10 can be used as a guide in the identification of potential denning habitat	No suitable denning habitat, foraging may occur.
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masked ow!	Tyto novaehallandiae	Pe	PVU	Yes	Yes	Core Range	Potential habitat for the masked owi is all areas with trees with large hollows (>=15 cm entrance diameter). In terms of using mapping layers, potential habitat is considered to be all areas with at least 20% mature eucalypt crown cover (PI-type mature density class 'a', 'b', or 'c'). From on-ground surveys this is areas with at least 8 trees per hectare over 100 cm dbh. Remnants and paddock trees in agricultural areas may also constitute potential habitat. Significant habitat for the masked owl is any areas within the core range of native dry forest with trees over 100cm dbh with large hollows (>=15 cm entrance diameter). In terms of using mapping layers for an initial desktop assessment prior to an onground survey significant habitat may occur in all areas within the core range classified as dry forest (TASVEG dry Eucalypt forest and woodland) with at least 20% mature eucalypt crown cover (PI-type mature density class 'a', 'b', or 'c'). From on-ground surveys this is areas with at least 8 trees per hectare over 100 cm dbh. Remnants and paddock trees in agricultural areas may constitute significant habitat.	No suitable nest trees within development area, foraging may occur.
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# **DISTURBANCE**

The Natural Values Atlas records 5 weed species (see table below) as being present within 500m. 3 of these species were found on the title during the site inspection with another weed species identified that is not recorded in the Natural Values Atlas.

Species	Common Name	Located on Site
Erica lusitanica	Spanish heath	No
Foeniculum vulgare	Fennel	No
Centauruim erythraea	Common centaury	Yes
Onopordum acanthium	Scotch thistle	Yes
Rubus fruticosus	Blackberry	no
Ulex europaeus	Gorse	Yes

# PREVIOUS CLEARING

All areas of the proposed development and surrounding areas have been cleared and converted to pasture.

# PROPOSED DEVELOPMENT/CLEARING OF VEGETATION

The proposed development will not require the clearing or disturbance of any native vegetation.

#### **CONCLUSIONS**

The development area supports no native vegetation communities. The development within agricultural land will have minimal impact on threatened fauna species that may forage in the area, no other natural values will be impacted.

# REFERENCES

- Department of Primary Industry, P. W. (accessed 28/5/16). Natural Values Report, Derived from the Natural Values Atlas, online database.
- DPIPWE. (2013). Tasmanian Vegetation Monitoring and Mapping Program TASVEG 3.0. Department of Primary Industries, Parks, Water and Environment.
- Northern Midlands. (2013). Northern Midlands Interim Planning Scheme 2015.
- Harris & Kitchener, (2005), From Forest to Fjaeldmark, Descriptions of Tasmania's Vegetation (Edition 2)
- Tasmanian Herbarium (2015), Census of Vascular Plants of Tasmania,
- Southern Tasmania Council Authority (2013). Guidelines for the use of Biodiversity Offsets in local government planning approval process.
- Wappstra et al (2010), Flowering Times of Tasmanian Orchids: A Practical Guide for Field Botanists,
- Wapstra et al. (2007) Little Book of Common Names for Tasmanian Plants,

# APPENDIX 1 - MAPS



Figure 1. Location,

Natural Values Report

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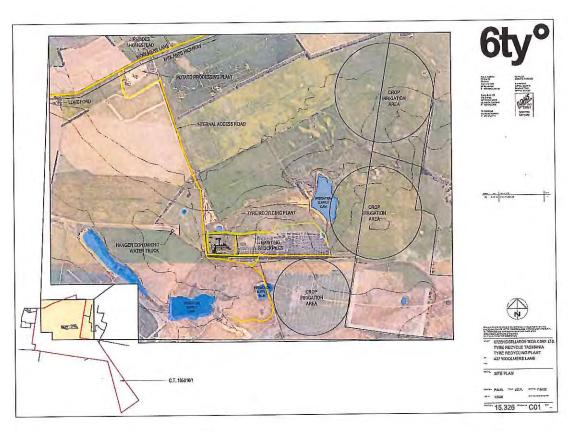


Figure 2. Site Plan Natural Values Report

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Taken by Scott Livingston 12<sup>th</sup> November, 2015



Figure 5: View north across development site from behind shelterbelt



Figure 6. view SE across development site



Figure 7. E. pauciflora south of development site



# Appendix H

Environmental Noise Assessment Report

# 437 Woolmers Ln, Longford Tyre shredder Environmental noise assessment



Report No. 421448-01

Vipac Engineers & Scientists Ltd PO Box 506 Kings Meadows TAS 7249





# DOCUMENT CONTROL

# 6TY° 437 WOOLMERS LN, LONGFORD TYRE SHREDDER ENVIRONMENTAL NOISE ASSESSMENT

Report No. 421448- 01

Prepared for

6tv°

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# References

- [1] SoundPLAN Acoustic modelling software Braunstein & Berndt GmbH.
- [2] CONCAWE The oil companies' international study group for conservation of clean air and water Europe (est. 1963) report 4/81.



# **Executive summary**

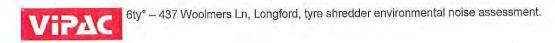
6ty°, on behalf of TD & SE Chugg Pty Ltd, commissioned Vipac to undertake an environmental noise assessment for a proposed tyre shredder to be installed at 437 Woolmers Lane, Longford.

Vipac proposed the following:-

- Develop an environmental noise model of the tyre shredder installation
- predict noise emission levels from the installation at the site boundary and noise sensitive receiver locations.

Predicted noise levels at noise sensitive locations surrounding the site were all below 20 dBA under neutral weather noise propagation conditions. At this level it is considered unlikely o noise emission from the installation would be audible during the day period.

Given the prediction results noise mitigation strategies are deemed unnecessary.



# 1 Introduction

6ty°, on behalf of TD & SE Chugg Pty Ltd, commissioned Vipac to undertake an environmental noise assessment for a proposed tyre shredder to be installed at 437 Woolmers Lane, Longford. This forms part of an Environmental Effects Report (EER) as requested by the Tasmanian Environmental Protection Agency (EPA).

The section relevant to noise from the Environmental Effects Report Guidelines, as provided by the Tasmanian EPA, is shown below:-

9. Noise emissions

 Will the activity include fixed or mobile equipment that emits noise? If yes, provide details of the noise sources including size, power ratings, noise attenuation and hours of operation.

Show the expected locations of the noise sources on the site plan and the location of nearby residences and other noise sensitive premises on

the area map (see Part B of these Guidelines).

 A suitably qualified acoustic consultant must be engaged to provide estimates of the resulting sound pressure levels at the site boundary and at any nearby noise sensitive areas, including businesses and rural dwellings.

 Potential impacts from noise generated by the activity must be described, and potential mitigation measures are to be considered and

discussed.

To address the EER Guidelines as shown above Vipac proposed the following:-

 Develop an environmental noise model of the tyre shredder installation using the SoundPLAN<sup>[1]</sup> modelling software package. Sound power spectral data sourced from manufacturers data where available, measured data from similar installations or Vipac library data.

Use the model to predict noise emission levels from the installation at the site boundary

and noise sensitive receiver locations.

The proposed installation is to be housed in a shed structure as detailed in figure 1 below. Vipac assumes that operation of the tyre shredder would occur during the day period only (0600 – 1800 hrs).

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6ty° - 437 Woolmers Ln, Longford, tyre shredder environmental noise assessment.



Figure 1 – Site layout for tyre shredder installation (provided by 6ty°).

# 2 Site description

437 Woolmers Ln is located approx. 6.5 km south-east of the centre of Longford. The location of the proposed tyre shredder installation is adjacent to an existing stockpile of used tyres. The surrounding land is generally riverine floodplain and utilised predominantly for agricultural purposes. Noise sensitive locations surround the proposed installation with the closest approx. 1.5 km away to the north.

From previous experience in acoustic environments that Vipac would expect to be similar to this site it is expected that day time noise levels at sensitive receiver locations surrounding the proposed tyre installation would typically be between 40 and 45 dBA during the day. At times where there is minimal surrounding agricultural and commercial activity there is some potential that noise levels could drop to as low as 35 dBA.

Table 1 provides location information for noise sensitive receiver locations identified in the areas surrounding the proposed tyre shredder installation. Figure 1 provides an aerial view of the site with surround sensitive receiver locations marked.



Location	Position (Datum: WGS8	34 / GDA94 Zone 55)		
number	Easting	Northing		
1	514684	5391959		
2	513129	5391564		
3	512761	5391019		
4	512295	5391727		
5	516946	5390819		
6	518093	5391167		
7	514817	5388321		
8	512357	5389057		
9	512642	5390117		

Table 1 – Noise sensitive locations.



Figure 1 - Aerial view of 437 Woolmers Ln, Longford, and surrounding area with noise sensitive locations marked.



# 3 Environmental noise model

3.1 Model input data

Manufacturers data and data from similar installations was found to be not available. Examination of technical information about the tyre shredder installation (see Appendix section for details) suggests that the likely noise sources would be associated with the electric motor driving the cutting head and conveyors for input and output of material. The low rotational speed of the cutting head (0.15 to 0.2 Hz) suggests that any noise generated by the cutting action is likely to be negligible from an environmental noise emission perspective.

Table 2 provides Vipac library source sound power data (SWL) and information for the sources used in this assessment while table 3 provides 1/1-octave band SWL spectra.

Overall sound power L	evels (d	BA)
Area	SWL	Comment
Shedder electric motor Conveyers	94 89	Vipac library data for 75 kW 1500 rpm motor. Vipac library data, 18 m of conveyor length assumed.

Table 2 – Sound power levels.

Sound Power Level Sp	ectra (	(dBA)								
	SWL spectra (Hz)									
Area	31	63	125	250	500	1k	2k	4k	8k	Total
Shedder electric motor	-	62	74	83	87	90	87	84	79	94
Conveyers	52	76	79	81	83	83	79	79	68	89

Table 3 - Sound power spectra.

The sources presented in tables 2 and 3 above were assumed to be housed in metal deck clad shed with openings on the east and north sides to accommodate material inputs and outputs. A reverberant sound pressure level spectrum calculated from the above data and assumed shed construction and material transmission loss data were used to parameterise the model.

# 3.2 Model views

A model plan view and wire frame model view is shown in figures 2 & 3 respectively.



Figure 2 – Model plan view.

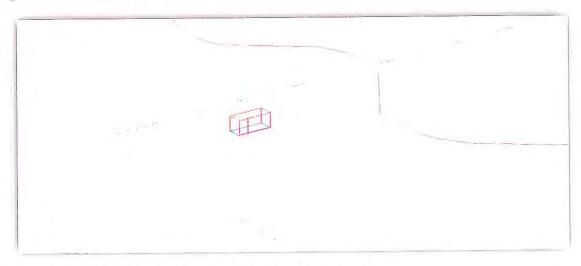


Figure 3 - Wire-frame model view, view from the south-east

3.3 Atmospheric conditions

SoundPLAN<sup>[1]</sup>, via the CONCAWE<sup>[2]</sup> prediction algorithm, models atmospheric attenuation using Pasquill stability indices. These indices are influenced primarily by vector wind speed and direction and solar radiation levels. Combinations of these conditions are used to determine appropriate frequency dependent attenuation/amplification parameters. In this study the following propagation condition has been modelled:

 Neutral propagation: Situations where the atmospheric conditions are considered to be neutral occur with a Pasquill stability class D and no wind. These conditions can typically occur in the hour before sunset and the hour after sunrise. Neutral conditions also occur fairly frequently during still, cloudy conditions.

