SUSTAINABLE DESIGN ASSESSMENT

163 Mahoneys Rd
Reservoir 3073

Entire Design and Construction

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Introduction

This SDA has been prepared for the proposed townhouse development at 163 Mahoneys Rd Reservoir

The site has been assessed using the BESS tool. BESS was developed by an association of councils led by Moreland City Council. This tool assesses the energy and water efficiency, thermal comfort and overall environmental sustainability performance of new buildings or alterations. It was created to demonstrate how new developments can meet sustainability requirements as part of a planning permit application for the participating council.

The following key categories have been identified to be significant areas to be assessed:

- Energy Performance.
- Water Resources.
- Stormwater Management.
- Indoor Environment Quality.
- Construction, Building & Waste Management.
- Building Materials.
- Transport; and
- Urban Ecology.

Each target area within the BESS tool generally receives a score of between 1% and 100%. A minimum score of 50% is required for the energy, water, stormwater and IEQ areas. An overall score of 50% represents 'Best Practice' while a score over 70% represents 'Excellence'. The result of the BESS assessment is included as Appendix B.

The Stormwater Treatment Objective – Relative Measure (STORM) calculator which addresses stormwater quality considerations has been used for the development to ensure that stormwater management best practice requirements have been achieved. The result of the STORM assessment is included as Appendix A.

Site and Development Description

The proposed development is located at 136 Mahoneys Rd Reservoir. The 870m^2 site is situated in a residential area approximately 15km north of the CBD.

The proposal consists of the development of two single story townhouses with individual garages.

