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436 Lonsdale Street

Stormwater Management Plan

Reference: C001 Stormwater Management

0 | 14 May 2024

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Job number 292627

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Contents

1.	Acknowledgement of Country	1
2.	Introduction	2
2.1	Scope	2
2.2	Limitations	2
3.	Site Conditions	3
3.1	Existing Site Location	3
3.2	Topography	3
3.3	Existing Drainage	3
3.4	Permissible Site Discharge	4
3.5	Proposed Development	5
4.	Hydraulic Assessment	6
4.1	General	6
5.	Stormwater Quality (MUSIC)	8
5.1	Standards and Guidelines	8
5.2	Design Criteria	8
5.3	MUSIC Modelling	8
5.4	Conclusion	10

Tables

Table 1. Sources of Information	2
Table 2. Calculated Permissible site discharge	5
Table 3. Project catchment areas	6
Table 4. Project Site storage	7
Table 5. MUSIC Model treatment results	9

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Figures

Figure 1. Project site location (Nearmap 2024)	3
Figure 2. Existing drainage connections (BYDA 2024)	4
Figure 3. Existing roof catchment areas	5
Figure 4. Proposed roof catchment areas	6
Figure 5. Stormwater Drainage asset schematic	7
Figure 6. MUSIC Model treatment train	9

Appendices

A.1	Detention Storage Hydrographs	11
A.2	City of Melbourne Engagement	16
A.3	Technical Specifications	17

1. Acknowledgement of Country

Arup acknowledges the Traditional Owners across all lands, waters, and skies our firm may reach; we acknowledge their wisdom, resilience, and rich cultural heritage. We pay our respects to the Elders, past and present, and to all Aboriginal and Torres Strait Islander peoples. We recognise the ongoing journey of healing and reconciliation, and Arup commits to walking alongside First Nations peoples, to acknowledge their teachings and foster a future of unity and respect.

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2. Introduction

Number 436 Lonsdale Street (‘the Site’) is a nine-story office building with a site area of approximately 1,4787 m², located in Melbourne’s Central Business District (CBD). The Traditional Owners of that Land are the Wurundjeri Woi-wurrung People.

The Site has historically been used as hearing rooms used by the Supreme Court and the Children’s Court, with associated office accommodation for jurisdictional staff. The building is owned by the Department of Treasury and Finance and is proposed for mixed use redevelopment.

Arup have been engaged to deliver a Stormwater Management Plan for the site located at 436 Lonsdale Street, Melbourne, Vic 3000. The purpose of this Stormwater Management Plan is to support the planning application.

2.1 Scope

In preparing this Stormwater Management Palan, the following activities have been undertaken:

- Before You Dig Australia (BYDA)
- MUSIC Modelling
- Engagement with City of Melbourne (Pre-Application submission attached)

Table 1. Sources of Information

Author:	Publication Date:	Document:
John Wardle Architects	2024	436 Lonsdale Street Floor Plans
John Wardle Architects	2022	436 Lonsdale Street Existing Conditions
Melbourne Water	2023	MUSIC (Model for Urban Stormwater Improvement Conceptualisation) Guideline
City of Melbourne	2023	Stormwater Drainage Design Guidelines
City of Melbourne	2015	Elizabeth Street Catchment Integrated Water Cycle Management (IWCM) Plan
City of Melbourne	2014	WSUD Guidelines
Department of Environment, Land, Water and Planning	2014	Melbourne Planning Scheme, Local Planning Policies – Clause 22.23 Stormwater Management (Water Sensitive Urban Design)

2.2 Limitations

This report has been prepared for and may be used and relied on solely by John Wardle Architects team for the purpose described in this report. Reliance on this report by other parties is subject to agreement in writing by Arup.

The services undertaken by Arup in connection with preparing this report were limited to those outlined in Section 2.1 and are subject to the limitations set out in this section and throughout the report. The findings and conclusions presented in this report are based on the proposed development as described in Section 2.1. The findings of this report will need to be reviewed and reassessed should this change.

Arup has based this report on the sources detailed within the report text and believes them to be reliable but cannot and does not guarantee the authenticity or reliability of third-party information. Reasonable skill and care have been exercised in preparation of this report in accordance with the technical requirements of the brief. Notwithstanding the efforts made by the professional team in undertaking this assessment, it is possible that site conditions other than that potentially indicated by this report may exist within at the Site.

3. Site Conditions

3.1 Existing Site Location

The site is located in inner Melbourne's central business district, within the City of Melbourne Council. The site is on the corner of Lonsdale Street to the south and Lonsdale Lane to the west and surrounded by court area and heritage buildings to the north. The location of the project site can be viewed in the Figure below.

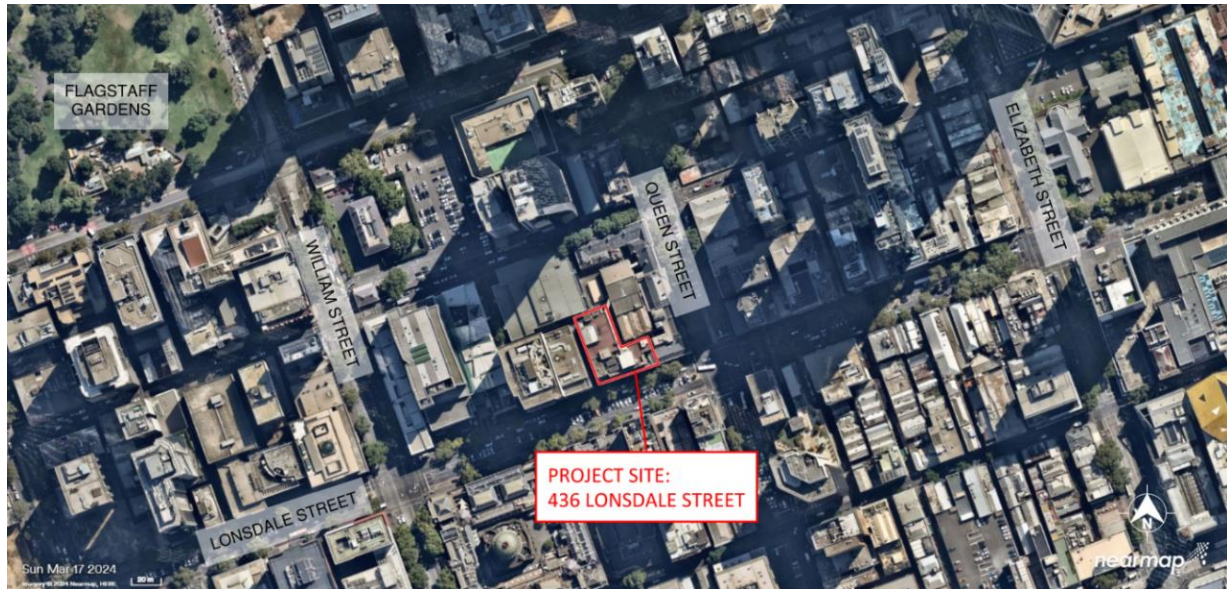


Figure 1. Project site location (Nearmap 2024)

3.2 Topography

Topographically, there is a fall of approximately 4.8% fall from the west to the east of the site, towards the Elizabeth Street flow corridor.

The site is located in the western edged of the Elizabeth Street Catchment, which drains south towards the Yarra River. Floodway, Land Subject to Inundation and Special Buildings do not impact the project site.

The total site area is approximately 1,487m².

3.3 Existing Drainage

Before you Dig Australia enquiry indicate three potential discharge points into the City of Melbourne (CoM) drainage pipes located on Lonsdale Lane, along the western edge of the site, from there the drainage network connects into the main pipe network along Lonsdale Street. At the time of writing confirmation with CoM on the discharge point to assume as the Legal Point of Discharge (LPOD) is still unconfirmed.

The Elizabeth Street Catchment IWCM Plan (2015) indicates the overland flow will travel west along Lonsdale Street and then into SEP collector pits, which direct flows towards Elizabeth Street drainage network, to ultimately drain into the Yarra River.

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The existing drainage connection points within the project site that connect to the council network are and pending a detail feature survey in future project phases to confirm the features of these connections including, size, material, invert levels and quality. Currently it is assumed that the site drains via down pipes that outlet into the road kerb and captured into grated pits along Lonsdale Lane.

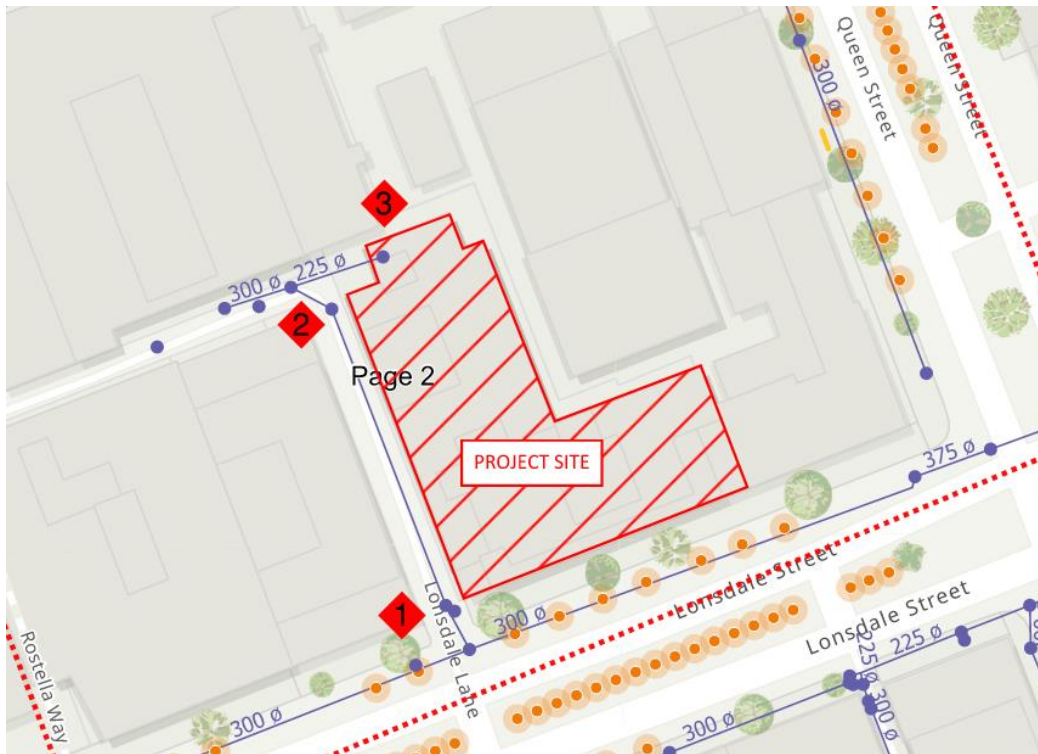


Figure 2. Existing drainage connections (BYDA 2024)