# 4 Modelling results and discussion

# 4.1 Predicted noise contours

Using the acoustic model, a noise contour maps were generated to assist in the visualisation of noise propagation, see figure 4 below.

ViPAC

 $6 \text{ty}^{\circ}-437 \text{ Woolmers Ln, Longford, tyre shredder environmental noise assessment.}$ 

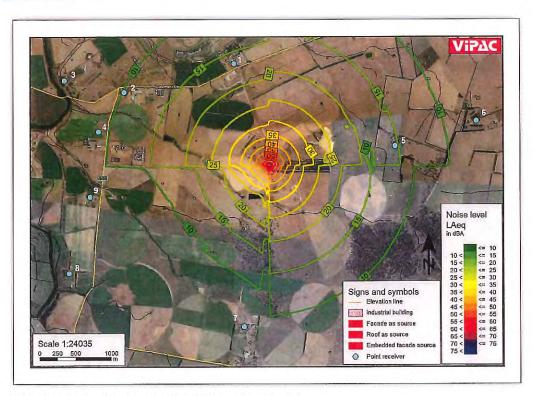


Figure 4 – Predicted noise contours under neutral weather conditions.

421448-01 Sixty Degrees - 437 Woolmers Ln, Longford, tyre shredder environmental noise assessment 14 July 2016 Commercial - in - Confidence



# 4.2 Received levels

Table 4 presents predicted received levels at each of the noise sensitive locations listed in section 2, table 1.

Predicted SPL (dBA)				
Position No	Predicted			
1	17			
2	10			
2 3	9			
4	5			
5	15			
6	7			
7	5			
8				
9	1-			

Table 4 - Predicted received levels.

From the above we noted the following:-

 All predicted noise levels are below 20 dBA. At this level these sources would be unlikely to be audible during the day period.

# 5 Conclusions

- 1. Vipac has developed and parametrised an environmental noise model of a proposed tyre shredder installation to be located at 437 Woolmers Ln, Longford.
- 2. Predicted noise levels at noise sensitive locations surrounding the site were all below 20 dBA under neutral weather noise propagation conditions. At this level it is considered unlikely noise emission from the installation would be audible during the day period.
- 3. Given the prediction results noise mitigation strategies are deemed unnecessary and are not provided here.

**NB**: Details of mobile equipment operations at the site where not considered. Vipac recommends that any equipment utilised on site (e.g. front end loader, forklift... etc) have a SWL level below 106 dBA.

Truck traffic on and off the site associated with transport of materials is likely to occur. Vipac would expect that the frequency off such activity wouldn't not results in the addition of significant amounts acoustic energy to the environment beyond that that already exists from commercial and agricultural activities present in the area.



# **Appendix**

# 4.9 PRIMARY SHREDDER

RETERED

#### PRODUCT SHEET

THE BARCLAY 4.9 PRIMARY SHREDDER WAS DESIGNED WITH THE PURPOSE OF BEING THE FIRST AND FOREMOST CUT IN ANY SHREDDING LINE. IT IS CAPABLE OF CUTTING RIM FREE TIRES RANGING IN SIZE FROM PASSENGER TO SUPER SINGLE TIRES.

> UTILIZING A STANDARD B' LONG IN-FEED CONVEYOR AND EFFICIENT UPPER AND LOWER FEED MECHANISMS, THE 4.9 PRIMARY SHREDDER ALLOWS THE USER TO INDISCRIMINATELY BULK FEED. BONE ARE THE DAYS OF HAVING TO HAND FEED OR SINGLE FILE FEED RESULTING IN LOWER COSTS.

THE SHREDDER IS POWERED BY A HELICAL BEVEL BEAR MOTOR AND CONTROLLED WITH SOFT START

CONTROLS ENCLOSED IN AN INTEGRAL ELECTRIC PANEL. IT CAN BE WIRED TO ACCOMMODATE A WIDE RANGE OF VOLTAGE/HERTZ RATIOS. WHETHER YOU ARE DOING SINGLE PASS SHREDS OR MAKING CRUMB RUBBER, THE BARCLAY 4.9 PRIMARY CAN HELP INCREASE PRODUCTIVITY.

#### SPECIFICATIONS / FEATURES

WEIGHT: 26,000 LBS

GEARMOTOR: 75 - 100 HP, 3 PHASE, 380-460V, 50 - 60 HZ

SHAFT DIAMETER: 9 1/2"

ROTATION SPEED: 9 RPM @ 75HP, 12 RPM @ 100HP

DRIENTATION: VERTICAL.

CONTROLS: FULLY WIRED TO ACCEPT LINE CONNECTION. REMOTE

MOUNTED CONTROL BOX WITH INDEPENDENT CONTROL

OF SHREDDER AND INFEED CONVEYOR.

SAFETY: EMERGENCY STOP BUTTONS ARE MOUNTED ON FRONT

AND BACK OF THE SHREDDER.

DUTTING CHAMBER: 72" WIDE WITH 12 TOTAL CUTS SPACED 4.9" APART

CUTTING KNIVES: VASCO-WEAR (TM) TOOL STEEL. 1.50" THICK HEAT TREATED AND PRECISION GROUND. REVERSIBLE BLADES RESULTS

IN TWO CUTTING EDGES PER GLADE. 286 BLADES TOTAL. KNIFE BASES: AISI D-2 TOOL STEEL. MODULAR, REPLACEABLE PIECES.

DRIVE PROTECTION: COUPLERS WITH SHEAR PINS PROTECTS OVERLOADING.

STRIPPERS: FIXED WELDMENTS WITH REPLACEABLE WEAR PLATES.

FEEDERS: CHAIN-DRIVEN BY MAIN SHAFT WITH TORQUE LIMITER.

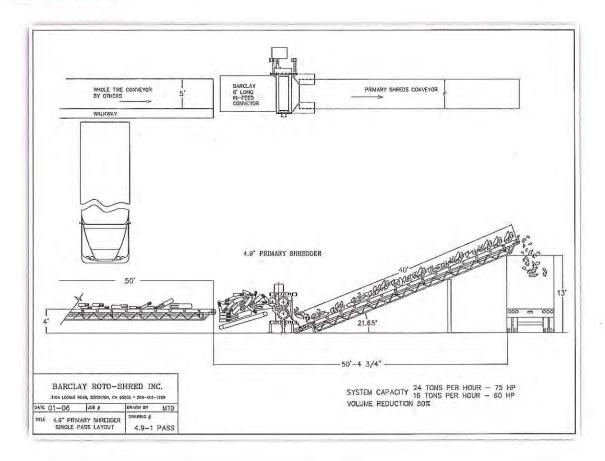
THROUGHPUT: 16-20 TONS/HOUR (SINGLE PASS) CAPACITY: NO WHOLE TIRES WITH A COMPRESSED CROSS SECTION

GREATER THAN 5 1/2" INFEED CONVEYOR: DETACHABLE 2HP CONVEYOR WITH IMPACT ABSORBING SPRING

STEEL SLATSS. LENGTHS ARE B' OR 16' LONG.

PH: (209 466 1209 FAX: 209 465 2012 WEBSITE: WWW.TIRESHREDDERS.COM 3164 LOOMIS ROAD, STOCKTON, CA 95205







# Appendix I

Desktop Assessment – Aboriginal Heritage



Thu 67-Jul-16 (2:49 PM aboriginal@heritage.tas.gov.au

Application for an Aboriginal Heritage Desktop Assessment

1 You forwarded this message on 11-Jul-16 11:41 AM.

Message Unanticipated Discovery Plan.pdf

RE: ABORIGINAL HERITAGE DESKTOP ASSESSMENT

AHTP2931 - Tyre Recycling, Shredding, Storage - Longford

Abordpaid Healings Taxmonia (AHT) has completed a search of the Abordpaid Healings Register (AHR) reported Tyre Recycling, Stranding and Storage Facility at Longford, and can advise that there are no Abordpaid healings sides recorded within or class to the property. Due to a review of previous reports and the area being highly districted it is believed that the area has a long probability of Abordpaid healings being present.

Please to recease that all Abordants before the Abordant Refor Act 1975. If at any time during works you asspect Abordant Institute, easing modes in mentioning and contact AUT for arrive. Attracted is an Unantimpeted Discovery Plan, which you should have on least during works you asspect Abordant Institute, easing modes, to all you in mentiony your sequinments under the Act.

if you have any quentus please do not healtale to contact AHT.

Adam Mershall

Aboriginal Heritage Tasmania Department of Primer Insurance, Perint, Visite at 4 Thereon the House, Shaker Development, Africa Constitute (Printer St. Hotert, DA), Your 6

o ag 61/633133 e abong na Gherrhego borgon de

# Unanticipated Discovery Plan

For proponents and consultants dealing with Aboriginal Heritage in Tasmania

This paper provides a Plan that should be followed when dealing with unanticipated discoveries of Aboriginal Cultural Heritage such as sites and objects. The plan provides guidance to project personnel so that they may meet their obligations with respect to Aboriginal heritage in accordance with the Aboriginal Relics Act 1975 and the Coroners Act 1995.

The Unanticipated Discovery Plan is in two sections. The first section primarily explains mitigation strategies that should be employed when any Aboriginal Cultural Heritage sites or items are discovered excluding skeletal remains (burials), while the second process deals specifically with skeletal remains (burials).

# Discovery of Cultural Heritage Items

- Step I: Any person who believes they have uncovered Aboriginal Cultural Heritage material should notify all employees or contractors that are working in the immediate area that all earth disturbance works must cease immediately.
- Step 2: A temporary 'no-go' or buffer zone of at least 10m x 10m should be implemented to protect the suspected Aboriginal Cultural Heritage site or relics. No unauthorised entry or works will be allowed within this 'no-go' zone until the suspected Aboriginal Cultural Heritage relics have been assessed by a recognised Aboriginal Heritage Practitioner.
- Step 3: Aboriginal Heritage Tasmania (AHT) in Hobart (ph 6165 3152) needs to be notified and consulted as soon as possible and informed of the discovery. AHT will then provide further advice in accordance with the Aboriginal Relics Act 1975.

# Discovery of Skeletal Material

- Step 1: Call the Police immediately. Under no circumstances should the suspected skeletal remains be touched or disturbed. The area must now be considered a crime scene. It is a criminal offence to interfere with a crime scene.
- Step 2: Any person who believes they have uncovered skeletal material should notify all employees or contractors that are working in the immediate area that all earth disturbance works must cease immediately.
- Step 3: A temporary 'no-go' or buffer zone of at least 50m x 50m should be implemented to protect the suspected skeletal remains. No unauthorised entry or works will be allowed within this no-go' zone until the suspected skeletal remains have been assessed by the Police and or Coroner.
- Step 4: Should the skeletal remains be determined to be of Aboriginal origin, the Coroner will contact an Aboriginal organisation approved by the Attorney-General, as per the Coroners Act 1995.