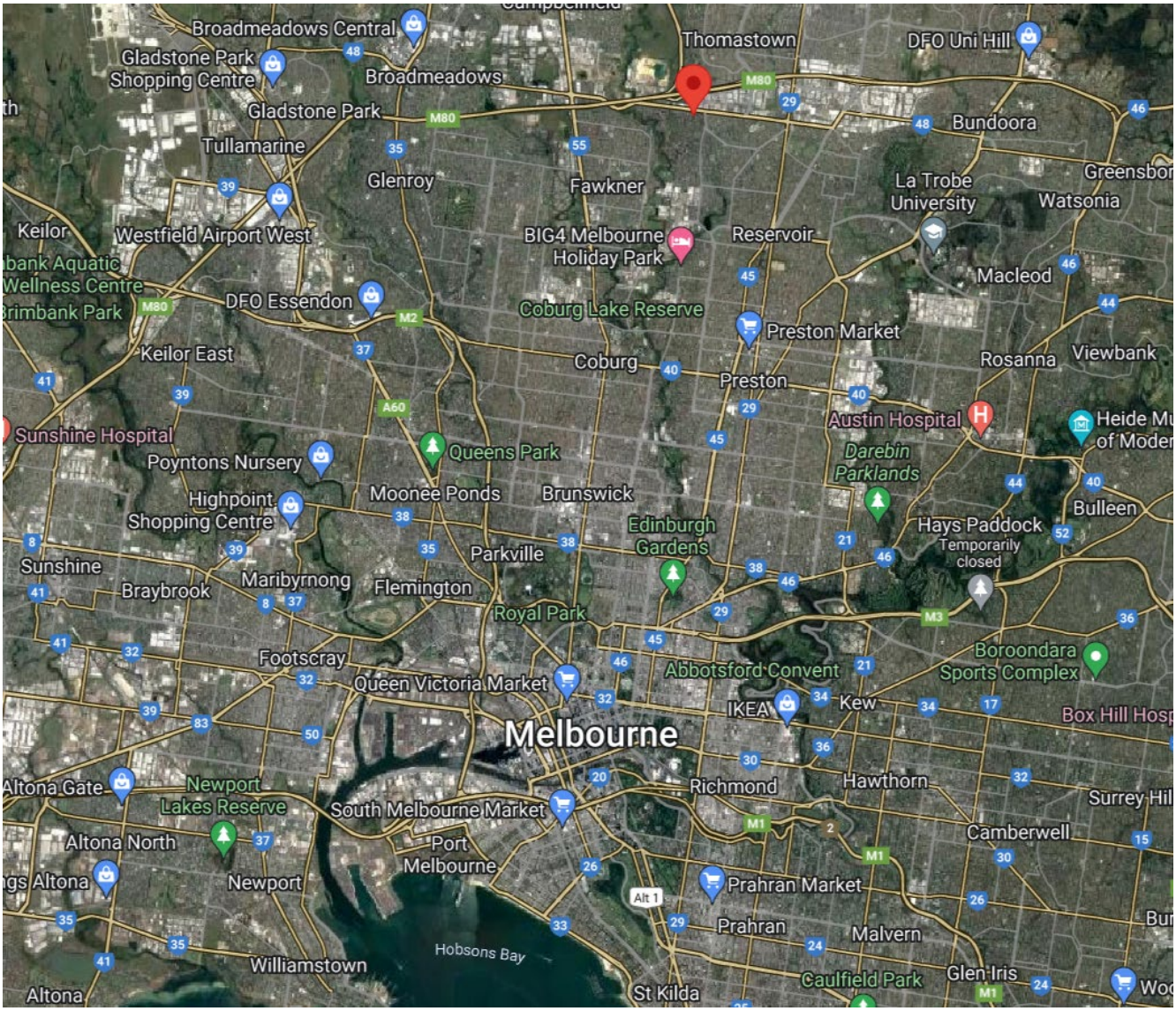


Figure 1: Location of the proposed development in Reservoir with relation to Melbourne CBD (Source: Google Maps)

Energy Efficiency

Energy and its key elements should be integrated into the design of the proposed development. These elements contribute to reducing greenhouse gas emissions by utilising energy efficient appliances, energy conservation measures and renewable energy.

Thermal Performance

Full energy ratings will be carried out at the building approval stage. All dwellings will achieve at least 6 stars each. This will be achieved using appropriate insulation level in all external walls, roof, and floors as well as the use of double-glazing windows throughout habitable rooms. For the purpose of the BESS assessment, minimum compliance figures have been assumed which will be met at the building approval stage.

Heating and Cooling Systems

Heating and cooling systems can account to up to 40% of a household's energy use. Therefore, to reduce the energy consumption heating and cooling will be provided by energy efficient air conditioners (greater than or equal to 4 stars as specified in BESS).

Hot Water Heating

Hot water for the townhouses will be provided with gas instantaneous hot water units chosen as 5 stars minimum as specified in BESS.

Internal Lighting

Energy consumption from artificial lighting within the townhouses will be reduced by using LED lighting. A lighting level of 4W/m2 will not be exceeded in the townhouses. The use of light internal colours will improve daylight penetration thus reducing the need for artificial lighting.

External Lighting

External lighting for the townhouses and common areas (driveway/pathway) will be LED and will include controls such as motion detectors or timers to minimise consumption during off-peak times.

Energy Efficient Appliances

All appliances if provided in the development as part of the base building work (e.g. dishwasher) will be greater than or equal to 4 stars as specified in BESS.

Clothes Drying

External retractable clothes drying lines or racks will be provided for each townhouse within the identified private open spaces.

Water Efficiency & Stormwater Management

Water saving use and reuse and its key elements should be integrated into the design of the proposed development. These principles contribute to reducing the water demand in addition to promoting water reuse. Stormwater management and its key elements should be integrated into the design of the proposed development. These principles contribute to ensuring natural systems are protected and enhanced whilst promoting on-site retention and aims to reduce runoff or peak flows.

Water Efficient Fittings

The development will include efficient fittings and fixtures to reduce the volume of mains water used in the development. The following WELS star ratings will be specified:

- Toilets – 4 stars.
- Taps (bathroom and kitchen) – 4 stars; and
- Showerhead – 3 stars with aeration device (7.5-9L/min).

Rainwater Collection & Use

Rainwater runoff from part of the roof area of each townhouse will be collected and stored in rainwater tanks. Each dwelling will be provided with a 3,000L tank.
If required, a charged pipe system or multiple tanks will be installed to collect water from part of the roof of each dwelling.

In the case of a charged pipe system, the charged pipes will not be running underneath the building footprint (slab) and the stakeholders (builder/developer/architect) will be required to explicitly acknowledge this solution and have the capacity to install it.

Rainwater collected will be used for toilet flushing and laundry in each townhouse. These initiatives will significantly reduce the stormwater impacts of the development and help achieve compliance with the STORM calculator (See Appendix A).

Water Efficient Appliances

All appliances if provided in the development as part of the base building work (e.g., dishwasher) will be greater than or equal to 4 stars as specified in BESS.

Water Efficient Landscaping

Native or drought-tolerant plants will be implemented for the landscaped areas on site. Use of water or irrigation will not be required after an initial period when plants are getting established. If irrigation is required, it will be connected to rainwater tanks.

Indoor Environment Quality

Indoor Environment Quality and its key elements should be integrated into the design of the proposed development. These elements play a significant role in the health, wellbeing, and satisfaction of the development occupants. Facilitating a good (IEQ) design provides a naturally comfortable indoor environment and less dependence on building services such as, artificial lighting, mechanical ventilation and heating and cooling device.