3.4 Permissible Site Discharge

As per the City of Melbourne, Stormwater Drainage Design Guidelines (2023) the pre-development permissible site discharge flows have been estimated using the Rational Method and the following input parameters:

- Intensity frequency duration data tables for the project site (Australian Rainfall and Runoff 2016 IFDs)
- 92.1 mm/hr rainfall intensity for 20% Annual Exceedance Probability (AEP) event
- 187 mm/hr rainfall intensity for 1% Annual Exceedance Probability (AEP) event
- 5 minute time of concentration
- 0.9 runoff coefficient

From the identified three discharge points from BYDA (Figure 2) into the CoM, assessment of the site permissible discharge was split up and completed on the three separate catchments. The catchment split into a given council pit was assumed from the existing roof plan fall and an assessment of external down pipe locations.

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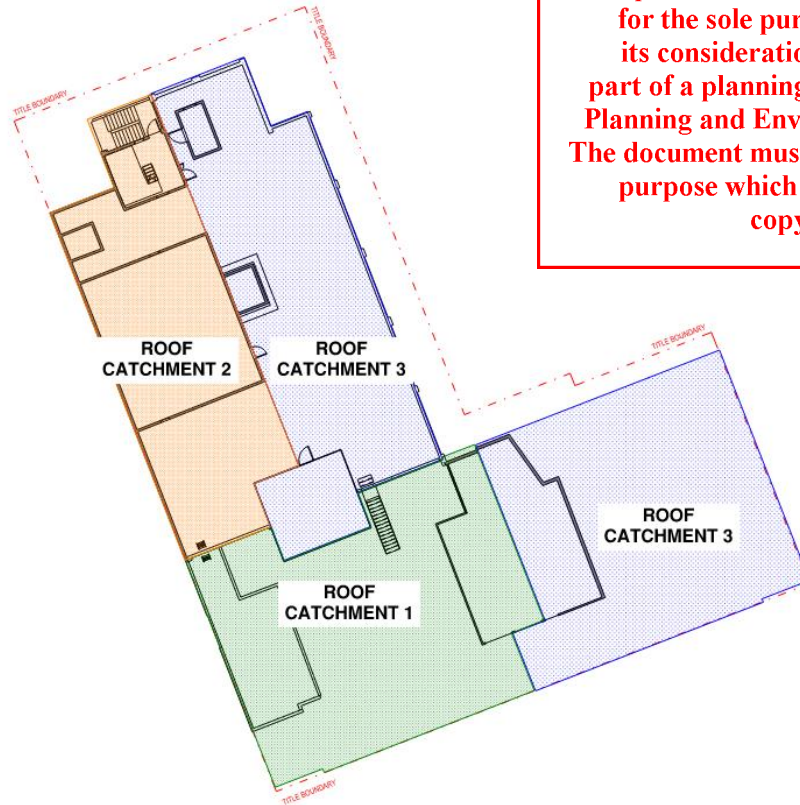


Figure 3. Existing roof catchment areas

Table 2. Calculated Permissible site discharge

Existing Flow (m ³ /s) (Calculated)	20% AEP (m ³ /s)	1% AEP (m ³ /s)
Roof Catchment 1	0.00779	0.01849
Roof Catchment 2	0.00597	0.01418
Roof Catchment 3	0.01435	0.03407

Further consultation with City of Melbourne is currently ongoing to confirm the approved legal point of discharge and peak permissible discharge flows (refer to Appendix A.2).

3.5 Proposed Development

The general strategy is to divert runoff from roof catchments and surrounding pavements areas into a rainwater reuse tank within the building basement. Overflow of this reuse system will be treated and stored prior to pumping out onto ground level and discharged into the council network via the legal point of discharge.

The City of Melbourne Stormwater Drainage Design Guidelines (2023) require the drainage network for Region 1- Central Business District and Growth Areas, to be designed to pre-development 20% AEP peak stormwater flows. Additionally, to provide site storage for the 1% AEP flood protection with an 18.5% increased rainfall intensity to account for climate change.

To achieve the estimated peak permissible discharge rate for the 20% AEP event, a stormwater rainwater tank will be required on site. The tank is proposed to sit in building’s basement and pumped to the LPOD. Modelling and sizing of the tank will be discussed further in Section 4.1 of this report.

All other remaining pipe connections on site and to the council network will be sized for the existing 20% AEP peak flow.

4. Hydraulic Assessment

4.1 General

A stormwater detention tank has been proposed as part of the internal drainage network in accordance with the City of Melbourne Stormwater Drainage Design Guidelines (2023) Section 3.2.1. S

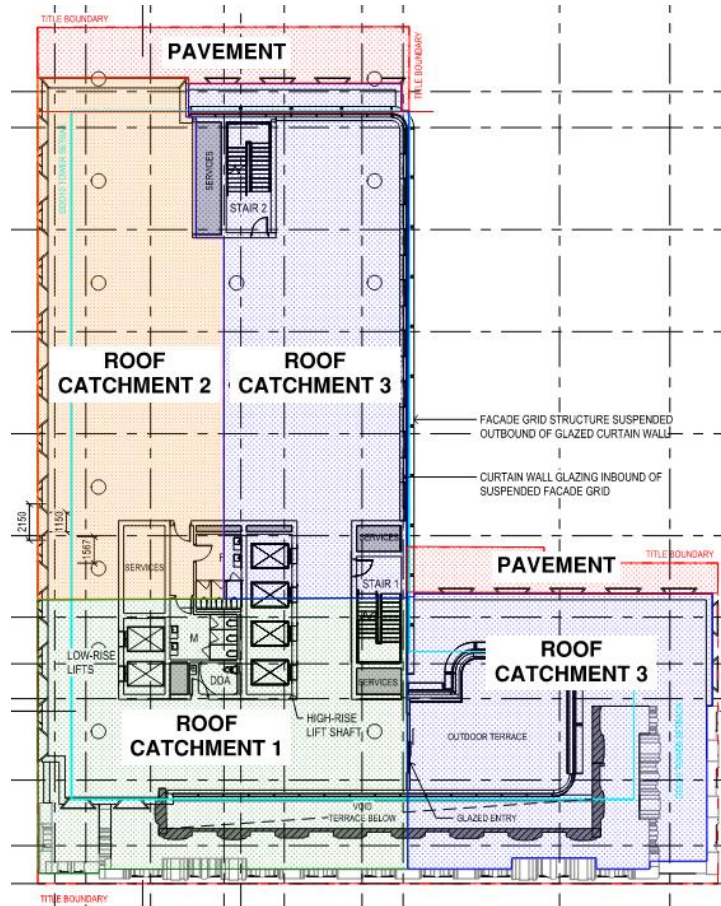


Figure 4. Proposed roof catchment areas

Table 3. Project catchment areas

Catchment	Existing Area (m ²)	Proposed Area (m ²)
Roof Catchment 1	356	352
Roof Catchment 2	273	324
Roof Catchment 3	656	636
Pavement	202	175
Pervious	0	0
Total Area	1487	1487

A Mass Curve calculation has been used to determine the size the required detention storage with rational flow calculation used to determine the predeveloped and post development flow rates.

Various rain event conditions were assessed for site storage shown Table 4, however, the site storage requirement for the site will be taken as the storage required for the 1% AEP plus climate change storm event, as Section 3.2.1 the City of Melbourne Stormwater Drainage Design Guidelines (2023) states:

“Factor to account for 18.5% increased rainfall intensity due to climate change”

Table 4. Project Site storage

	Roof Catchment 1	Roof Catchment 2	Roof Catchment 3	Totals
20% AEP				
Existing Flow (m ³ /s)	0.00779	0.00597	0.01435	
Proposed Flow (m ³ /s)	0.01003	0.00831	0.01812	
Required Detention (m ³)	0.27	0.42	0.45	1.14
1% AEP				
Existing Flow (m ³ /s)	0.00779	0.00597	0.01435	
Proposed Flow (m ³ /s)	0.01408	0.01197	0.02667	
Required Detention (m ³)	3.78	4.32	6.66	14.75
1% AEP + Climate Change (18.5% increased rainfall intensity)				
Existing Flow (m ³ /s)	0.00779	0.00597	0.01435	
Proposed Flow (m ³ /s)	0.01541	0.01311	0.02784	
Required Detention (m ³)	5.49	6.00	9.72	21.21

The total storage requirement from the roof catchments is to be taken as 25 kL (Table 4).