# Unanticipated Discovery Plan



# Guide to the most common sites types in Tasmania.

# Stone Artefact Scatters

A stone artefact is any stone or rock which has been modified by Aboriginal people. Often this is the result of fracturing or 'flaking' fine grained rocks to produce sharp cutting or scrapping implements. The most common stone types utilised by Tasmanian Aboriginal people are silcrete and chert, on account of their availability and excellent tool making properties. However we also find hornfels, chalcedony, spongelite, quartzite and other stone types where locally available.

In Tasmania, stone artefacts are typically recorded as being 'isolated' (i.e. only one) or in a 'scatter' (i.e. two or more within a 50m radius). Stone artefacts are found all over Tasmania, in all landscapes and situations, and are the most basic indicator of Aboriginal occupation.

# Shell Middens

Middens are occupational deposits created through an accumulation of debris from human activity. Midden sites can range in size from large mounds to small scatters of shell. The most common shellfish species found in middens in Tasmania are abalone, oyster, mussel, warrener and limpet, however they can also contain other debris such as animal bone, charcoal from campfires and discarded tools made from stone, shell or bone These sites are usually found near waterways and coastal areas.

# Rockshelters

Caves and rock overhangs which bear signs of human activity are, for the purpose of the Aboriginal Heritage Register (AHR), collectively called occupied rock shelters. Aboriginal people utilised these places for shelter, ceremony and other cultural practices, leaving behind occupational deposits such as middens and hearths, tools, or in some cases, rock markings. Rock shelters are usually found where the geology is conducive to the formation of caves and rock overhangs.

# **Ouarries or Stone Procurement Sites**

A quarry is a place where material has been extracted from a natural outcrop by Aboriginal people. The two types of quarry recorded on the AHR are stone and ochre; each typically being located wherever suitable ochre for painting and decoration, or stone for tool-making appear. Quarries can be recognised by evidence of human manipulation, and by the debris left behind from processing the material. Quarries can be extensive or discrete, depending on the size and quality of the outcrop, and how often it was utilised and visited.

#### Rock Marking

Rock marking is the term used in Tasmania to define markings on rocks, which are the result of Aboriginal practices. Rock markings come in two forms; engraving and painting. Engravings are made by removing the surface of a rock through pecking, abrading or grinding, whilst paintings are made by adding pigment or ochre to the surface of a rock.

#### Burials

Burial sites are highly sensitive places. They can occur anywhere, and have previously been recorded in sand dunes, shell middens and rock shelters.



#### BOARD OF THE ENVIRONMENT PROTECTION AUTHORITY

Level 6, 134 Macquarie Street, Hobart TAS GPO Box 1550, Hobart, TAS 7001 Australia

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Web:

www.epa.tas.gov.au

Our Ref:

EN-EM-EV-DE-249375/H614947/ProponentLetter\_6ABC\_Decision]ars

13 January 2017

Mr Tim Chuga 5 Blackwood Drive PERTH TAS 7300

Dear Mr Chugg

#### **PERMIT APPLICATION (DA 16/077) ENVIRONMENTAL ASSESSMENT DECISION** TYRE STORAGE AND SHREDDING, 437 WOOLMERS LANE, LONGFORD

I refer to the above application for a permit under the Land Use Planning and Approvals Act 1993 (LUPA Act). The application was referred, by the Northern Midlands Council, to the Board of the Environment Protection Authority (the Board) for assessment under the Environmental Management and Pollution Control Act 1994 (EMPC Act) and was received by the Board on 13 April 2016.

The environmental impact assessment of the application has now been completed. The assessment has taken into account the proposal as detailed in the application and supporting documentation, including the Environmental Effects Report (EER) and Additional Information required under section 27I of the EMPC Act. Comments received from the public and relevant government agencies have also been taken into account.

In accordance with Section 25(5) of the EMPC Act, Northern Midlands Council has been notified of the decision and that certain conditions must be contained in any permit granted by the Council under the Land Use Planning and Approvals Act 1993 in respect of the activity, if a permit is granted. A copy of these conditions, and the approved Environmental Assessment Report detailing the reasons for the Board's decision, are enclosed for your information.

Council will advise you of its determination on the above permit application, and of your appeal rights, in due course.

A once-off assessment fee is payable to the Environment Protection Authority (EPA) in relation to the environmental assessment of the application. This fee has been determined in accordance with the Environmental Management and Pollution Control (General Fees) Regulations 2007 (the Fee Regulations). An invoice for this fee will be issued once a decision on the permit has been made by Northern Midlands Council.

In the event that Northern Midlands Council grants a permit an annual fee is payable to the EPA for the level 2 activity in accordance with the Fee Regulations. An invoice for this fee will be issued once the Land Use Planning and Approvals Act 1993 permit comes into force.

A partial remission of the annual fee may be available in certain circumstances. Requirements for fee remissions are described in the Annual Fee Remission Guidelines (refer to http://epa.tas.gov.au/regulation/annual-fee-remissions or telephone (03) 6165 4599 for a printed copy). New activities may apply for a fee remission in the second year following commencement of commercial operations.



If you have any questions regarding the above, please contact Mr Malcom Budd (Section Head, Assessments) on (03) 6165 4599.

Yours sincerely

(Warren Jones CHAIRPERSON

#### Encl.

- Permit Part B Permit Conditions Environmental No. 9478
- Environmental Assessment Report
- Cc. Mr Des Jennings, General Manager, Northern Midlands Council, PO Box 156, Longford TAS 7301 planning@nmc.tas.gov.au

  Ms Heidi Goess, hgoess@6ty.com.au

## **ENVIRONMENTAL ASSESSMENT REPORT**

## Tyre storage and shredding

437 Woolmers Lane, Longford

Tyre Recycle Tasmania

Board of the Environment Protection Authority

January 2017



Environmental Assessment Report		
Proponent	Tyre Recycle Tasmania (TD & SE Chugg Pty Ltd)	
Proposal	Tyre storage and shredding	
Location	437 Woolmers Lane, Longford, Tas 7301	
NELMS no.	PCE 9478	
Permit application no.	16/077 (Northern Midlands Council)	
Folder	EN-EM-EV-DE-249375	
Document.	H594814	
Class of Assessment	2A	

Assessment process milestones		
N.A Notice of Intent lodged		
02/05/2016	EER Guidelines issued	
06/04/2016	Permit application submitted to Council	
13/04/2016	Referral received by Board	
19/10/2016	Start of public consultation period	
02/11/2016	End of public consultation period	
23/12//2016	Supplementary information submitted to Board	

	Acronyms		
Board	Board of the Environment Protection Authority		
EER	Environmental Effects Report		
DPIPWE	Department of Primary Industries, Parks, Water and Environment		
EIA	Environmental impact assessment		
ELTs	End of Life Tyres		
EMPC Act	Environmental Management and Pollution Control Act 1994		
EMPCS	Environmental management and pollution control system		
EPBC Act	Environment Protection and Biodiversity Conservation Act 1999 (Cth)		
LUPA Act	Land Use Planning and Approvals Act 1993		
RMPS	Resource management and planning system		
SD	Sustainable development		
TRT	Tyre Recycle Tasmania		
South Australian Tyre Storage Guide	Built Environs Section Guideline No. 13 - General Guidelines for Rubber Tyre Storage (South Australian Fire Authorities, Community Safety Department, rev. 2014)		

### Report summary

This report provides an environmental assessment of Tyre Recycle Tasmania's (TRT's) proposed ELT storage and shredding operation.

The proposal involves delivery, storage and shredding of 'end of life tyres' (ELTs) at a site situated at 437 Woolmers Lane, Longford. Shredding of up to 7,800 tonnes per year of ELTs is forecast, comprising a mix of ELTs from a co-located existing stockpile and new deliveries. The proposed shredder will produce a shred which requires further (or 'secondary') processing in order to meet criteria for use in road construction or manufacture of recycled rubber products (e.g. playground equipment).

This report has been prepared based on information provided by the proponent in the Environmental Effects Report (EER) and EER Supplement (Supplement). Relevant government agencies and the public have been consulted and their submissions and comments considered as part of this assessment.

Further details of the assessment process are presented in section 1 of this report. Section 2 describes the statutory objectives and principles underpinning the assessment. Details of the proposal are provided in section 3. Section 4 reviews the need for the proposal and considers the alternatives to the proposal. Section 5 summarises the public and agency consultation process and the key issues raised in that process. The detailed evaluation of environmental issues is contained in section 6. The report conclusions are contained in section 7.

Appendix 1 contains details of comments made and issues raised in the consultation process. Appendix 2 contains the environmental permit conditions for the proposal. Attachment 2 of the permit conditions contains the table of commitments from the EER.

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	Report approval	

### 1 Approval process

An application for a permit under the Land Use Planning and Approvals Act 1993 (LUPA Act) in relation to the proposal was submitted to Northern Midlands Council on 6 April 2016.

The proposal includes an activity that is defined as a 'level 2 activity' under clause 6(a), schedule 2 of the *Environmental Management and Pollution Control Act 1994* (EMPC Act); being processing (by crushing, grinding, milling or separating into different sizes by sieving, air elutriation or in any other manner) of rubber at a rate of 200 tonnes or more per year. Section 25(1) of the EMPC Act required Council to refer the application to the Board of the Environment Protection Authority (the Board) for assessment under the Act. The application was received by the Board on 13 April 2016.

An existing tyre storage facility is present on the land to which the application relates. The existing temporary storage activity however is not part of this assessment. That facility is operated in accordance with a level 1 permit issued by Council (P13-199). The activity, the subject of this assessment is the proposed level 2 tyre shredding activity, including temporary storage of tyres and shredded product directly associated with the operation of the shredding activity.

The Board required that information to support the proposal be provided in the form of an Environmental Effects Report (EER).

Two drafts of the EER were submitted to the Department for comment prior to its finalisation and acceptance on behalf of the Board. The EER was released for public inspection for a 14-day period commencing on 19 October 2016, An advertisement was placed in *The Examiner* and a notice was placed on the EPA website. The EER was also referred at this time to relevant government agencies for comment. Four public submissions were received.

On 9 December 2016, the Director requested that the proponent submit supplementary information to address public and government agency (including DPIPWE) comments on the EER and to meet other information requirements. Satisfactory supplementary information was submitted by the proponent on 23 December 2016.

### 2 SD objectives and EIA principles

The proposal must be considered by the Board in the context of the objectives of the Resource Management and Planning System of Tasmania (RMPS), and in the context of the objectives of the Environmental Management and Pollution Control System (EMPCS) (both sets of objectives are specified in Schedule 1 the EMPC Act). The functions of the Board are to administer and enforce the provisions of the Act, and in particular to use its best endeavours to further the RMPS and EMPCS objectives.