Volatile Organic Compounds

All paints, adhesives and sealants and flooring will have low VOC content. Alternatively, products will be selected with no VOCs. Paints such as eColour, or equivalent should be considered. Please refer to Appendix B for VOC limits.

Formaldehyde Minimisation

All engineered wood products will have 'low' formaldehyde emissions, certified as E0 or better. Alternatively, products will be specified with no Formaldehyde. Products such as ecological panel – 100% post-consumer recycled wood (or similar) will be considered for use within the development. Please refer to Appendix B for formaldehyde limits.

Daylight Levels

Daylight penetration will be enhanced with the use of light internal colours to improve daylight reflection. All bedrooms and living rooms will be provided with windows to allow for natural sunlight and ventilation. There are no bedrooms which rely on borrowed daylight. Installation of mirrored wardrobe doors could improve even further the daylight spread within the bedrooms.

Double Glazing

Glazing will be chosen in accordance with the energy rating requirements at the building approval stage. However, as a minimum double glazing will be provided to all habitable areas. This will provide better thermal performance and reduce condensation which helps prevent the formation of mould within the dwellings.

Task Lighting

A higher illuminance level (300Lux) will be provided for all task areas (e.g. kitchen bench, bathroom basin) to ensure appropriate light is provided to do any tasks in these areas.

Ventilation

All kitchens will have a separate dedicated exhaust fan (range-hood) which will be directly exhausted out of the building.
All townhouses will have access to effective cross flow ventilation. It will provide fresh air to the occupants and reduce the need for mechanical cooling. Window locks and door catches will be included to encourage and improve natural ventilation in the dwellings.

Construction, Building and Waste Management

Building Management and its key elements should be integrated into the design of the proposed development. These principles contribute to ensuring efficient and effective on-going building performance. Waste management and its key elements should be integrated into the design of the proposed development. These principles contribute to ensuring minimal waste is transported to landfill by means of disposal, recycling and on-site waste storage and/or collection methods.

Metering and Monitoring

Separate utility meters (water, gas and electricity) will be provided for each townhouse. This will allow residents to monitor and reduce their consumption.

Construction Waste Management

A waste management plan will be introduced to all on-site staff at a site orientation session to ensure that the waste generated on site is minimised and disposed of correctly.

Construction Environmental Management

The builder will identify environmental risks related to construction and include management strategies such as maintaining effective erosion and sediment control measures during construction and operation and ensure that appropriate staging of earthworks (e.g. avoid bare earthworks in high risk areas of the site during dominant rainfall period).

Operational Waste

Each townhouse will be provided with bins for general, recycling waste and garden/organic waste.