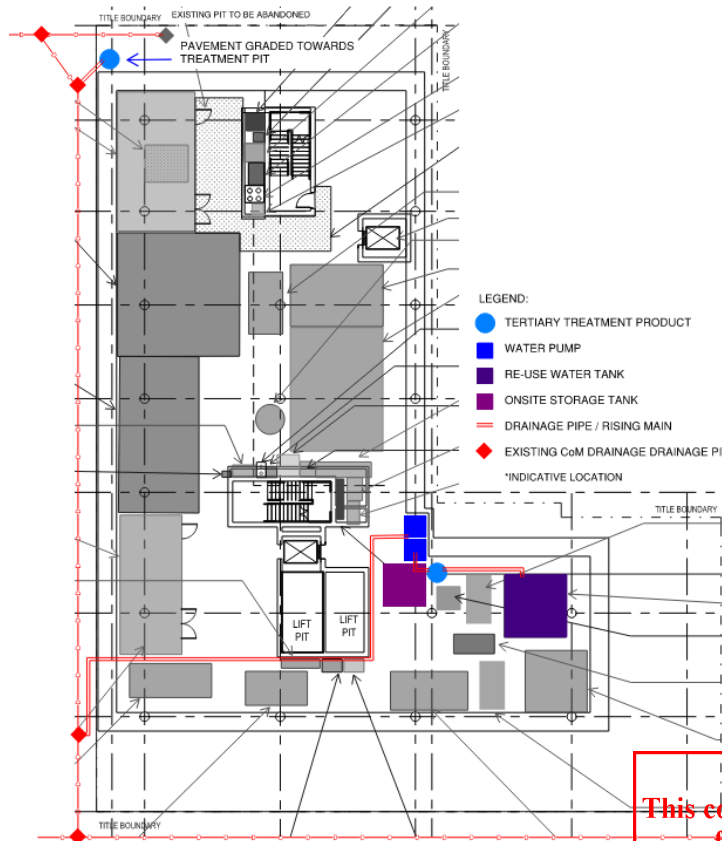


Figure 5. Stormwater Drainage asset schematic

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5. Stormwater Quality (MUSIC)

5.1 Standards and Guidelines

This document has been prepared with reference to the following:

- *City of Melbourne. (2023). Stormwater Drainage Design Guidelines*
- *City of Melbourne. (2014). WSUD Guidelines*
- *Department of Environment, Land, Water and Planning. (2014). Melbourne Planning Scheme, Local Planning Policies – Clause 22.23 Stormwater Management (Water Sensitive Urban Design)*

The project will be targeting Green Star credits for stormwater and consideration to these requirements have also been included in this management plan.

5.2 Design Criteria

The stormwater design will target City of Melbourne and Green Star treatment objectives, adopting the greater reduction value defined in respective guidelines for each pollutant:

- 90% reduction in Total Suspended Solids
- 60% reduction in Total Nitrogen
- 70% reduction in Total Phosphorus
- 95% reduction in litter from typical urban loads

5.3 MUSIC Modelling

Stormwater quality for the site has been modelled using the performance tool Model for Urban Stormwater Improvement Conceptualisation (MUSIC).

Treatment elements adopted include the following:

- A single cartridge AtlanFilter FIL-3.0 (proprietary secondary treatment unit)
- 25 kL storage to cater for 1% AEP + Climate change
- 50 kL storage located within the rainwater harvesting tank for onsite re-use

Site sub-catchments have been separated into individual source nodes to reflect runoff paths to treatment elements and connections to the council drainage network. The MUSIC model layout is illustrated below.

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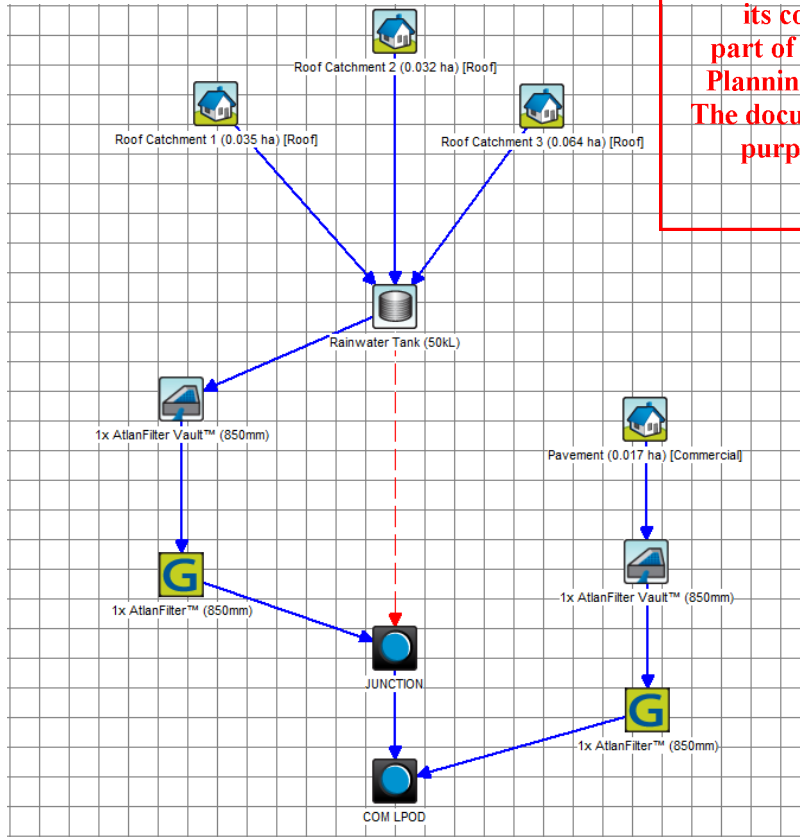


Figure 6. MUSIC Model treatment train

5.3.1 Rainwater Reuse

Rainfall runoff from all roofs and balconies will be diverted to rainwater harvesting tank to be reused within the building facilities. The reuse yearly demand adopted for the rainwater tank node was provided with the Arup, Sustainability team to meet.

5.3.2 Atlan Filter

An AtlanFilter FIL-1.5 (formerly SPEL Filter) is required to achieve the reduction targets. The AtlanFilter filter system has been verified by the Stormwater Quality Improvement Device Evaluation Protocol (SQIDEP). The MUSIC modelling nodes and inputs to accurately model the filter were specified by the suppliers’ technical specifications (Refer to Appendix for attached technical specifications).

5.3.3 Treatment Results

The MUSIC model treatment results are provided below and demonstrate compliance with the design criteria defined above.

Table 5. MUSIC Model treatment results

	Sources	Residual Load	% Reduction	CoM WSUD Guidelines % Target Reduction	Green Star % Target Reduction
Total Suspended Solids (kg/yr)	31.4	3.03	90.3	80	90
Total Phosphorus (kg/yr)	0.123	0.0289	76.6	45	70
Total Nitrogen (kg/yr)	1.59	0.604	62.1	45	60
Gross Pollutants (kg/yr)	27.3	0.00	100.0	70	95

5.3.4 Green Star Credit 39 Waterway Protection

It is understood from the hydraulic engineers that a 50 kL tank has been provided for rainwater harvesting to meet the building reuse requirements. This tank should allow greater than 40% reuse of average monthly rainfall received by the site catchment and thus satisfy the Greenstar requirements for Credit 39 Waterway Protection in conjunction with the quality improvement devices being proposed as part of the drainage scheme as per Table 5.

5.4 Conclusion

The general strategy for 436 Lonsdale Street is to divert runoff from roof catchments areas into a rainwater reuse tank. Overflow from the reuse system will be treated and stored prior to pumping out onto ground level. From there it will be discharged into the council network via the legal point of discharge, that at the time of writing is still in discussions with CoM. The surrounding pavements areas will be graded towards the All other remaining pipe connections on site and to the council network will be sized for the existing 20% AEP peak flow.