The Board must undertake the assessment of the proposal in accordance with the Environmental Impact Assessment Principles defined in Section 74 of the EMPC Act.

### 3 The proposal

The proposal involves delivery, storage and shredding of 'end of life tyres' (ELTs) at a site situated at 437 Woolmers Lane, Longford. Shredding of up to 7,800 tonnes per year of ELTs is forecast, comprising a mix of ELTs from a co-located existing stockpile and new deliveries. Shredding is expected to occur Monday – Friday between 07:00 and 18:00hrs with deliveries to occur Monday – Saturday between 06:00 and 18:00hrs. The nearest sensitive receptor, Rhodes homestead, lies approximately 1.5km north of the proposed operation.

The Supplement indicates the proposed shredder will produce a shred suitable only for landfill. Further (secondary) processing will be required to produce a crumb suitable for use in road construction or manufacture of recycled rubber products. The Supplement also states the proponent is negotiating to secure land in another municipality to establish a secondary processing facility.

The main characteristics of the proposal are summarised in Table 1. A detailed description of the proposal is provided in Section B of the EER.

Table 1: Summary of the proposal's main characteristics

Delivery, storage ar	nd shredding of ELTs. Up to 7,800 tonnes ELTs per annum is forecast to be shredded.
	Location and planning context
Location	437 Woolmers Lane, Longford, as shown in Figure 1.
Land zoning	Rural Resource (Northern Midlands Interim Planning Scheme 2013)
Land tenure	Private parcel CT 105810/1.
	Existing site
Land Use	Primary industries including cropping, grazing, poultry rearing, egg production, fertiliser depot and potato processing. Temporary storage of ELTs is an adjacent existing use.
Topography	The site comprises gently undulating land, with the proposed site for storage and shredding of ELTs located atop a low ridge.
Geology and soils	Dominantly non-marine sequences of gravel, sand, silt, clay and regolith.
Hydrology	The proposed site drains largely northwest through to northeast. Flows are directed to one or both collection ponds located north and east of the proposed development area. The nearest permanent water body is the South Esk River, about 2km north of the proposed site.
Fauna	Parts of CT 105810/1 are identified as priority habitat under the <i>Northern Midlands Interim Planning Scheme</i> 2013. These areas are located more than 700m southeast of the proposed development area.  A field survey (EER, Appendix F) conducted 3 May 2016 by AK Consultants did not find any evidence of threatened fauna across the proposed site.
Flora	The field survey did not find any evidence of threatened flora across the proposed site.
	Local region
Climate	The mean annual rainfall is approximately 720mm. The mean minimum temperature is about 3C and occurs in July while the mean maximum temperature is about 25C and occurs in February. The strongest winds occur during Sept – Nov, largely from the northwest in the morning and afternoon (Launceston City weather station).

Surrounding land zoning, tenure and uses	The surrounding land is zoned Rural Resource, predominantly privately held and largely used for agricultural purposes.					
Species of conservation significance	According to the Natural Values Atlas there are a number of flora and fauna species listed as threatened under the <i>Threatened Species Protection Act 1995</i> recorded or with suitable habitat within 500m of CT 105810/1. Species include:					
	Grey goshawk (Accipiter novaehollandiae)					
	Wedge-tailed eagle (Aquila audax subsp. fleayi)					
	Tussock skink (Pseudemoia pagenstecheri)					
	Eastern barred bandicoot (Perameles gunnii) -					
	Blue grasslily (Caesia calliantha)					
	Tall quillwort (Isoeles elatior)					
	Chamomile sunray (Rhodanthe anthemoides)  The fill of the sunray (Rhodanthe anthemoides)  The fill of the sunray (Rhodanthe anthemoides)					
	The full list of threatened species recorded or with suitable habitat within 500m of CT 105810/1 is included in the field survey.					
	Proposed infrastructure					
Major equipment	Barclay 4.9" primary shredder or equivalent, trucks (6, 9 and 13.5 t), 4WD tractor with 24m³ trailer, two 40m³ trailers.					
Other infrastructure	Colorbond shed to contain shredder.					
	Inputs					
Water	An irrigation line is established on site to provide water supply, particularly in the event of fire. The EER states water may also be drawn from nearby dams if necessary.					
Energy	Electricity <sup>1</sup> (shredder) and diesel (trucks, 4WD tractor).					
Other raw materials	ELTs					
	Wastes and emissions					
Liquid	Stormwater runoff from development area and ELT stockpile areas.					
Atmospheric	Dust from vehicles travelling to and from the site.					
Solid	General refuse including food scraps, paper and packaging.  Potentially dirt or other debris imported with ELTs.					
Controlled wastes	Blackwater from portable chemical toilet.					
Noise	From shredding ELTs, vehicle movements (e.g. ELT deliveries, dispatch of tyre chips) and other mobile plant.					
Greenhouse gases	Emissions from equipment and vehicles associated with the activity.					
	Operations					
Proposal timetable	Construction of hardstand (for proposed shed) and shed, plus electricity supply and connection will occur once a planning permit has been granted. Ordering of the shredder is also expected to occur at this point.					
	Deliveries of ELTs will occur once a planning permit has been granted. Shredding is anticipated to commence within about six to nine months of issue of a valid permit.					

<sup>&</sup>lt;sup>1</sup> To be installed and connected.

Operating hours	Shredding: 07:00 to 18:00 hours Monday to Friday.
(ongoing)	ELT delivery and dispatch of tyre chip: 06:00 to 18:00 hours Monday – Saturday.
:	No work on Sundays or public holidays.

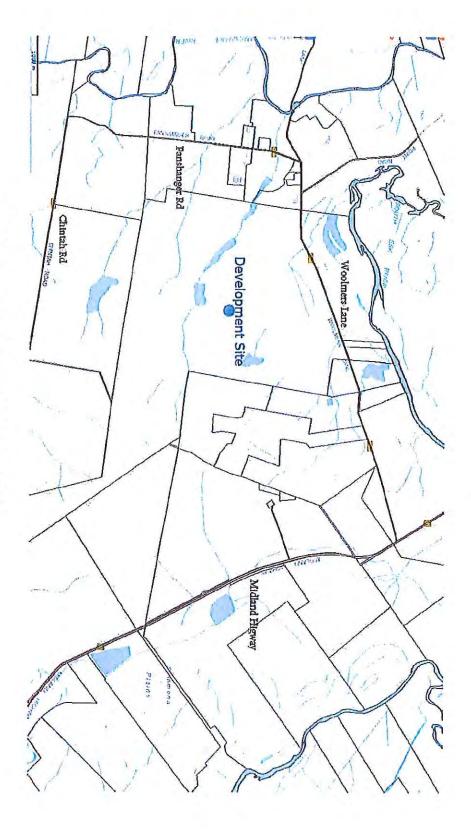
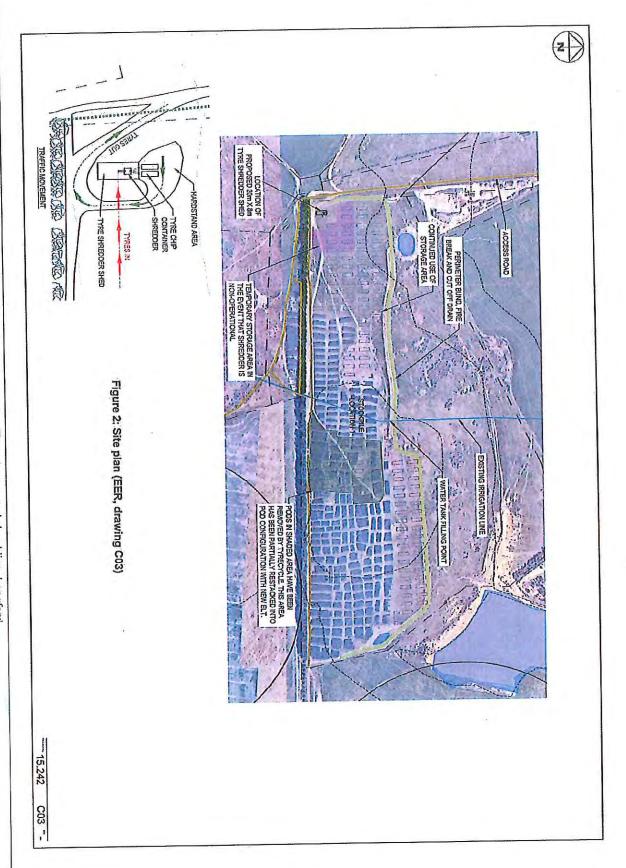


Figure 1 : Location of proposed development (EER, Appendix G).



### 4 Need for the proposal and alternatives

The EER states the rationale for the proposal is to:

- Obtain permission to receive and store ELTs within the operations area beyond 20 December 2016, the date at which further deposit of ELTs at the development area is precluded by planning permit P13-199.
- Provide and operate a proven technology (shredder) to deplete and remove the existing ELT stockpile by the date mandated by P13-199 (31 December 2020) and process ongoing ELT stock.

According to the EER, the advantages of the proposed site include:

- Its relative isolation from sensitive receptors and proximity to key transport networks, such as the Midlands Highway.
- Limiting energy costs by co-locating the shredder with the existing ELT stockpile and using the established ELT collection network.

The EER states that destructive distillation was evaluated as a longer term means to remove the ELT stockpile and process recurrent stock of used tyres. This option was discounted due to its substantial capital costs and lead time. Several other ELT processing locations were evaluated, but discounted either because of the costs associated with securing a site or proximity to sensitive receptors.

### 5 Public and agency consultation

A summary of the public representations and government agency/body submissions is contained in Appendix 1 of this report.

Four public representations were received. The main issues raised in the representations included:

- Proposed end use(s) of tyre shred
- Suitability of fire preparedness and emergency management plans
- Degree of fire risk
- Technical queries about the nominated shredder
- · Concerns about tyre stockpiling
- Weed and disease management risk
- Concerns about the viability of business case for the proposal

The EER was referred to a number of government agencies/bodies with an interest in the proposal. Responses were received from the following:

- Department of State Growth
- Tasmania Fire Service

The following Divisions/areas of the Department of Primary Industries, Parks, Water and Environment (DPIPWE) also provided submissions on the EER:

- Scientific Officer (Water), EPA Tasmanía
- Regulatory Officer (Waste Management), EPA Tasmania
- Noise Specialist, EPA Tasmania
- Scientific Officer (Air unit), EPA Tasmania
- Aboriginal Heritage Tasmania (AHT)
- Policy and Conservation Advice Branch (PCAB), Natural and Cultural Heritage Division

The EER Supplement prepared by the proponent provides a response to each of the relevant environmental issues raised by the public and government agencies.

### 6 Evaluation of environmental issues

The environmental issues considered relevant to the proposal have been evaluated. Details of this evaluation, along with the permit conditions required by the Board are discussed below. The issues assessed are:

- 1. Flora and fauna.
- 2. Aquatic environment and stormwater.
- 3. Fire management.
- 4. Air emissions.
- 5. Liquid effluent.
- 6. Noise emissions.
- 7. Transport impacts.
- 8. Hazardous substances.
- 9. Rehabilitation.