Appendix A – WSUD / STORM

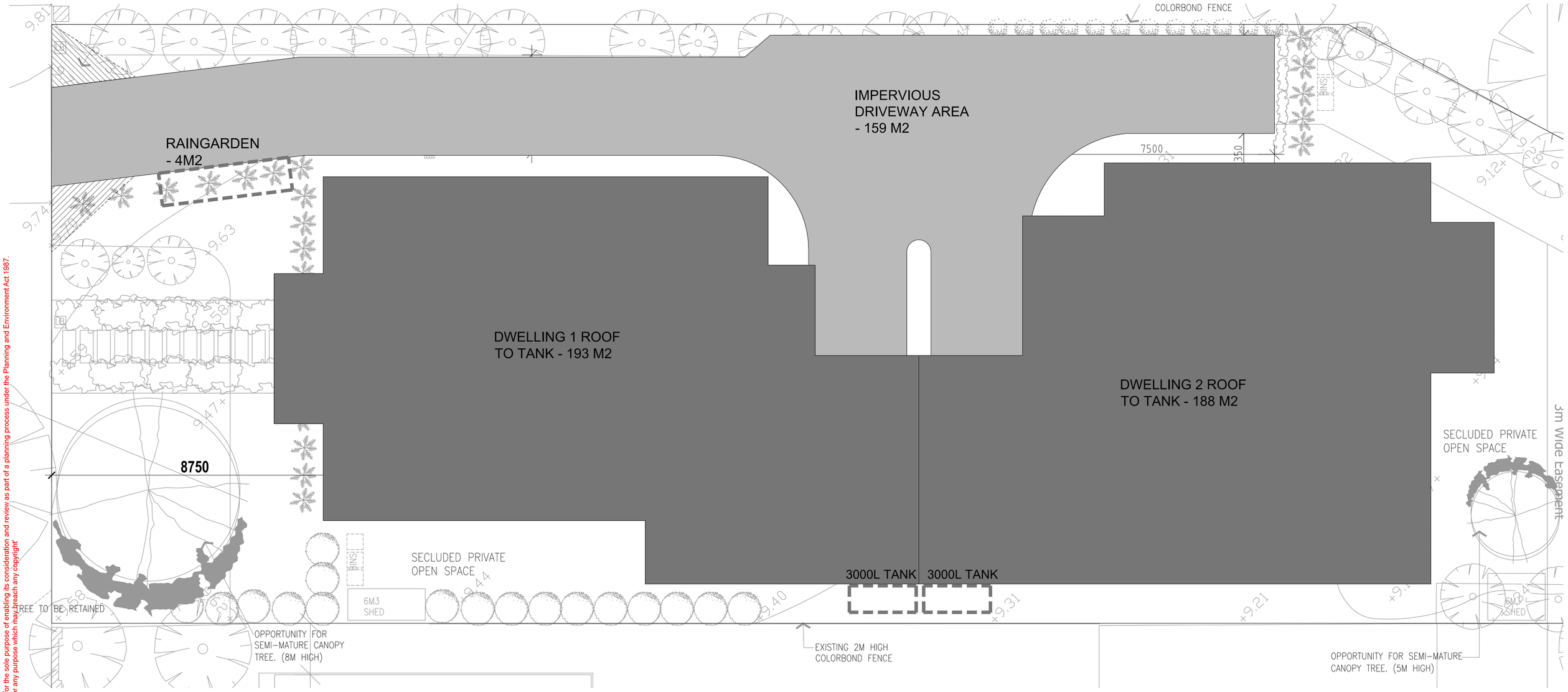
STORM Rating Report

TransactionID:	1633668
Municipality:	DAREBIN
Rainfall Station:	DAREBIN
Address:	163 Mahoneys Rd
	Reservoir
	VIC 3073
Assessor:	
Development Type:	Residential - Multiunit
Allotment Site (m2):	870.00
STORM Rating %:	100

Description	Impervious Area (m2)	Treatment Type	Treatment Area/Volume (m2 or L)	Occupants / Number Of Bedrooms	Treatment %	Tank Water Supply Reliability (%)
ROOF 1	193.00	Rainwater Tank	3,000.00	3	87.20	97.20
ROOF 2	188.00	Rainwater Tank	3,000.00	3	88.00	97.20
DRIVEWAY	159.00	Raingarden 100mm	4.00	0	130.45	0.00

Date Generated: 17-Aug-2023

Program Version: 1.0.0



CATCHMENT AREA FOR WATER TANK
DWELLING 1 ROOF - TOTAL 193 M2
DWELLING 2 ROOF - TOTAL 188 M2

IMPERVIOUS DRIVEWAY AREA
DRIVEWAY 59 M2

NOTE:
ALL LEVELS ARE RELATIVE LEVELS (RL) TO A TBM POINT ON THE FOOTPATH AS INDICATED

WSUD PLAN

PLANNING ISSUE

entire design & construction

9/3 bromham place, richmond vic 3121
p.o.box 4, bulleen vic 3105
telephone: 9028 8484
mobile: 0411 118 949
email: info@entiredesign.com.au

P	02.02.23	TOWN PLANNING SUBMISSION
P1	12.06.23	REVISED TOWN PLANNING SUBMISSION

N.R.

TOWN PLANNING SUBMISSION
PROPOSED DUAL-OCCUPANCY
163 MAHONYS RD, RESERVOIR

DWG No.	TP- 07
REV.	P1
PROJECT:	2227
SCALE:	1:100 @ A1, 1:200 @ A3
DATE:	FEB. 2023

Appendix B – BESS

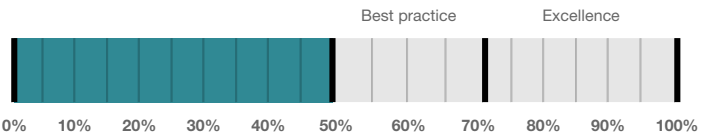
BESS Report

Built Environment Sustainability Scorecard

This BESS report outlines the sustainable design commitments of the proposed development at 163 Mahoneys Rd Reservoir Victoria 3073. The BESS report and accompanying documents and evidence are submitted in response to the requirement for a Sustainable Design Assessment or Sustainability Management Plan at Darebin City Council.

Note that where a Sustainability Management Plan is required, the BESS report must be accompanied by a report that further demonstrates the development's potential to achieve the relevant environmental performance outcomes and documents the means by which the performance outcomes can be achieved.