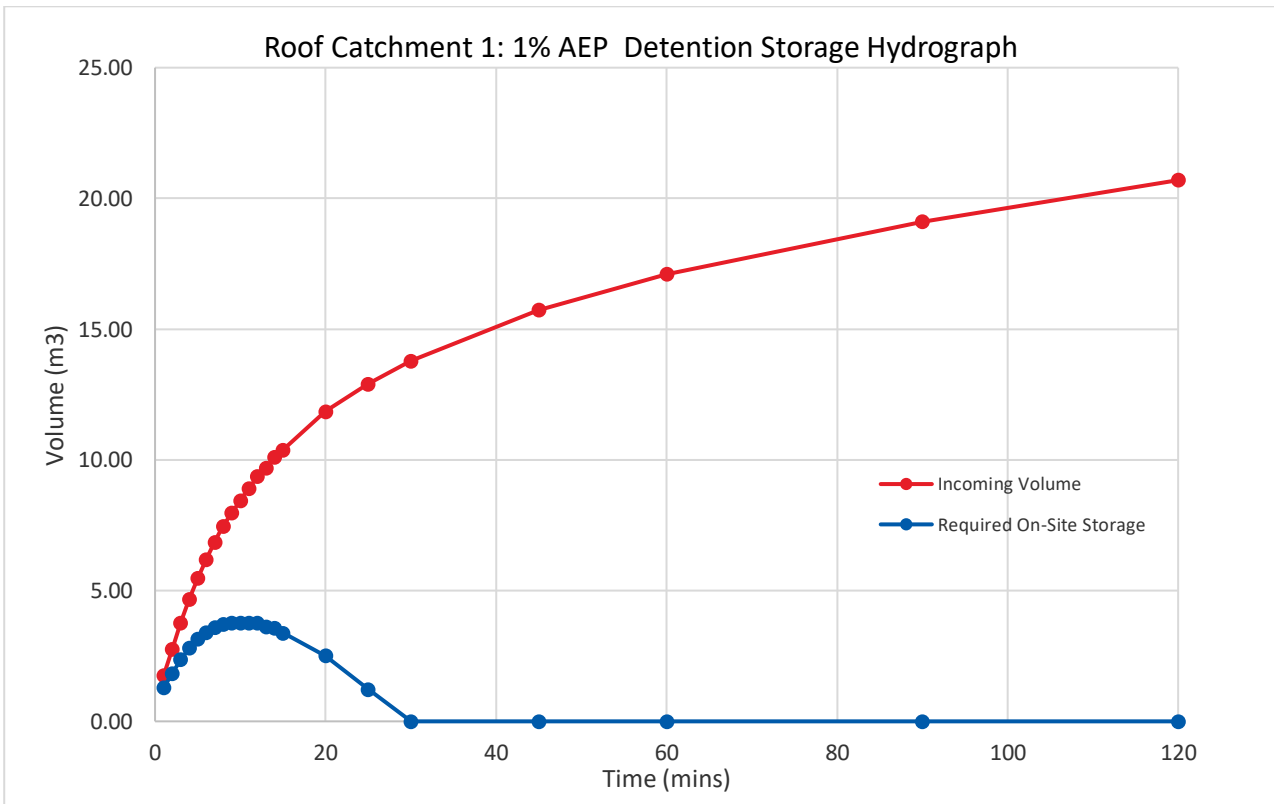
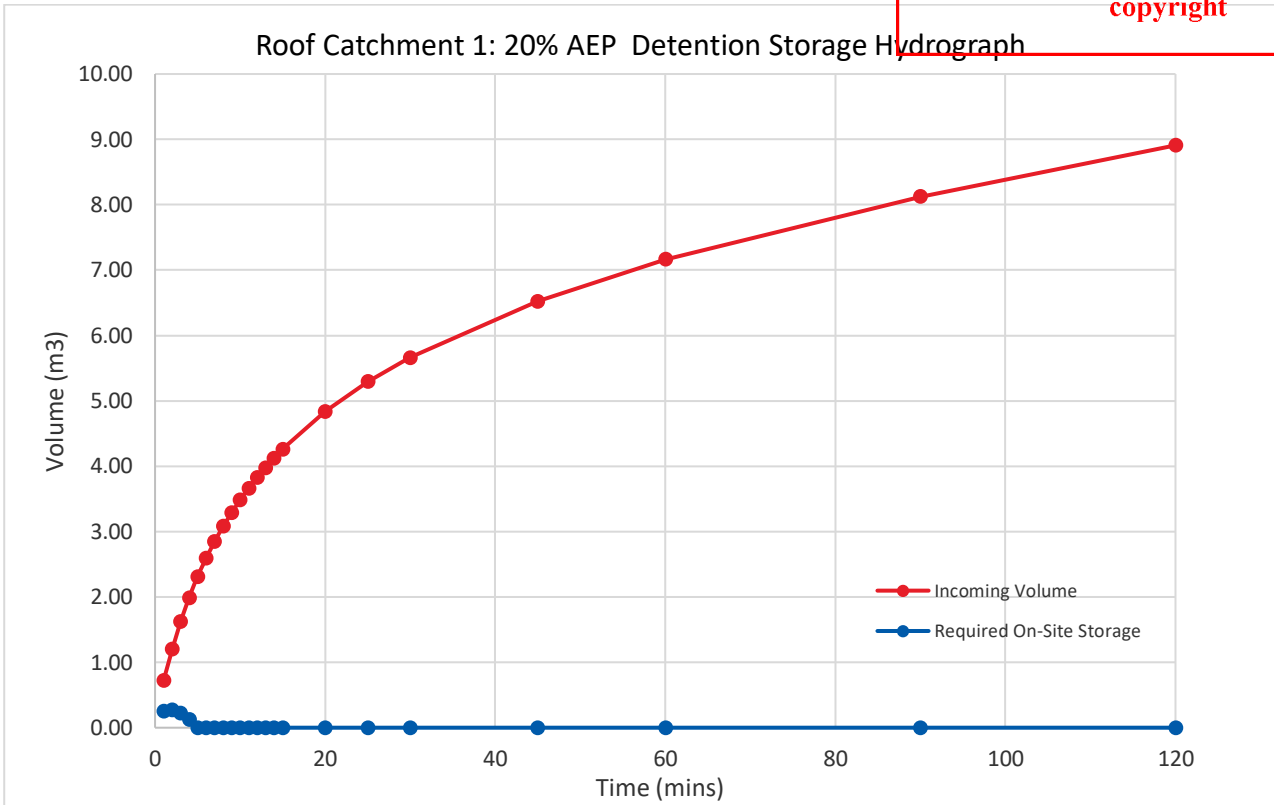
While the overall development catchment area does not increase the roof catchment area will increase and the inclusion of allowances for changes in rainfall intensity due to climate change, results in an overall increase in peak flows generated at the site. A total of 25 kL of detention storage is to be provided in the design.

Stormwater quality treatment targets will be achieved through a combination of rainwater reuse and the use of proprietary filter systems.

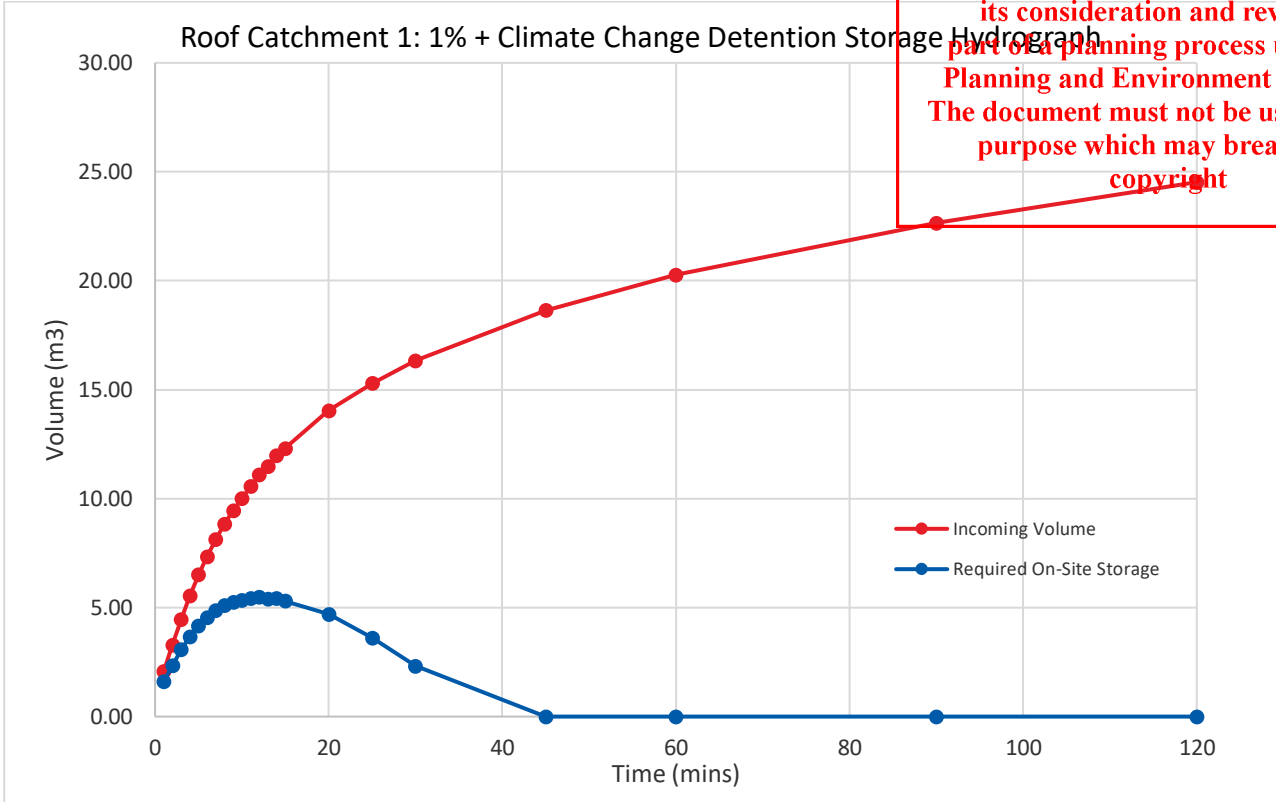
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A.1 Detention Storage Hydrographs