### Issue 1: Flora, fauna, weed management and plant hygiene

#### Description of potential impacts

The EER states the proposal will be located in an area largely cleared of vegetation and converted to pasture or used for grazing. There are several areas, approximately 700m southeast of the proposal, identified as priority habitat.<sup>2</sup> According to the EER, the proposal will not involve any clearing or disturbance of native vegetation.

A field survey (incorporating an analysis using the Natural Values Atlas) of The Land and surrounds found a number of flora and fauna species listed as threatened under the *Threatened Species Protection Act 1995* recorded or with suitable habitat within 500m of the proposed development area; refer Table 1, this report. The survey also identified three species of weed declared under the *Weed Management Act 1999*.

ELTs delivered to the operations area may contain soil or similar matter and therefore pose a weed and disease risk.

Uncontrolled disturbance or removal of vegetation has the potential to impact and degrade the biodiversity and natural values of The Land and surrounding area.

#### Management measures proposed in EER

EER commitment 4 states gorse within the development area will be removed every other year. The EER also states the existing gravel access road and internal tracks will be used to limit further introduction and spread of weeds. Washing of the 4WD tractor and trailer is also intended.

### Public and agency comment

The Policy and Conservation Advice Branch (PCAB), part of DPIPWE's Natural and Cultural Heritage Division, recommended the proponent adhere to the DPIPWE (2015) Weed and Disease Planning and Hygiene Guidelines - Preventing the spread of weeds and diseases in Tasmania (Weed Guideline) during any development activities to prevent the spread of any weeds, and that any weeds present on the property be properly managed.

One public representor recommended conditions be imposed to:

- Develop a weed and disease management plan.
- Assess the disease risk posed by tyres accumulating water.
- Develop a biosecurity management plan.

#### **Evaluation**

ELTs will be stored and shredded on agricultural land. There is little suitable habitat on The Land or nearby land for any of the threatened fauna species listed in **Table 1** of this report. While priority habitat is noted to the southeast of the proposed site, ELT storage and shredding will not affect these areas.

TRT's stated commitment to remove gorse every other year is appropriate. Nonetheless the field survey identifies a number of other declared weed species on or near the operations area, requiring further management measures. Consistent with PCAB advice and recognising the representation above, it is considered appropriate that TRT prepare a weed and disease management plan in accordance with the Weed Guideline, and control and manage weeds and disease as per the plan. This requirement is imposed by site-specific condition **OP1**.

TRT intends to store and manage ELTs delivered to the proposed operations area in accordance with the South Australian Fire Authorities, Community Safety Department (2014) Built Environs Section Guideline No. 13, General Guidelines for Rubber Tyre Storage (South Australian Tyre Storage Guide). The 'on-flat' or laced storage of tyres, short term nature of their storage (until the shredder is installed and operating) and implementation of a weed and disease management plan are considered appropriate to limit disease risk from soil or similar matter imported with ELTs.

<sup>&</sup>lt;sup>2</sup> Northern Midlands Interim Planning Scheme 2013 overlay maps.

#### Conclusion

TRT will be required to comply with the following site-specific condition:

OP1 Weed management

The commitments made in the EER are included in PCE 9478 at:

OI1 Commitments

The following information is provided in the permit conditions:

Ol2 Waste management hierarchy

Ol3 Notification of incidents under section 32 of EMPCA

#### Issue 2: Aquatic environment and stormwater

#### Description of potential impacts

The proposed site drains largely northwest through to northeast. Flows are directed to one or both collection ponds located north and east of the proposed development area. The nearest permanent water body is the South Esk River, about 2km north of the proposed site.

#### Management measures proposed in EER

EER commitment six states TRT will ensure the collection pond valves are in good working order.

The EER also states usual stormwater flows from the existing ELT stockpile and proposed ELT storage and shredding area will generally be shed northwest-north-northeast or report to one or both of the collection ponds.

#### Public and agency comment

Nil.

#### Evaluation

Any sediment entrained in stormwater flows from the operations area is expected to be captured and retained in the collection ponds. In the case of a discharge event, given the lack of a defined drainage channel water is anticipated to disperse broadly across the receiving environment (agricultural land) with little measurable impact. Given flat local topography and a separation distance of about 2km, any discharge is unlikely to reach and affect the South Esk River. Standard conditions E1 (perimeter drains), E2 (stormwater) and E3 (maintenance of settling ponds) are imposed for stormwater exclusion, sediment control and pond maintenance.

#### Conclusion

TRT will be required to comply with the following standard (generic) conditions:

- E1 Perimeter drains
- E2 Stormwater
- E3 Maintenance of settling ponds

The commitment made in the EER is included in PCE 9478 at:

Ol1 Commitments

#### Issue 3: Air emissions

#### Description of potential impacts

Vehicle movements associated with ELT deliveries and the dispatch of tyre chips along the gravel paved access road will be responsible for the majority of the facility's air emissions, namely dust. ELT shredding will be conducted on a slab within a shed. The nearest sensitive receptor is situated about 1.5km north of the proposal.

Dust emissions have the potential to cause environmental nuisance in the absence of suitable controls.

#### Management measures proposed in EER

No specific commitments have been made in relation to air emissions. The EER states the shredder and bins to collect chipped tyres will be housed in a shed to limit potential emissions to air. The EER also indicates vehicles transporting tyres chips from the site will be covered with a fitted tarp to minimise dust emissions.

#### Public and agency comment

EPA Tasmania's Scientific Officer (Air) made the following comments:

- The tyre shredder's location within a shed should minimise fugitive dust emissions.
- Loading tyre shred directly into bins which will then be covered for transport should adequately control fugitive dust emissions from this source.
- The internal road is gravel and is expected to generate fugitive dust emissions, especially
  in hot windy and dry conditions. Little information is provided about how dust emissions
  from internal access road will be controlled. While total truck movements will be relatively
  low (12 per day), it is suggested that more detail be provided in regard to the management
  of fugitive dust from internal roads.

The Scientific Officer concluded significant dust fallout issues associated with the tyre shredding facility in this location are unlikely.

#### Evaluation

Dust emissions from vehicle movements are not likely to affect sensitive receptors due to the substantial separation distance, estimated at 1.5km, to the nearest neighbour. It is noted the gravel paved road from Woolmers Lane to the site is also routinely trafficked by a variety of other vehicles which service agricultural practices on the surrounding land.

Confining shredding operations (which includes the collection of tyre chips) to a shed is considered appropriate to prevent dust related environmental nuisance beyond the boundary of The Land. Standard condition A1 is imposed to ensure such measures are in place at the facility to limit dust emissions.

Covering of loads of tyre chips to limit dust emissions during transport is appropriate and required by A2 (covering of vehicles).

#### Conclusion

TRT will be required to comply with the following standard (generic) conditions:

- A1 Control of dust emissions
- A2 Covering of vehicles

#### Issue 4: Liquid effluent

#### Description of potential impacts

A portable toilet will be provided to staff involved in ELT storage and shredding. Water used to fight a fire will be directed to two collection ponds, each with a capacity of about 160kL. Inappropriate management of liquid effluent has the potential to impact on nearby groundwater and waterways.

#### Management measures proposed in EER

The EER states blackwater from the portable toilet will be removed by a suitably licensed waste contractor. According to the EER, water contaminated by a fire event will be removed from the collection ponds by an accredited waste disposal company.

#### Public and agency comment

EPA Tasmania's Scientific Officer (Water) noted in the event ponds over-fill with water used for firefighting, there should be no direct route for this water to the South Esk River.

One representor queried why water was not part of the tyre shredding process. TRT provided information in the EER Supplement to address this matter.

The Tasmania Fire Service (TFS) commented the proposal did not demonstrate the ponds could accommodate a flow of firefighting water at a rate of 30l/s for 90 minutes.

TRT provided information in the Supplement to address comments made by the TFS.

#### Evaluation

In the case where a fire event causes the ponds to discharge, there is no direct route to the South Esk River. As discussed at Issue 2, the substantial buffer distance to the river and flat local topography mean a discharge is very unlikely to reach and affect this standing water body. Directing and restricting water used to fight a fire to two on-site collection ponds is considered essential to limit the potential for environmental harm. A requirement to adequately retain firefighting water on The Land, and to appropriately dispose of water contaminated by a fire event, would address the concern raised by TFS. This requirement must be included in the Fire Management and Response Plan required by condition OP2, which is discussed further at Issue

A suitable technical reference provided by TRT in the Supplement confirms water is not integral to the operation of the proposed shredder. The veracity of this information is accepted. Calculations provided in the Supplement demonstrate the ponds can accommodate a flow of firefighting water at a rate of 30l/s for 90 minutes, as per the South Australian Tyre Storage Guide.

In the event of fire, it is essential the relevant authorities (and nearby neighbours) are notified in order to coordinate firefighting efforts and limit the potential for environmental harm. Incident response requirements are specified in condition G2. Conclusion

TRT will be required to comply with the following standard (generic) conditions:

Incident response

TRT will also be required to comply with the following site-specific condition:

Fire Management and Response Plan OP2

#### Issue 5: Noise emissions

#### Description of potential impacts

Shredding tyres and vehicle movements are expected to give rise to the majority of noise from the proposal. The major items of equipment expected to be used at the site are listed in Table 4 of the EER Part B (p10). A desktop assessment was conducted to determine the potential impact of shredder noise on nearby sensitive receptors and is included in the EER as Appendix H

Noise from shredding operations has the potential to cause environmental nuisance off-site if not appropriately managed at the source.

#### Management measures proposed in EER

There are no specific commitments stated in the EER to mitigate and manage noise. As indicated at Issue 3, the shredder will be located in a shed.

#### Public and agency comment

EPA Tasmania's Noise Specialist considered the desktop noise assessment as satisfactory. Given the nominated shredder's anticipated low sound power levels and its substantial separation from nearby sensitive receptors, the Noise Specialist concluded noise levels similar to those modelled (20dBA or below) could be expected. This is well below any level likely to cause an environmental nuisance.

#### Evaluation

The desktop noise assessment estimated noise levels at nine sensitive receptors within about a 2km radius of the proposal, the nearest at about 1.5km to the north. Estimates of daytime noise (07:00 – 18:00hrs), the period when the shredder will operate in a metal-clad shed, were less than 20dBA at all nine receptors. This level is substantially less than 45dBA, a generally accepted daytime level for a rural environment. Environmental nuisance due to shredder noise is therefore considered remote and imposing noise limits is not considered necessary.

As indicated previously at **Issue 3**, the gravel paved road from Woolmers Lane to the site is also routinely trafficked by a variety of other vehicles which service agricultural uses on the surrounding land. Vehicle movements associated with ELT delivery and dispatch of tyre chips are not expected to appreciably change the existing acoustic environment around the access route.

The proposed hours of operation are consistent with those practiced by local agricultural uses. Operating hours are imposed by condition N1, to restrict noise emissions to the daytime period.