Your BESS Score

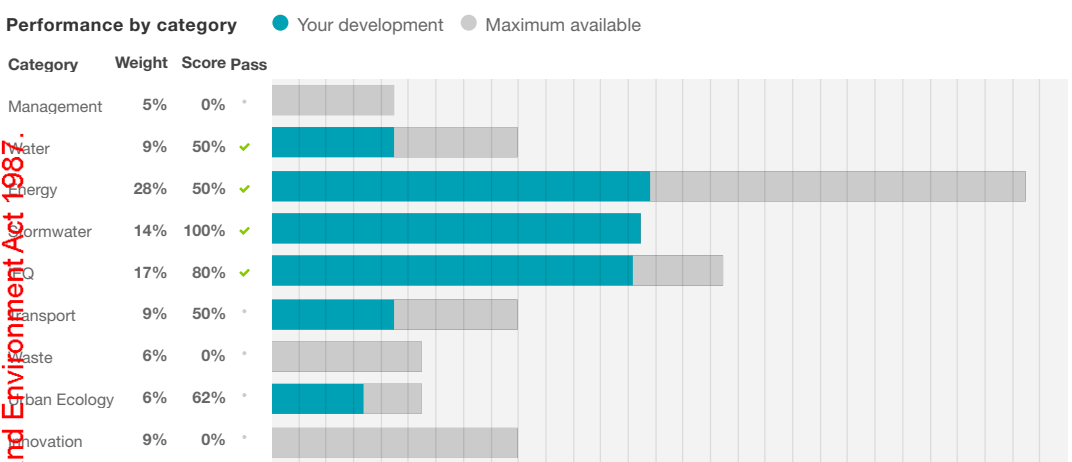


52%

Project details

Address	163 Mahoneys Rd Reservoir Victoria 3073
Project no	0517BDA3-R1
BESS Version	BESS-7
Site type	Multi dwelling (dual occupancy, townhouse, villa unit etc)
Account	info@entiredesign.com.au
Application no.	
Site area	870.00 m²
Building floor area	267.00 m²
Date	17 August 2023
Software version	1.8.0-B.401

Performance by category



Dwellings & Non Res Spaces

Dwellings

Name	Quantity	Area	% of total area
Townhouse			
Townhouse 2	1	135 m²	50%
Townhouse 1	1	132 m²	49%
Total	**2**	**267 m²**	**100%**

Supporting information

Floorplans & elevation notes

Credit	Requirement	Response	Status
Water 3.1	Annotation: Water efficient garden details		-
Energy 3.3	Annotation: External lighting controlled by motion sensors		-
Energy 3.4	Location of clothes line (if proposed)		-
Stormwater 1.1	Location of any stormwater management systems (rainwater tanks, raingardens, buffer strips)		-
IEQ 2.2	Annotation: Dwellings designed for 'natural cross flow ventilation' (If not all dwellings, include a list of compliant dwellings)		-
IEQ 3.1	Annotation: Glazing specification (U-value, SHGC)		-
IEQ 3.2	Adjustable shading systems		-
Transport 2.1	Location of electric vehicle charging infrastructure		-
Urban Ecology 2.1	Location and size of vegetated areas		-
Urban Ecology 2.4	Location of taps and floor waste on balconies / courtyards		-

Supporting evidence

Credit	Requirement	Response	Status
Energy 3.5	Average lighting power density and lighting type(s) to be used		-
Stormwater 1.1	STORM report or MUSIC model		-
IEQ 2.2	A list of dwellings with natural cross flow ventilation		-
IEQ 3.1	Reference to floor plans or energy modelling showing the glazing specification (U-value and Solar Heat Gain Coefficient, SHGC)		-
IEQ 3.2	Reference to floor plans and elevations showing shading devices		-

Credit summary

Management **Overall contribution 4.5%**

	0%
1.1 Pre-Application Meeting	0%
2.2 Thermal Performance Modelling - Multi-Dwelling Residential	0%
4.1 Building Users Guide	0%

Water Overall contribution 9.0%

	Minimum required 50%	50%	✔ Pass
1.1 Potable Water Use Reduction		40%	
3.1 Water Efficient Landscaping		100%	

Energy Overall contribution 27.5%

	Minimum required 50%	50%	✔ Pass
1.2 Thermal Performance Rating - Residential		16%	
2.1 Greenhouse Gas Emissions		100%	
2.2 Peak Demand		0%	
2.3 Electricity Consumption		100%	
2.4 Gas Consumption		100%	
2.5 Wood Consumption		N/A	◇ Scoped Out
		No wood heating system present	
2.6 Electrification		0%	⊘ Disabled
		Credit is available when project is declared to have no gas connection.	
3.2 Hot Water		100%	
3.3 External Lighting		100%	
3.4 Clothes Drying		100%	
3.5 Internal Lighting - Houses and Townhouses		100%	
4.4 Renewable Energy Systems - Other		0%	⊘ Disabled
		No other (non-solar PV) renewable energy is in use.	
4.5 Solar PV - Houses and Townhouses		0%	⊘ Disabled
		No solar PV renewable energy is in use.	