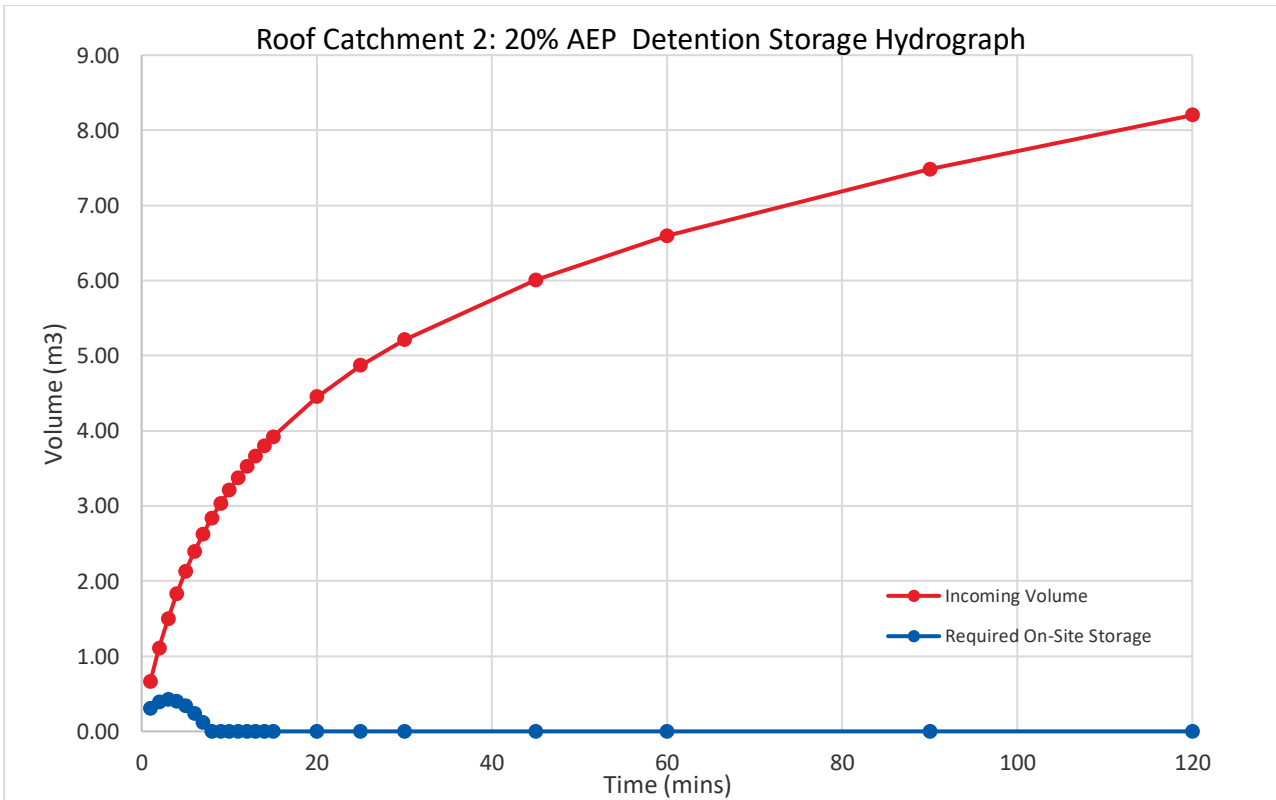
Roof Catchment 1 Hydrographs:

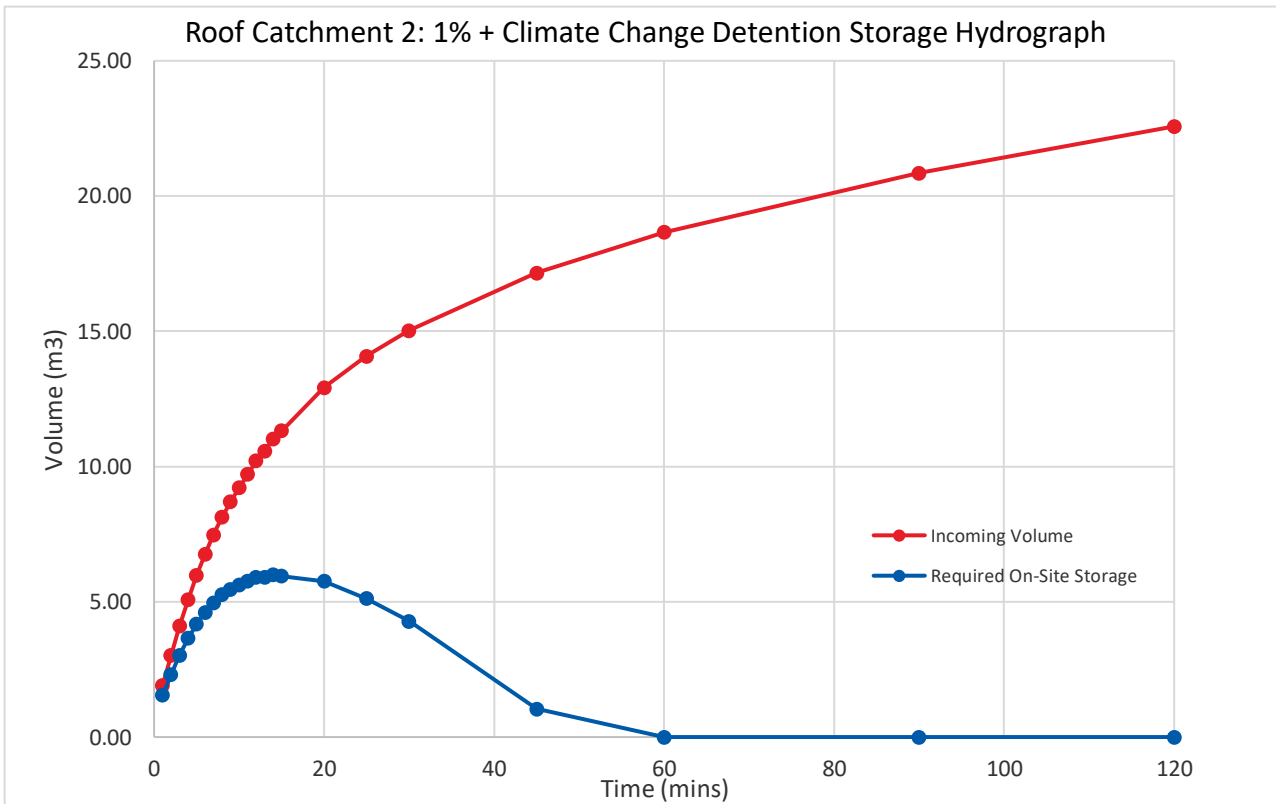
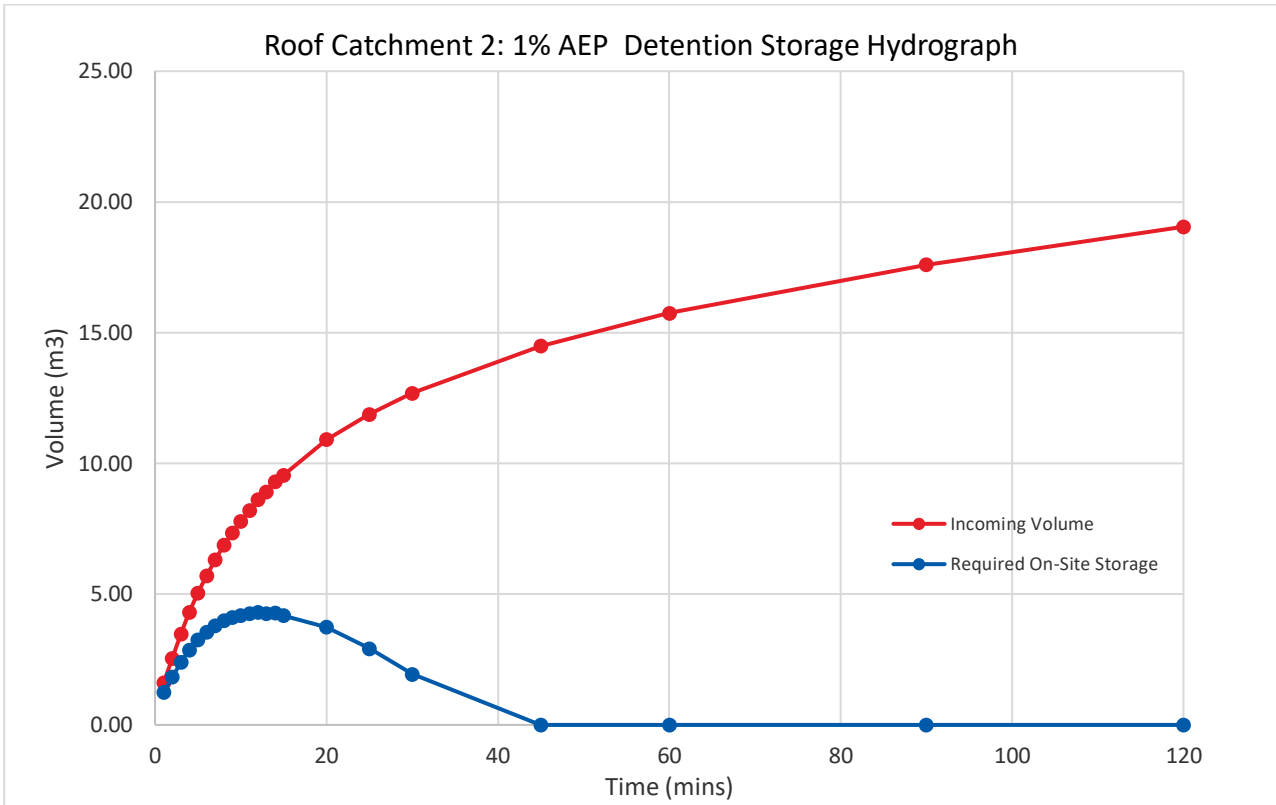


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Roof Catchment 2 Hydrographs:

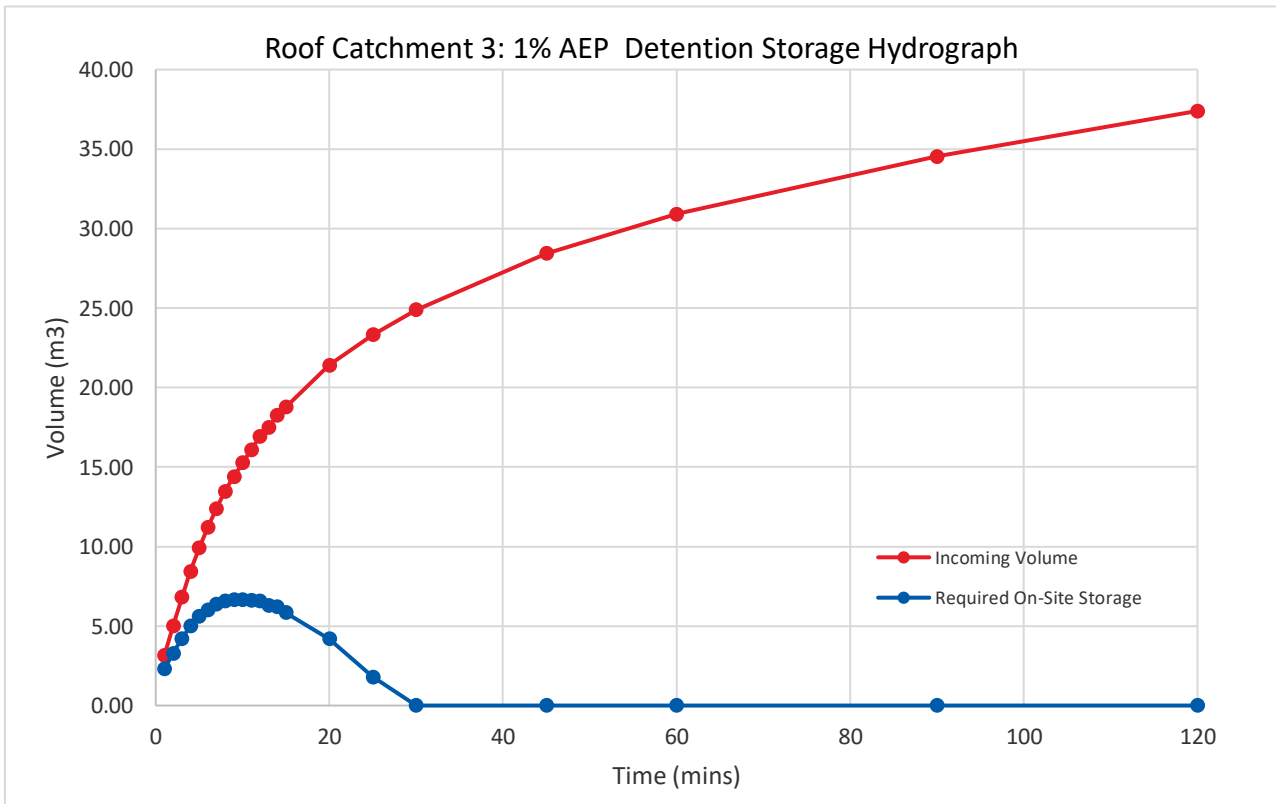
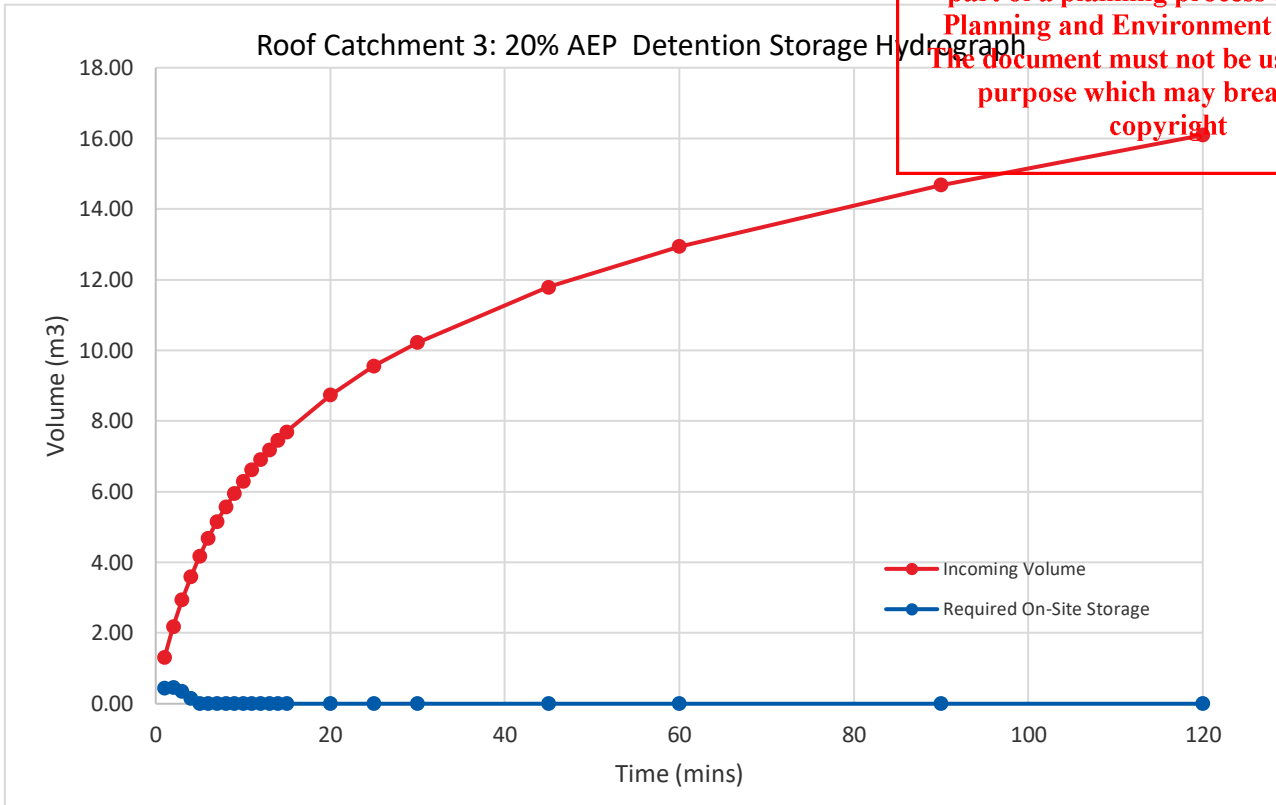


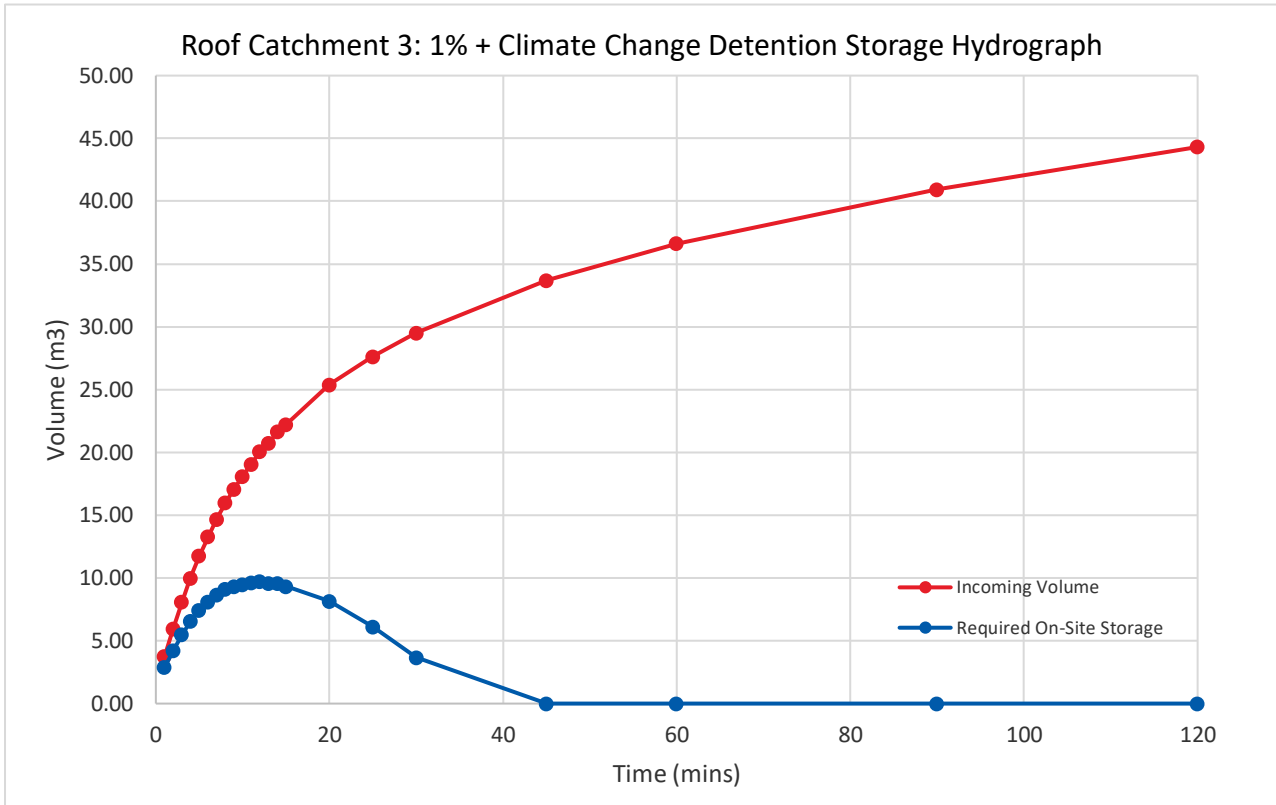


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Roof Catchment 3 Hydrographs:





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A.2 City of Melbourne Engagement

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Nicole Corteza

From: Nicole Corteza
Sent: Friday, 3 May 2024 11:55 AM
To: 'planning@melbourne.vic.gov.au'
Cc: 'kah-Fai.Lee@wardle.studio'; Siddhesh Raute; Jessica (Micevska) Tascone; Hazel Short
Subject: 436 Lonsdale Street: Pre-application LPOD Enquiry
Attachments: planning-pre-application-advice-request.pdf; BYDA ASSET 237816320.pdf

Dear City of Melbourne Planning Team,

Attached with this email is the pre-application enquiry form seeking confirmation from CoM that the existing building can continue to utilise the existing LPOD along Lonsdale Street.

The proposed works comprise of a building redevelopment including upgrades to the existing building and infrastructure. The proposed drainage strategy will aim to maintain the existing stormwater regime; thus we are hoping to maintain the existing connection arrangement into the CoM council drainage system.

We look forward to receiving your feedback.