#### Conclusion

TRT will be required to comply with the following standard (generic) condition:

N1 Operating hours

#### Issue 6: Transport impacts

#### Description of potential impacts

Vehicle movements associated with ELT delivery, internal movements and dispatch of tyre chips are listed in Table 7 of the EER (p24). Overall, the proposal expects to generate about 4,932 two-way vehicle movements per annum at full production. The EER estimates up to 70% of vehicle movements are already established as part of the ELT stockpile permitted by P13-199. The EER states most vehicle movements will occur via Woolmers Lane from the Midlands Highway. Traffic through Longford is expected to be confined to ELT collection only. Vehicle movements to/ from the site may degrade the acoustic and atmospheric amenity of the local neighbourhood without suitable controls.

#### Management measures proposed in EER

There are no specific commitments proposed concerning transport. The EER states traffic movements will be confined to the Midlands Highway and Woolmers Lane.

#### Public and agency comment

Three representations made during the public advertising period stated the proponent should be forced to cease delivery and storage of tyres at 437 Woolmers Lane, Longford from 20 December 2016, as stipulated by planning permit P13-199 as varied by an Environment Protection Notice dated 10/3/2016.<sup>3</sup>

#### Evaluation

It is noted the co-located existing ELT stockpile operation accounts for a substantial proportion of the estimated traffic count. The proposed vehicle route, using bitumen sealed Woolmers Lane and the Midlands Highway, is considered suitable to accommodate the anticipated number of vehicle movements. It is also noted the proposed day time deliveries of ELTs and dispatch of tyre shred align with the period when most local agricultural activity occurs. Condition N1 (Operating hours) is also considered an appropriate way to limit the potential for noise nuisance associated with traffic.

#### Conclusion

No conditions are considered necessary regarding transport. TRT is required to comply with N1 (Operating hours) as specified at Issue 5.

<sup>&</sup>lt;sup>3</sup> At the time of writing, deliveries of ELT to the existing ELT stockpile have ceased.

#### Issue 7: Hazardous substances

#### Description of potential impacts

The EER states no hazardous substances will be stored at the site. According to the EER, major maintenance to/service of the shredder will be done by an external contractor who will supply any necessary oils and lubricants for this work. Fuelling of vehicles is anticipated to occur off site.

The EER notes ELTs may be contaminated by soil or other debris.

Potential for minor loss or spills of hazardous substances exists. Uncontrolled loss of hazardous substances such as hydrocarbons can infiltrate, contaminate and degrade surface and ground water and soil ecosystems.

#### Management measures proposed in EER

There are no specific commitments proposed concerning the management of hazardous substances. The EER states the shredder will be electric and located on a hardstand within a metal-clad shed. The EER also states where contamination of ELTs is suspected, their collection will be refused.

#### Public and agency comment

#### Evaluation

The possibility of a hydrocarbon spill exists during minor maintenance to/ service of the shredder. Standard condition H1 (storage and handling of hazardous materials) is therefore imposed to specify how hazardous substances must be stored and handled on site.

While the risk of a hydrocarbon spill or leak is considered to be low, provision of an on-site hydrocarbon spill kit is considered warranted. This requirement is specified by standard condition H2.

TRT's intent to refuse collection of ELTs affected by contaminants such as soil or similar debris is supported. 

#### Conclusion

TRT will be required to comply with the following standard (generic) conditions:

Storage and handling of hazardous materials H1

Spill kits H2

#### Issue 8: Fire management

#### Description of potential impacts

Tyres are flammable, therefore a facility where ELTs are stored and shredded is vulnerable to fires originating outside the facility. Accidental ignition of ELT stockpiles can damage the site and neighbouring areas directly with fire and also release damaging products of combustion to the atmosphere and pollutants to the soil. Offsite discharge of contaminated water used to suppress a fire can also degrade the environment.

#### Management measures proposed in EER

A number of commitments are proposed in the EER:

- 1: An Emergency Fire Plan is stored on site.
- 2: The Emergency Fire Plan will be reviewed biannually with the Tasmania Fire Service.
- 3: Sheep will be run through the site to ensure it is kept in low fuel conditions.
- 5: The water irrigation line will be maintained in good working order for firefighting purposes.
- 6: The collection pond valves will be maintained in good working order.
- 7: Bunds and fire breaks around the storage site will be maintained.
- 8: Soil sampling and analysis will be undertaken after a fire incident where detention ponds fill.
- 9: Detention ponds will be excavated after a fire event.

In addition, the EER states:

- ELTs will be stacked in pod formation in accordance with the *Built Environs Section Guideline No. 13* General Guidelines for Rubber Tyre Storage (South Australian Fire Authorities, Community Safety Department, rev. 2014) (EER, Section 1.1.4, p.9); and
- Two ponds are available to collect and retain any water used to suppress a tyre fire (EER, Section 1.1.7, p 9).

The Supplement states TRT will excavate and appropriately dispose of contaminated soils at an appropriate waste disposal facility or facility, or remediated on site with separate and prior approval of the EPA.

#### Public and agency comment

EPA Tasmania's Scientific Officer (Water) indicated that access to the development area should be restricted by way of a locked gate to help reduce the risk of a tyre fire.

The TFS made a number of comments, which included:

- starting the irrigation pump requires local knowledge and would not be suitable for fire crews to operate
- the lack of suitable firefighting water supply would severely impede effective intervention by firefighting crews.
- vehicular access (to suit a 14 tonne vehicle) and a suitable hard stand should be developed
  at the existing retention ponds to minimise water usage and limit the amount of
  contaminated water from a fire event.

The full list of TFS comments and issues is contained in Appendix 1 of this report.

Public representations highlighted:

- The potential contamination of groundwater by a tyre fire had not been considered.
- A condition should be applied to ensure all tyres currently stored at the development site
  and those intended to be sent there are managed in accordance with best practice fire
  guidelines.
- A condition should be applied to require the storage of an appropriate quantity of water at all times to manage a potential fire.

The full list of comments and issues raised in public submissions (related to fire management) is contained in Appendix 1 of this report.

Where required, TRT provided information in the Supplement to address comments and issues relating to fire risk and management raised in public and agency submissions.

#### Evaluation

The commitments made by TRT to limit the potential for, and manage the impacts of, fire whether originating on or off the site, are considered necessary and supported. It is noted that an Emergency Fire Plan has been prepared for the proposal. TRT provided an appropriate image to confirm access to the development area, which includes the operations area, can be controlled by way of a locked gate. TRT also provided information in the Supplement to demonstrate a water supply for firefighting purposes, primarily the South Esk River, is always available. Two farm dams, located about 450m southeast and 800m northeast of the operations area can also be used as supplementary water supplies in the event of a fire.

Site-specific condition **OP2** is imposed to require a Fire Management and Response Plan to be developed in consultation with the TFS, local Council and the Director. This condition requires implementation of the approved plan, and conduct of the activity in accordance with the plan. The issues raised by the TFS will have to be satisfactorily addressed through this consultation, with appropriate actions incorporated in the Plan prior to its approval.

Condition OP3 requires a Commissioning Management Plan to be developed and implemented prior to commencement of the activity, setting out procedures for storing and managing tyres for processing, and shredded product from the activity. Conditions OP4 and OP5 further define the location of the shredder and a temporary storage area for tyres awaiting processing, in the event that the shredder becomes temporarily non-operational. Limits are imposed on the quantity of tyres that may be stored in the temporary storage area, and the volume of shredded product that may be stored. It is noted from the EER that a throughput of 12 tonnes per day of new ELTs delivered to the site is anticipated, once the shredder is operational. A limit of 100 tonnes of tyre storage in the temporary storage area represents more than a week of deliveries, which is considered sufficient time to make repairs to the shredder. In the event of a more extended period of down time for the shredder, it is anticipated that storage capacity will exist elsewhere on the Land; particularly if the projected 18 tonnes per day of the stockpile has been processed. A limit of 80m³ of product equates to two bin trailers of product, as set out in the EER. The restrictions provided through these operational conditions are considered necessary to mitigate fire risks associated with the activity.

While information in the Supplement, stating that clay lining of the collection ponds limits the opportunity for groundwater contamination by firefighting water, is accepted, localised contamination of soils by oily materials produced from a tyre fire is possible, at least in the immediate area of the fire. The most appropriate way to limit the potential for contamination of land or water by a fire event is to limit the opportunity for fire, primarily by compliance with conditions **OP2** to **OP5**. If a fire does occur, then TRT's commitments to ascertain the degree of local contamination (8) and excavate the retention ponds (9) are considered necessary, as would be the appropriate disposal of any contaminated soils.

#### Conclusion

TRT will be required to comply with the following site-specific conditions:

- OP2 Fire Management and Response Plan
- OP3 Commissioning Management Plan
- OP4 Location of shredder and temporary storage area
- **OP5** Storage of product

The commitments made in the EER are included in PCE 9478 at:

Ol1 Commitments

#### Issue 9: Rehabilitation

#### Description of potential impacts

The EER states the development area will be converted to grazing land as, over time, shredding depletes the ELT stockpile. Once the ELT stockpile is fully removed the shredder and portaloo will be relocated elsewhere, while the shed remains for the landowner to use for agricultural purposes.

Unplanned cessation and abandonment of the activity may cause ongoing impacts to the immediate and surrounding environment.

#### Management measures proposed in EER

No specific commitments relating to closure and rehabilitation have been proposed.

Public and agency comment

Nil.

#### Evaluation

The conversion of the site to grazing land is consistent with existing and future anticipated land uses. Preparation of a decommissioning and rehabilitation plan is not considered necessary, given the nominated equipment is portable and can readily be removed and that whole tyres can be considered as inert material. However, standard conditions **DC1** (notification of cessation) and **DC2** (temporary suspension of activity) are imposed to ensure the Director is forewarned of the possibility of closure and rehabilitation.

#### Conclusion

TRT will be required to comply with the following standard (generic) conditions:

DC1 Notification of cessation

DC2 Temporary suspension of activity

### 7 Report conclusions

This assessment has been based on the information provided by the proponent, Tyre Recycle Tasmania, in the permit application, EER, EER Supplement and in correspondence and discussion between EPA Tasmania and the proponent and the proponent's representatives.

This assessment has incorporated specialist advice provided by EPA Tasmania scientific specialists and regulatory staff, other Divisions of DPIPWE and other government agencies.

This assessment has taken into account issues raised in public and agency submissions.

It is concluded that:

- 1. the RMPS and EMPCS objectives have been duly and properly pursued in the assessment of the proposal; and
- 2. the assessment of the proposed activity has been undertaken in accordance with the Environmental Impact Assessment Principles.

It is concluded that the proposed activity is capable of being managed in an environmentally acceptable manner such that it is unlikely that the objectives of the *Environmental Management and Pollution Control Act* 1994 (the RMPS and EMPCS objectives) would be compromised, provided that the Permit Conditions - Environmental No. 9478 appended to this report are imposed and duly complied with, including commitments made by the proponent in the EER and EER Supplement.