Stormwater Overall contribution 13.5%

	Minimum required 100%	100%	✔ Pass
1.1 Stormwater Treatment		100%	

IEQ Overall contribution 16.5%

	Minimum required 50%	80%	✔ Pass
2.2 Cross Flow Ventilation		100%	
3.1 Thermal comfort - Double Glazing		100%	
3.2 Thermal Comfort - External Shading		100%	
3.3 Thermal Comfort - Orientation		0%	

Transport Overall contribution 9.0%

50%

1.1 Bicycle Parking - Residential	0%	
1.2 Bicycle Parking - Residential Visitor	N/A	Scoped Out
		Not enough dwellings.
2.1 Electric Vehicle Infrastructure	100%	

Waste Overall contribution 5.5%

0%

1.1 - Construction Waste - Building Re-Use	0%
2.1 - Operational Waste - Food & Garden Waste	0%

Urban Ecology Overall contribution 5.5%

62%

2.1 Vegetation	100%
2.2 Green Roofs	0%
2.3 Green Walls and Facades	0%
2.4 Private Open Space - Balcony / Courtyard Ecology	100%
3.1 Food Production - Residential	0%

Innovation Overall contribution 9.0%

0%

1.1 Innovation	0%

Credit breakdown

Management

Overall contribution 0%

1.1 Pre-Application Meeting		0%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	Has an ESD professional been engaged to provide sustainability advice from schematic design to construction? AND Has the ESD professional been involved in a pre-application meeting with Council?	
Question	Criteria Achieved ?	
Project	No	
2.2 Thermal Performance Modelling - Multi-Dwelling Residential		0%
Score Contribution	This credit contributes 33.3% towards the category score.	
Criteria	Have preliminary NatHERS ratings been undertaken for all thermally unique dwellings?	
Question	Criteria Achieved ?	
Townhouse	No	
4.1 Building Users Guide		0%
Score Contribution	This credit contributes 16.7% towards the category score.	
Criteria	Will a building users guide be produced and issued to occupants?	
Question	Criteria Achieved ?	
Project	No	

Water

Overall contribution 4% Minimum required 50%

Water Approach	
What approach do you want to use for Water?:	Use the built in calculation tools
Project Water Profile Question	
Do you have a reticulated third pipe or an on-site water recycling system?:	No
Are you installing a swimming pool?:	No
Are you installing a rainwater tank?:	Yes
Water fixtures, fittings and connections	
Showerhead: All	3 Star WELS (>= 7.5 but <= 9.0) (minimum requirement)
Bath: All	Scope out
Kitchen Taps: All	>= 4 Star WELS rating
Bathroom Taps: All	>= 4 Star WELS rating
Dishwashers: All	>= 4 Star WELS rating
WC: All	>= 4 Star WELS rating
Urinals: All	Scope out
Washing Machine Water Efficiency: All	>= 4 Star WELS rating
Which non-potable water source is the dwelling/space connected to?:	
Townhouse 1	Tank 1
Townhouse 2	Tank 2
Non-potable water source connected to Toilets: All	Yes
Non-potable water source connected to Laundry (washing machine): All	No
Non-potable water source connected to Hot Water System: All	No
Rainwater Tanks	
What is the total roof area connected to the rainwater tank?:	
Tank 1	193 m^2
Tank 2	188 m^2
Tank Size:	
Tank 1	3,000 Litres
Tank 2	3,000 Litres
Irrigation area connected to tank:	
Tank 1	20.0 m^2
Tank 2	20.0 m^2
Is connected irrigation area a water efficient garden?:	
Tank 1	Yes
Tank 2	Yes
Other external water demand connected to tank?:	
Tank 1	-
Tank 2	-

1.1 Potable Water Use Reduction		40%
Score Contribution	This credit contributes 83.3% towards the category score.	
Criteria	What is the reduction in total potable water use due to efficient fixtures, appliances, rainwater use and recycled water use? To achieve points in this credit there must be >25% potable water reduction.	
Output	Reference	
Project	357 kL	
Output	Proposed (excluding rainwater and recycled water use)	
Project	310 kL	
Output	Proposed (including rainwater and recycled water use)	
Project	259 kL	
Output	% Reduction in Potable Water Consumption	
Project	27 %	
Output	% of connected demand met by rainwater	
Project	100 %	
Output	How often does the tank overflow?	
Project	Very Often	
Output	Opportunity for additional rainwater connection	
Project	116 kL	