Kind Regards,

Nicole

Nicole Corteza
she/her/hers
Drainage Engineer | Civil Team

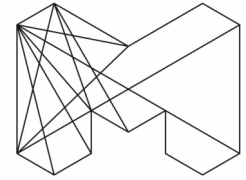
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City of Melbourne

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CITY OF MELBOURNE

PLANNING PRE-APPLICATION ADVICE REQUEST

Is this form for me? Complete this form as preparation for a pre-application discussion with a City of Melbourne planning officer.

How to prepare for the pre-application discussion? There are a number of things you can do to ensure that you get the most comprehensive pre-application advice. These include:

1. Look at the [Melbourne Planning Scheme](#) on our website including planning policies that may affect your application. Please list any questions you have about policies you find that may impact upon your request.
2. Obtain the zoning information and overlays for your property.
3. Obtain a copy of the Certificate of Title for the land. To get a current copy of title, visit the www.landata.vic.gov.au website and do an online title search.
4. Prepare preliminary designs and sketches that show how your proposal respects the site and the surrounding area, and how the design considers the site constraints.
5. Council also encourages all applicants to discuss their proposal with the owners/occupiers of neighbouring properties before lodging this request form. Where possible, addressing the concerns of neighbours early in the process can minimise delays later on as well as the costs of making changes to your plans.

Without all of the information listed above, the planning officer's advice may be limited.

Property details

Property address: 436 Lonsdale Street, Melbourne, 3000

Your details

Name: Nicole Corteza	Organisation: Arup
Postal Address: 1 Melbourne Quarter, 699 Collins Street, Docklands, Vic	Postcode: 3008
Telephone no (Business hours): +61 3 9668 5624	Mobile phone no:
Email Address: nicole.corteza@arup.com	Fax no:

Brief description of your proposal

Redevelopment of the existing building at the above address involving upgrades to the existing building and infrastructure.

Landscaping and forecourt handstand area/pavement works are anticipated to match existing ground levels and fall.

Where the building works results in a loss in existing drainage assets, they will be replaced to match existing performance criteria.

Please turn over for further details

What do you want specific advice about?

There is no change to the impermeable areas anticipated on site as the contributing catchments to the external network will remain unchanged.

Confirmation from City of Melbourne that the development can continue to discharge to the external council network within Lonsdale Lane and Lonsdale Street as per the existing conditions. Could the council please advise us on the permissible site discharge and onsite detention requirements.

We have identified three connections to the council network (see attached documentation), please advise which is the most suitable connection point for our site.

Supporting documentation

See attached BYDA (Before You Dig Australia) that shows the existing points of connection to the City of Melbourne stormwater network.

Lodging this form

In Person

Melbourne Town Hall
Administration building
120 Swanston Street
Melbourne

By Post

Planning Department
City of Melbourne
PO Box 1603
Melbourne VIC 3001

By email

planning@melbourne.vic.gov.au

*Between 7.30am and 5pm, Monday to Friday

What are the next steps? A Planning Officer will review the information that you have provided and will contact you to organise a time to discuss your request.

After you have received advice on the information provided with this pre-application request, you can contact the planning officer directly if you need further assistance, prior to lodging your full application.

You will also find comprehensive information on our [Planning Applications](#) webpage including when a planning application is required, what fees apply and how to lodge your application.

If you require further assistance, please call us on 03 9658 9658 between 8.30am and 5pm, Monday to Friday.

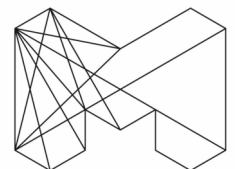
The City of Melbourne is committed to protecting your privacy. The personal information requested on this form is being collected by City of Melbourne for the purposes of assessment of planning permit applications, parts of which are set out in the Planning and Environment Act 1987 (PE Act). The personal information will be used for the following purposes:

- correspond with you about your permit application
- or for any other directly related, or reasonably related purposes.

The information you provide will be made available:

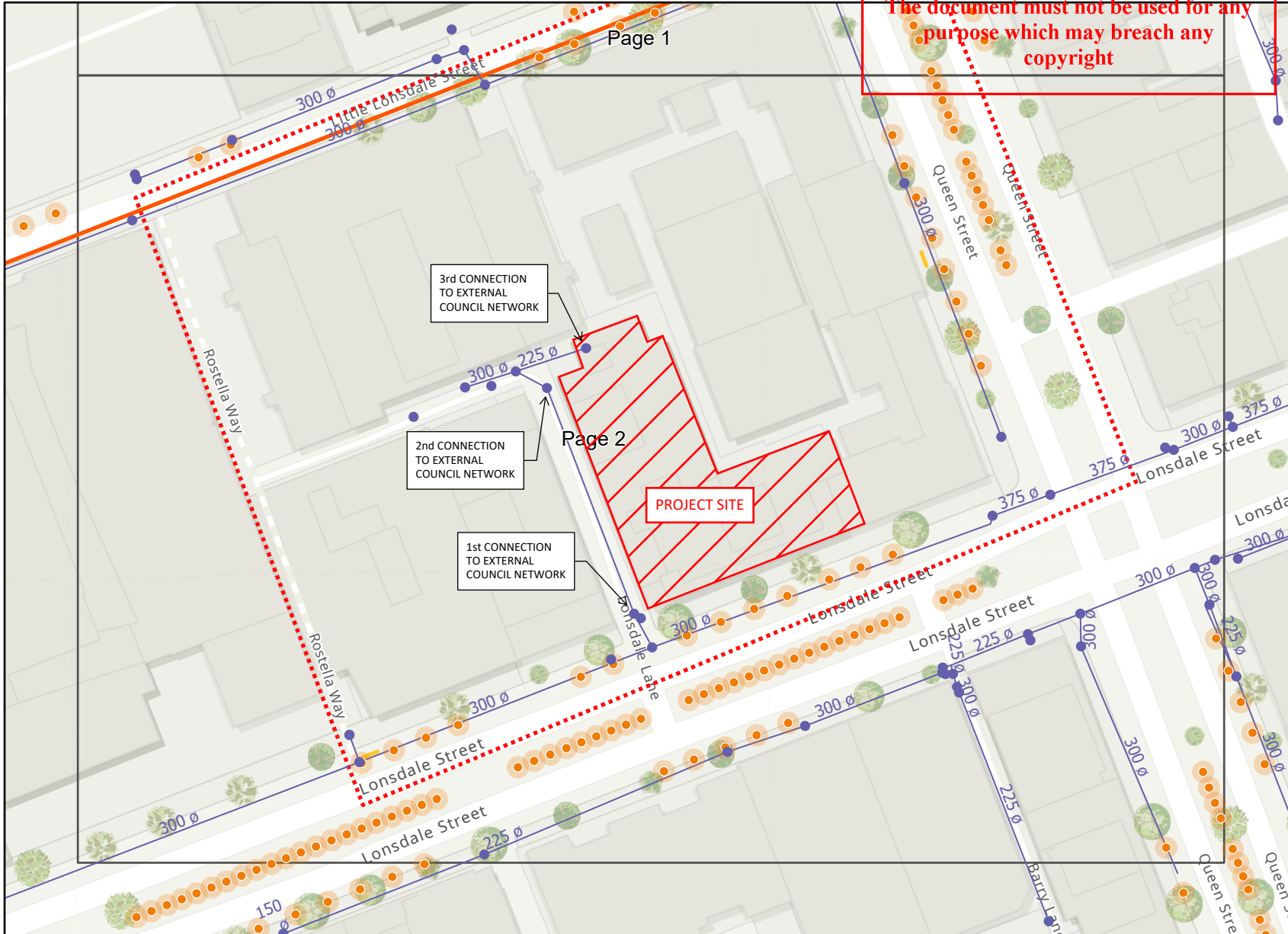
- to relevant officers within Council and other pertinent Government agencies directly involved in the planning process
- to persons accessing information in accordance with the Public Records Act 1973, Planning and Environment Act 1987 or the Freedom of Information Act 1982.

It will not be disclosed to any other external party without your consent, unless required or authorised by law. If the personal information is not collected, we may not be able to process your application. If you wish to access or alter any of the personal information you have supplied to City of Melbourne, please contact the Planning and Building branch by telephone 03 9658 9658 or email enquire@melbourne.vic.gov.au









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Legend


-  BYDA Enquiry
-  Underground Parking Sensor
-  Drainage Pit
-  Communications Conduit
-  Drainage Pipe
-  Electrical Conduit

Existing LPOD Arrangement

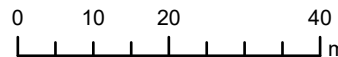
PROJECT SITE:
436 Lonsdale St, Melbourne, 3000

Before You Dig / For Information

1 May 2024

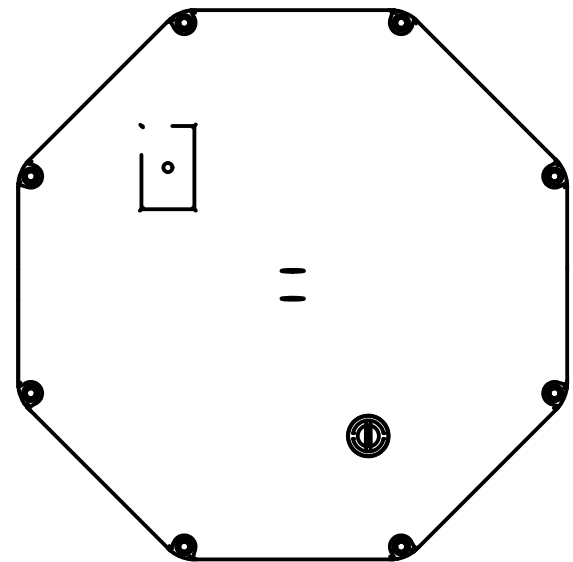


Disclaimer: The plan is provided in response to a Before You Dig request. While all reasonable care has been taken to ensure the accuracy of the information on this plan, its purpose is to provide a general indication of the location of City of Melbourne's infrastructure. The information provided may contain errors or omissions and the accuracy may not suit all users. A site inspection and investigation are recommended before commencement of any project based on this data.