### 8 Report approval

Environmental Assessment Report and conclusions, including permit conditions, adopted:

Warren Jones

Chair

Board of the Environment Protection Authority

Date: 13 January 2017

### 9 References

Goess, H; Tyre Storage and Shredding Environmental Effects Report (dated 17/10/2016), 6ty°, Launceston, Tasmania.

Goess, H; Supplementary information incorporated in *Tyre storage and shredding – Environmental Effects Report*, 6ty°, Launceston, Tasmania (issue 4.2, dated 23 December 2016).

### 10 Appendices

Appendix 1 Summary of public and agency submissions

Appendix 2 Permit conditions, includes Attachment 2 - EER commitments

# Appendix 1 Summary of public and agency submissions

In the following tables, EER means the document titled *Tyre storage and shredding, 437 Woolmers Lane Longford, Environmental Effects Report* dated 17 October 2016

TABLE 1: ADDITIONAL INFORMATION REQUIRED BY THE EPA BOARD

Represen tation No./ Agency	EER section no	EER Page no.	Comments and issues	
1,4	1.2	6, 10	The quoted tyre shredder (Barclay 4.9" primary shredder) is designed as a first pass unit to reduce the volume of material, namely from whole tyres to smaller chips or shreds. Further processing (e.g. to remove steel) is necessary before chips can be beneficially reused.	
			The stated end use as fill for road construction is disputed.	
4	7.0	22	The absence of water as part of the tyre shredding process is queried.	
4	14.0, 18.0	14, 27	Potential contamination of groundwater by a tyre fire has not been considered.	
3	Part B	6	A condition should be applied to ensure the existing tyre stockpile is entirely removed by December 2020.	
			A condition should be applied to ensure new deliverles of tyres to the development site are removed and a tyre storage/stockpile limit be imposed.	
4	1.2; Appendi x D	10	Firefighting equipment is not included in the equipment inventory.	
4	1.5	12	The period quoted by the proponent to procure and install the proposed shredder is considered an over-estimate.	
7	13.0 & Appendi	25	To start the irrigation pump requires local knowledge and would not be suitable for fire crews to operate.	
1	ces D &	ces D &	No hardstand suitable for a 14 tonne firefighting vehicle is available.	
			Both the method of tyre storage observed and the lack of suitable firefighting water supply would severely impede effective intervention by firefighting services.	
			Hydrants should be installed so that all areas of the storage are within reach of a 10m hose stream issuing from a nozzle at the end of a 60m length of hose.	
	·		A Hydrant no closer than 10m to the shed is recommended.	
			Pump sets specifically installed for the purpose of supplying firefighting water should be installed in accordance with the requirements of Australian Standard 2419.1 and plumbed to the required outlets on the site.	
			Section 5 of the SA Guide refers to the containment of firefighting water, and specifies that this be able to contain the water at a rate of 30l/s for 90 minutes. The proposal does not demonstrate this capability.	
				To minimise water usage and limit the amount of contaminated water, vehicular access (14 tonne vehicle) and suitable hardstanding at the existing retention ponds is recommended.

	All new storage of ELT must comply with the separation requirements specified in the SA Guide.

TABLE 2: OTHER MATTERS RAISED DURING THE PUBLIC CONSULTATION PERIOD

Representation No./	EER section no.	EER Page no:	Comments and issues
Agency 3	1.1.4	9	A condition should be applied to ensure all tyres currently stored at the development site and those intended to be sent there are managed in accordance with best practice fire guidelines.
3, 4	1.1.4	9	The configuration/ layout of the existing pods of tyres, in terms of being in accord with the relevant guidelines, is queried. An audit of existing stockpile configuration and steps to correct any non-compliance is suggested.
1, 4	Part B; 1.2	6, 11	The merits of the business case are queried. The concern is that further stockpiling (of tyre chip) at the site will occur in the event the proponent has not identified viable markets for the shredded material.
1	4.0	18	The concern is that tyre shred/chip will be stored at the development site.
1, 2, 4	4.0	18	The proponent should be forced to cease delivery and storage of tyres at 437 Woolmers Lane Longford from 20 December 2016, stipulated by planning permit P13-199 as varied by an Environment Protection Notice dated 10/3/2016.
1	4.0	18	Linking the viability of the proposal (i.e. purchase of the shredder) with ongoing delivery of ELT is disingenuous. The true cost of collection, transport, processing/ re-use out of Tasmania is not reflected in the proponent's business model.
3, 5	Part C; 1.0	19	A condition should be applied to require the preparation of a weed management plan.  The proponent should adhere to the Department of Primary Industries, Parks, Water and Environment's (DPIPWE's) Weed and Disease Planning and Hygiene Guidelines - Preventing the spread of weeds and diseases in Tasmania (2015).
3	12.0	12.0 25	A condition should be applied to require an assessment of the disease risk posed by tyres accumulating water. Appropriate management measures should then be applied.
			A condition should be applied to require the development of a biosecurity management plan.
3	13.0	13.0 25	A condition should be applied to require an assessment of the existing configuration of tyres and where necessary remedial action taken prior to the commencement of proposed shredding.
			A row of mature pine trees near the development site poses a fire risk and should be removed.
			A condition should be applied to require the storage of an appropriate quantity of water at all times to manage a potential fire.
2	Part B	6-18	Further expansion of the tyre storage area is opposed.

			The proposal expands the tyre storage capacity of the site, over a period of potentially nine months.
			The proposal is inconsistent with the Northern Midlands Interim Planning Scheme 2013 (Scheme) applicable standards of the Rural Resource zone and the relevant codes.
			The proposal is inconsistent with the local area objectives as stated in the Scheme.
			The proposal is inconsistent with the values and community objectives of the communities of Perth and Longford.
			The proposal is a major increase in risk to persons and property of the residents in the adjacent communities of Perth and Longford.
			The AK consultant report (on behalf of the applicant) on the environmental impact of the proposal on local flora and fauna in the Priority Habit area is insubstantial and unconvincing.
			The proposal is inconsistent with state government initiatives to increase tourism in the Northern Midlands by establishing a heritage corridor from Woolmers Lane and the World Heritage sites to Longford.
6	16.0	26	Council should be alert to any subsequent applications for upgrades to or signage on Woolmers Lane arising from an intensification of the industrial land use in this area. Applications for such works will need to be assessed separately to determine whether there will be an impact on the experience of visitors arriving at <i>Woolmers Estate</i> , aiming to avoid incremental degradation of the route to and from the Estate by ad hoc signage and road infrastructure.
3, 4	18.0	27	The need for a bond or other form of financial surety (from the proponent) to ensure tyres are removed from the site by 2020, followed by appropriate rehabilitation, is suggested.
4	App. D: Fire Protecti on Measur es Report & App. E: Fire Emerge ncy Plan		The adequacy of management plans for fire, in terms of scope and level of detail, is queried.
7	13.0 & Appendi ces D & E	25 & Appe ndice s D & E	Much of the existing stockpile is not stored as set out in the South Australian Fire Authorities, Community Safety Department (2014) Built Environs Section Guideline No. 13, General Guidelines for Rubber Tyre Storage (SA Guideline). To remedy the minimal separation in the existing storage, removing alternate rows would reduce the Issue, in some areas 2 rows will need to be removed.

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# PERMIT PART B PERMIT CONDITIONS - ENVIRONMENTAL No. 9478

Issued under the Environmental Management and Pollution Control Act 1994

Activity:

The operation of a tyre shredding facility (ACTIVITY TYPE: Crushing,

Grinding or Milling (Chemicals))

TYRE SHREDDER, 437 WOOLMERS LANE

**LONGFORD TAS 7301** 

The above activity has been assessed as a level 2 activity under the Environmental Management and Pollution Control Act 1994.

Acting under Section 25(5)(a)(i) of the EMPCA, the Board of the Environment Protection Authority has required that this Permit Part B be included in any Permit granted under the Land Use Planning and Approvals Act 1993 with respect to the above activity.

Municipality:

NORTHERN MIDLANDS

Permit Application Reference:

P16-077

EPA file reference:

249375

Date conditions approved:

13 JAN 2017

Signed:

CHAIRPERSON, BOARD OF THE ENVIRONMENT

PROTECTION AUTHORITY

PCE 9478 (r1)

2/12

#### **DEFINITIONS**

Unless the contrary appears, words and expressions used in this Permit Part B have the meaning given to them in Schedule 1 of this Permit and in the EMPCA. If there is any inconsistency between a definition in the EMPCA and a definition in this Permit Part B, the EMPCA prevails to the extent of the inconsistency.

#### ENVIRONMENTAL CONDITIONS

The person responsible for the activity must comply with the conditions contained in Schedule 2 of this Permit Part B.

#### INFORMATION

Attention is drawn to Schedule 3, which contains important additional information.

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#### Schedule 1: Definitions

In this Permit Part B:-

Activity means any environmentally relevant activity (as defined in Section 3 of EMPCA) to which this document relates, and includes more than one such activity.

Director means the Director, Environment Protection Authority holding office under Section 18 of EMPCA and includes a person authorised in writing by the Director to exercise a power or function on the Director's behalf.

Environmental Harm and Material Environmental Harm and Serious Environmental Harm each have the meanings ascribed to them in Section 5 of EMPCA.

Environmental Nuisance and Pollutant each have the meanings ascribed to them in Section 3 of EMPCA.

Environmentally Hazardous Material means any substance or mixture of substances of a nature or held in quantities which present a reasonably foreseeable risk of causing serious or material environmental harm if released to the environment and includes fuels, oils, waste and chemicals but excludes sewage.

Person Responsible is any person who is or was responsible for the environmentally relevant activity to which this document relates and includes the officers, employees, contractors, joint venture partners and agents of that person, and includes a body corporate.

The Land means the land on which the activity to which this document relates may be carried out, and includes: buildings and other structures permanently fixed to the land, any part of the land covered with water, and any water covering the land. The Land falls within the area defined by certificate of title 105810/1.

Washdown Guidelines means the document titled Weed and Disease Planning and Hygiene Guidelines - Preventing the spread of weeds and diseases in Tasmania, by the Department of Primary Industries, Parks, Water and Environment, dated March 2015, and any amendment to or substitution of this document.



#### Schedule 2: Conditions

#### Maximum Quantities

### Q1 Regulatory limits

1 The activity must not exceed the following limits:

1.1 7,800 tonnes per year of chemicals or rubber processed.

#### General

G1 Access to and awareness of conditions and associated documents

A copy of these conditions and any associated documents referred to in these conditions must be held in a location that is known to and accessible to the person responsible for the activity. The person responsible for the activity must ensure that all persons who are responsible for undertaking work on The Land, including contractors and sub-contractors, are familiar with these conditions to the extent relevant to their work.

G2 Incident response

If an incident causing or threatening environmental nuisance, serious environmental harm or material environmental harm from pollution occurs in the course of the activity, then the person responsible for the activity must immediately take all reasonable and practicable action to minimise any adverse environmental effects from the incident.