3.1 Water Efficient Landscaping		100%
Score Contribution	This credit contributes 16.7% towards the category score.	
Criteria	Will water efficient landscaping be installed?	
Question	Criteria Achieved ?	
Project	Yes	

Energy

Overall contribution 14% Minimum required 50%

Dwellings Energy Approach	
What approach do you want to use for Energy?:	Use the built in calculation tools

Project Energy Profile Question	
Are you installing any solar photovoltaic (PV) system(s)?:	No
Are you installing any other renewable energy system(s)?:	No
Energy Supply:	Electricity & Natural Gas

Dwelling Energy Profiles	
Below the floor is: All	Ground or Carpark
Above the ceiling is: All	Outside
Exposed sides: All	3
NatHERS Annual Energy Loads - Heat: All	78.4 MJ/sqm
NatHERS Annual Energy Loads - Cool: All	19.6 MJ/sqm
NatHERS star rating: All	6.5
Type of Heating System: All	Reverse cycle space
Heating System Efficiency: All	4 Star
Type of Cooling System: All	Refrigerative space
Cooling System Efficiency: All	4 Stars
Type of Hot Water System: All	Gas Instantaneous 5 star
% Contribution from solar hot water system: All	-
Clothes Line: All	Private outdoor clothesline
Clothes Dryer: All	No clothes dryer

1.2 Thermal Performance Rating - Residential — 16%

Score Contribution	This credit contributes 27.3% towards the category score.
Criteria	What is the average NatHERS rating?
Output	Average NATHERS Rating (Weighted)
Townhouse	6.5 Stars

2.1 Greenhouse Gas Emissions — 100%

Score Contribution	This credit contributes 9.1% towards the category score.
Criteria	What is the % reduction in annual greenhouse gas emissions against the benchmark?
Output	Reference Building with Reference Services (BCA only)
Townhouse	13,701 kg CO2
Output	Proposed Building with Proposed Services (Actual Building)
Townhouse	6,156 kg CO2
Output	% Reduction in GHG Emissions
Townhouse	55 %

2.2 Peak Demand		0%	
Score Contribution	This credit contributes 4.5% towards the category score.		
Criteria	What is the % reduction in the instantaneous (peak-hour) demand against the benchmark?		
Output	Peak Thermal Cooling Load - Baseline		
Townhouse	26.1 kW		
Output	Peak Thermal Cooling Load - Proposed		
Townhouse	25.5 kW		
Output	Peak Thermal Cooling Load - % Reduction		
Townhouse	2 %		
2.3 Electricity Consumption		100%	
Score Contribution	This credit contributes 9.1% towards the category score.		
Criteria	What is the % reduction in annual electricity consumption against the benchmark?		
Output	Reference		
Townhouse	11,779 kWh		
Output	Proposed		
Townhouse	4,700 kWh		
Output	Improvement		
Townhouse	60 %		
2.4 Gas Consumption		100%	
Score Contribution	This credit contributes 9.1% towards the category score.		
Criteria	What is the % reduction in annual gas consumption against the benchmark?		
Output	Reference		
Townhouse	32,823 MJ		
Output	Proposed		
Townhouse	26,490 MJ		
Output	Improvement		
Townhouse	19 %		
2.5 Wood Consumption		N/A	Scoped Out
This credit was scoped out	No wood heating system present		
2.6 Electrification		0%	Disabled
This credit is disabled	Credit is available when project is declared to have no gas connection.		

3.2 Hot Water		100%	
Score Contribution	This credit contributes 4.5% towards the category score.		
Criteria	What is the % reduction in annual energy consumption (gas and electricity) of the hot water system against the benchmark?		
Output	Reference		
Townhouse	32,823 MJ		
Output	Proposed		
Townhouse	26,940 MJ		
Output	Improvement		
Townhouse	17 %		
3.3 External Lighting		100%	
Score Contribution	This credit contributes 4.5% towards the category score.		
Criteria	Is the external lighting controlled by a motion detector?		
Question	Criteria Achieved ?		
Townhouse	Yes		
3.4 Clothes Drying		100%	
Score Contribution	This credit contributes 4.5% towards the category score.		
Criteria	What is the % reduction in annual energy consumption (gas and electricity) from a combination of clothes lines and efficient driers against the benchmark?		
Output	Reference		
Townhouse	1,279 kWh		
Output	Proposed		
Townhouse	256 kWh		
Output	Improvement		
Townhouse	80 %		
3.5 Internal Lighting - Houses and Townhouses		100%	
Score Contribution	This credit contributes 4.5% towards the category score.		
Criteria	Does the development achieve a maximum illumination power density of 4W/sqm or less?		
Question	Criteria Achieved?		
Townhouse	Yes		
4.4 Renewable Energy Systems - Other		0%	⊘ Disabled
This credit is disabled	No other (non-solar PV) renewable energy is in use.		
4.5 Solar PV - Houses and Townhouses		0%	⊘ Disabled
This credit is disabled	No solar PV renewable energy is in use.		