G3 No changes without approval

- The following changes, if they may cause or increase the emission of a pollutant which may cause material or serious environmental harm or environmental nuisance, must only take place in relation to the activity if such changes have been approved in writing by the EPA Board following its assessment of an application for a permit under the Land Use Planning and Approvals Act 1993, or approved in writing by the Director:
  - 1.1 a change to a process used in the course of carrying out the activity; or
  - 1.2 the construction, installation, alteration or removal of any structure or equipment used in the course of carrying out the activity; or
  - 1.3 a change in the quantity or characteristics of materials used in the course of carrying out the activity.

G4 Change of responsibility

If the person responsible for the activity intends to cease to be responsible for the activity, that person must notify the Director in writing of the full particulars of any person succeeding him or her as the person responsible for the activity, before such cessation.

G5 Change of ownership

If the owner of The Land upon which the activity is carried out changes or is to change, then, as soon as reasonably practicable but no later than 30 days after becoming aware of the change or intended change in the ownership of The Land, the person responsible must notify the Director in writing of the change or intended change of ownership.

#### <u>Atmospheric</u>

A1 Control of dust emissions

Dust emissions from the activity must be controlled to the extent necessary to prevent environmental nuisance beyond the boundary of The Land.



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A2 Covering of vehicles

Vehicles carrying loads containing material which may blow or spill must be equipped with effective control measures to prevent the escape of the materials from the vehicles when they leave The Land or travel on public roads. Effective control measures may include tarpaulins or load dampening.

#### **Decommissioning And Rehabilitation**

#### DC1 Notification of cessation

Within 30 days of becoming aware of any event or decision which is likely to give rise to the permanent cossation of the activity, the person responsible for the activity must notify the Director in writing of that event or decision. The notice must specify the date upon which the activity is expected to cease or has ceased.

#### DC2 Temporary suspension of activity

- Within 30 days of becoming aware of any event or decision which is likely to give rise to the temporary suspension of the activity, the person responsible for the activity must notify the Director in writing of that event or decision. The notice must specify the date upon which the activity is expected to suspend or has suspended.
- 2 During temporary suspension of the activity:
  - 2.1 The Land must be managed and monitored by the person responsible for the activity to ensure that emissions from The Land do not cause serious environmental harm, material environmental harm or environmental nuisance; and
  - 2.2 If required by the Director a Care and Maintenance Plan for the activity must be submitted, by a date specified in writing by the Director, for approval. The person responsible must implement the approved Care and Maintenance Plan, as may be amended from time to time with written approval of the Director.
- 3 Unless otherwise approved in writing by the Director, if the activity on The Land has substantially ceased for 2 years or more, rehabilitation of The Land must be carried out in accordance with the requirements of these conditions as if the activity has permanently ceased.

# Effluent Disposal

#### E1 Perimeter drains

- Perimeter cut-off drains must be constructed at strategic locations on The Land to prevent surface run-off from entering the area used or disturbed in carrying out the activity. All reasonable measures must be implemented to ensure that sediment transported along these drains remains on The Land. Such measures may include provision of strategically located sediment fences, appropriately sized and maintained sediment settling ponds, vegetated swales, detention basins and other measures designed and operated in accordance with the principles of Water Sensitive Urban Design.
- 2 Drains must have sufficient capacity to contain run-off that could reasonably be expected to arise during a 1 in 20 year rainfall event. Maintenance activities must be undertaken regularly to ensure that this capacity does not diminish.

#### E2 Stormwater

1 Polluted stormwater from the activity that will be discharged from The Land must be collected and treated prior to discharge to the extent necessary to prevent serious or material environmental harm, or environmental nuisance.

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- 2 Notwithstanding the above, all stormwater from the activity that is discharged from The Land must not carry pollutants such as sediment, oil and grease in quantities or concentrations that are likely to degrade the visual quality of any receiving waters outside the Land.
- 3 All reasonable measures must be implemented to ensure that solids entrained in stormwater from the activity are retained on The Land. Such measures may include appropriately sized and maintained sediment settling ponds or detention basins.
- 4 Stormwater discharged in accordance with this condition must not be directed to sewer without the approval of the operator of the sewerage system.

E3 Maintenance of settling ponds
Sediment settling ponds must be periodically cleaned out to ensure that the pond design capacity is maintained. Sediment removed during this cleaning must be securely deposited such that sediment will not be transported off The Land by surface run-off.

#### Hazardous Substances

#### H1 Storage and handling of hazardous materials

- 1 Unless otherwise approved in writing by the Director, environmentally hazardous materials held on The Land must be:
  - 1.1 located within impervious bunded areas, spill trays or other containment systems;
  - 1.2 managed to prevent unauthorised discharge, emission or deposition of pollutants:
    - 1.2.1 to soils within the boundary of The Land in a manner that is likely to cause serious environmental harm;
    - 1.2.2 to groundwater;
    - 1.2.3 to waterways; or
    - 1.2.4 beyond the boundary of The Land.

H2 Spill kits
Spill kits appropriate for the types and volumes of materials handled on The Land must be kept in appropriate locations to assist with the containment of spilt environmentally hazardous materials.

## Noise Control

#### N1 Operating hours

- 1 Unless otherwise approved in writing by the Director, the following actitivies on The Land must not be undertaken outside the following times:
  - 1.1 Shredding of tyres 0700 hours to 1800 hours Monday to Friday.
  - 1.2 Deliveries of tyres for the activity and dispatches of product 0600 hours to 1800 hours Monday to Saturday.
- 2 Notwithstanding the above paragraph, the above activities must not be earried out on Public Holidays that are observed State-wide (Easter Tuesday excepted) without the written approval of the Director.



#### **Operations**

#### OP1 Weed management

- Within three months of the date on which these conditions take effect, or by a date otherwise specified in writing by the Director, a Weed & Disease Management Plan must be submitted to the Director for approval. This requirement will be deemed to be satisfied only when the Director indicates in writing that the submitted document adequately addresses the requirements of this condition to his or her satisfaction.
- 2 The plan must be consistent with the Washdown Guidelines, or any subsequent revisions of that document.
- 3 The person responsible must implement and act in accordance with the approved plan.
- 4 In the event that the Director, by notice in writing to the person responsible, either approves a minor variation to the approved plan or approves a new plan in substitution for the plan originally approved, the person responsible must implement and act in accordance with the varied plan or the new plan, as the case may be.

#### OP2 Fire Management and Response Plan

- 1 A Fire Management & Response Plan must be submitted to the Director for approval within 90 days from the date on which these conditions take effect.
- 2 The Plan, and any amendment to the Plan, must be prepared in consultation with the Tasmania Fire Service, the Director and the Council.
- 3 The person responsible must implement and act in accordance with the approved plan.
- 4 In the event that the Director, by notice in writing to the person responsible, either approves a minor variation to the approved plan or approves a new plan in substitution for the plan originally approved, the person responsible must implement and act in accordance with the varied plan or the new plan, as the case may be.

#### OP3 Commissioning Management Plan

- 1 Prior to the commencement of the activity, or by a date otherwise specified in writing by the Director, a Commissioning Management Plan for the establishment and operation of the activity, must be submitted to the Director for approval. This requirement will be deemed to be satisfied only when the Director indicates in writing that the submitted document adequately addresses the requirements of this condition to his or her satisfaction.
- 2 Without limitation, the plan must include details of the following:
  - 2.1 evidence of the acquisition of a shredder for the purpose of the activity;
  - 2.2 procedures for the storage and management of tyres to be processed by the activity in the event of any mechnical failure that results in a non-operational period of the shredder;
  - 2.3 location and procedures for the storage and handling of product from the activity;
  - 2.4 procedures for the removal of product from the activity;
  - 2.5 a table containing all of the major commitments made in the plan;
  - 2.6 an implementation timetable for key aspects of the plan; and
  - 2.7 a reporting program to regularly advise the Director of the implementation of the plan.
- 3 The person responsible must implement and act in accordance with the approved plan.



In the event that the Director, by notice in writing to the person responsible, either approves a minor variation to the approved plan or approves a new plan in substitution for the plan originally approved, the person responsible must implement and act in accordance with the varied plan or the new plan, as the case may be.

#### Shredder and temporary storage area OP4

- The shredder for the activity must be located within the tyre shredding shed on the Land as shown in Attachment 1.
- Tyres may be stored in the temorary storage area, as shown in Attachment 1, for the purpose only of management during non-operational periods of the shredder.
- Not more than 100 tonnes of tyres may be stored in the temporary storage area.

Storage of product OP5

Storage of product, as detailed in the Commissoning Management Plan approved under the above condition, must not exceed a total volume of 80m3.



#### Schedule 3: Information

#### Other Information

#### OI1 Commitments

The person responsible for the activity has a general environmental duty to conduct the activity in accordance with the commitments contained in Attachment 2.

### OI2 Waste management hierarchy

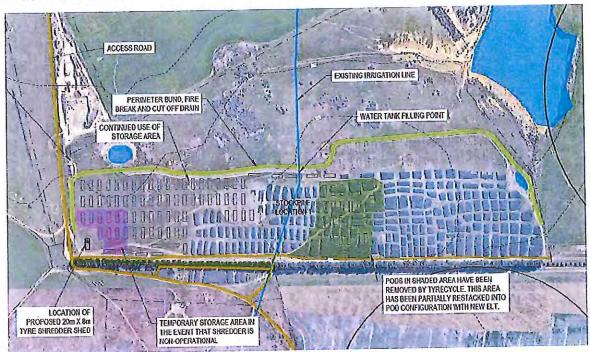
- 1 Wastes should be managed in accordance with the following hierarchy of waste management:
  - 1.1 waste should be minimised, that is, the generation of waste must be reduced to the maximum extent that is reasonable and practicable, having regard to best practice environmental management;
  - 1.2 waste should be re-used or recycled to the maximum extent that is practicable; and
  - 1.3 waste that cannot be re-used or recycled must be disposed of at a waste depot site or treatment facility that has been approved in writing by the relevant planning authority or the Director to receive such waste, or otherwise in a manner approved in writing by the Director.

# OI3 Notification of incidents under section 32 of EMPCA

Where a person is required by section 32 of EMPCA to notify the Director of the release of a pollutant, the Director can be notified by telephoning 1800 005 171 (a 24-hour emergency telephone number).



# Attachment 1: Location of shredder and temporary storage area





# **Attachment 2: Commitments**

# TABLE OF COMMITMENTS BY APPLICANT - 6TY PTY LTD - TYRE STORAGE AND SHREDDING, 437 WOOLMERS LANE, LONGFORD

Commitment type & no.	Detail	When
Flora and fauna		
4	Gorse within the operations area will be removed.	Biannually
Incident management		
1	Emergency Fire Plan stored on site. Copies also provided to the Tasmania Fire Service.	At all times
2	Review Emergency Fire Plan.	Biannually
Operations		
3	Run sheep through the site to ensure that the land is kept in low fuel conditions.	Ongoing
5	Ensure water irrigation line is maintained in good working order for firefighting.	At all times
6	Ensure collection pond valves are in good working order.	Quarterly
7	Maintain the bunds and fire breaks around the storage site.	Biannually
8	Undertake soil sampling and analysis after a fire incident where detention ponds fill.	At decommissioning
9	Scrape detention ponds after a fire event with an excavator.	Fire event