Stormwater

Overall contribution 14% Minimum required 100%

Which stormwater modelling are you using?:	Melbourne Water STORM tool
1.1 Stormwater Treatment	100%
Score Contribution	This credit contributes 100.0% towards the category score.
Criteria	Has best practice stormwater management been demonstrated?
Question	STORM score achieved
Project	100
Output	Min STORM Score
Project	100

IEQ

Overall contribution 13% Minimum required 50%

2.2 Cross Flow Ventilation	100%
Score Contribution	This credit contributes 20.0% towards the category score.
Criteria	Are all habitable rooms designed to achieve natural cross flow ventilation?
Question	Criteria Achieved ?
Townhouse	Yes
3.1 Thermal comfort - Double Glazing	100%
Score Contribution	This credit contributes 40.0% towards the category score.
Criteria	Is double glazing (or better) used to all habitable areas?
Question	Criteria Achieved ?
Townhouse	Yes
3.2 Thermal Comfort - External Shading	100%
Score Contribution	This credit contributes 20.0% towards the category score.
Criteria	Is appropriate external shading provided to east, west and north facing glazing?
Question	Criteria Achieved ?
Townhouse	Yes
3.3 Thermal Comfort - Orientation	0%
Score Contribution	This credit contributes 20.0% towards the category score.
Criteria	Are at least 50% of living areas orientated to the north?
Question	Criteria Achieved ?
Townhouse	No

Transport

Overall contribution 4%

1.1 Bicycle Parking - Residential		0%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	How many secure and undercover bicycle spaces are there per dwelling for residents?	
Question	Bicycle Spaces Provided ?	
Townhouse	-	

1.2 Bicycle Parking - Residential Visitor		N/A	Scoped Out
This credit was scoped out	Not enough dwellings.		

2.1 Electric Vehicle Infrastructure		100%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	Are facilities provided for the charging of electric vehicles?	
Question	Criteria Achieved ?	
Project	Yes	

Waste

Overall contribution 0%

1.1 - Construction Waste - Building Re-Use		0%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	If the development is on a site that has been previously developed, has at least 30% of the existing building been re-used?	
Question	Criteria Achieved ?	
Project	No	

2.1 - Operational Waste - Food & Garden Waste		0%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	Are facilities provided for on-site management of food and garden waste?	
Question	Criteria Achieved ?	
Project	No	

Urban Ecology

Overall contribution 3%

2.1 Vegetation		100%
Score Contribution	This credit contributes 50.0% towards the category score.	
Criteria	How much of the site is covered with vegetation, expressed as a percentage of the total site area?	
Question	Percentage Achieved ?	
Project	40 %	

2.2 Green Roofs		0%
Score Contribution	This credit contributes 12.5% towards the category score.	
Criteria	Does the development incorporate a green roof?	
Question	Criteria Achieved ?	
Project	No	

2.3 Green Walls and Facades		0%
Score Contribution	This credit contributes 12.5% towards the category score.	
Criteria	Does the development incorporate a green wall or green façade?	
Question	Criteria Achieved ?	
Project	No	

2.4 Private Open Space - Balcony / Courtyard Ecology		100%
Score Contribution	This credit contributes 12.5% towards the category score.	
Criteria	Is there a tap and floor waste on every balcony / in every courtyard?	
Question	Criteria Achieved ?	
Townhouse	Yes	

3.1 Food Production - Residential		0%
Score Contribution	This credit contributes 12.5% towards the category score.	
Criteria	What area of space per resident is dedicated to food production?	
Question	Food Production Area	
Townhouse	-	
Output	Min Food Production Area	
Townhouse	2 m^2	

Innovation

Overall contribution 0%

1.1 Innovation		0%
Score Contribution	This credit contributes 100.0% towards the category score.	
Criteria	What percentage of the Innovation points have been claimed (10 points maximum)?	