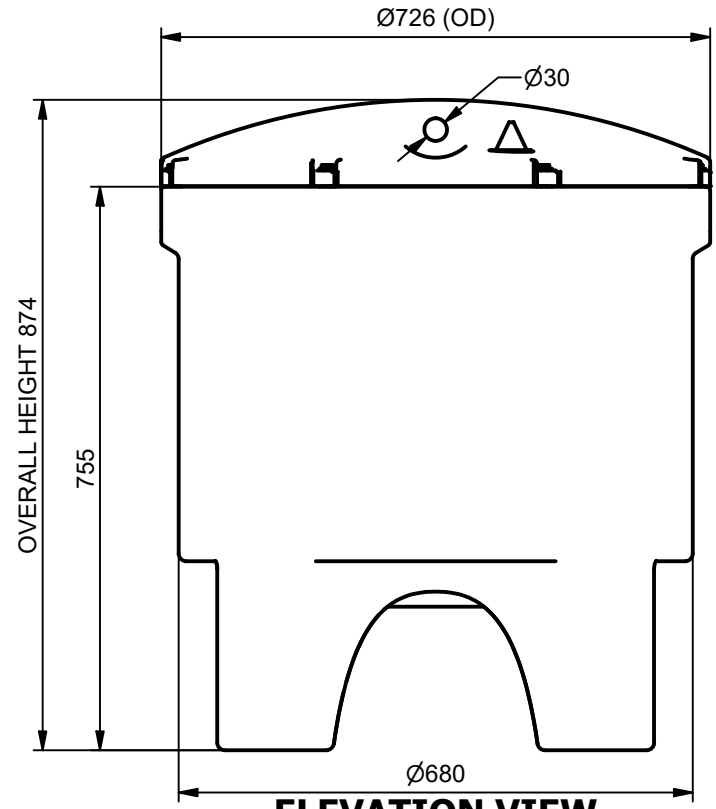


A.3 Technical Specifications

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PLAN VIEW



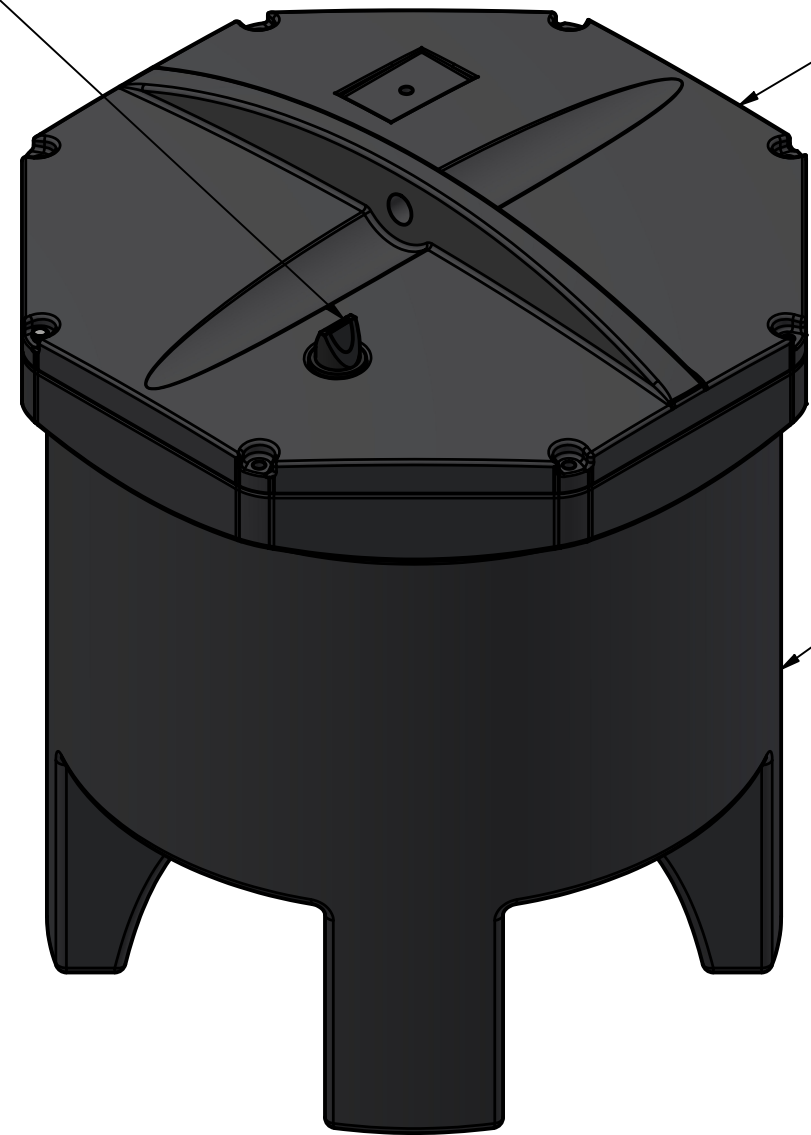
ELEVATION VIEW

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AIR RELEASE VALVE

POLY LID

FILTER BODY



TOLERANCE: All Dimensions to Closest 10 mm & +/- 30 mm | **ALL INTERCONNECTING PIPEWORK, PITS AND ASSOCIATED DRAINAGE BY OTHERS**

1	08/04/2024	R.J.	INITIAL RELEASE	
REV	DATE	BY	DESCRIPTION	CHK

CLIENT:

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Drawn	Date
R.J.	08/04/2024
Check	Date
Verified	Date
Approved	Date
Request No.	



PROJECT :			
TITLE			
ATLANFILTER MODEL : FIL-3.0 GENERAL ARRANGEMENT			
SCALE	SIZE	SHEET	REV
N.T.S	A3	1	1
CUSTOMER CODE :		DWG No.	
FIL-3.0			

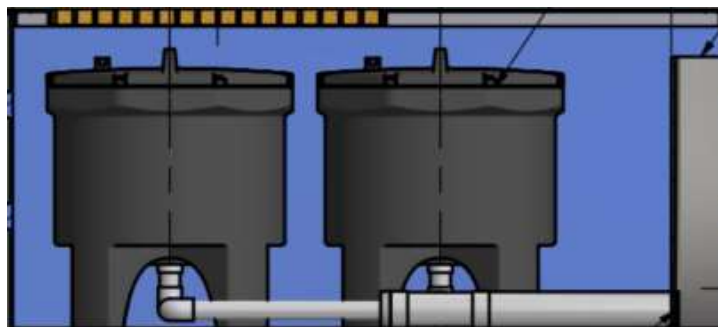
C:\Users\smart\OneDrive\Documents\Vault\Designs\ATLAN01 - STANDARDS\ATLAN FILTER\FIL-3.0\ENC\M\FIL-3.0.dwg



SPELFilter Parameters

Cartridge Size	Full Height
Weir Height (mm)	850
No. Cartridges	1
Vault Surface Area (sqm)	1

1. Select Cartridge Size
2. Correct Weir Height
3. Insert Number of Cartridges
4. Enter Vault surface area (min 1.0/cartridge)



MUSIC Modelling Inputs

SPELFilter Node	
SPELFilter Cartridge Model	1/SF 30 EMC-M
High Flow Bypass (m ³ /s)	0.00300
Low Flow Bypass (m ³ /s)	0.00
Efficiency [TSS / TP / TN / GP] (%)	85/74/59/0

MUSIC Inputs		
TSS	1000	150
TP	5	1.3
TN	50	20.5

SPELFilter Vault Node	
<u>Inlet Properties</u>	
Low Flow Bypass (m ³ /s)	0
High Flow Bypass (m ³ /s)	100.00
<u>Storage Properties</u>	
Minimum Vault Surface Area (m ²)*	1
Maximum Vault Surface Area (m ²)*	2
Extended Detention Depth (m)	0.85
Exfiltration Rate (mm/hr)	0
Evaporative Loss as % of PET	0
<u>Outlet Properties</u>	
Low Flow Orifice (mm)	39
Outlet Weir Width (m) ¹	Refer SPEL STD drawings
<u>More MUSIC Properties</u>	
k values [TSS / TP / TN]	1/1/1

¹FOR BLACKTOWN CITY COUNCIL PROJECTS REFER WSUD HANDBOOK
OSD - COMBINED OSD & FILTER CARTRIDGES (PLAN NO. A(BS)175M. WEIR LENGTH

www.spel.com.au/products/spel-filter

SPEL Support Contact: info@spel.com.au or 1300 SPEL 00

Revision 6 - 8/3/2023

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Stormwater Quality Improvement Device Evaluation Protocol (SQIDEP)

VERIFICATION CERTIFICATE

Applicant Information

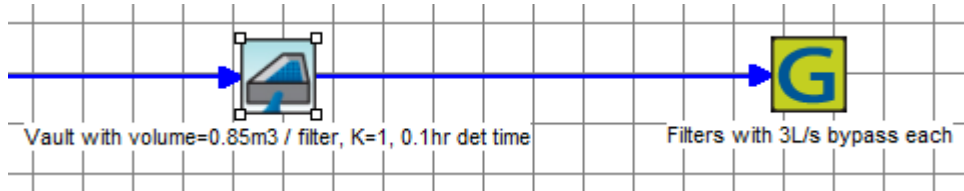
Applicant Name	SPEL Stormwater Pty Ltd
Applicant Address	130 Sandstone Pl, Parkinson QLD 4115
Phone Number	+61 1300 773 500
Email	sales@spel.com.au
Website	www.spel.com.au

Verified Technology	SPELFilter
Issue Date	23 December 2022
Reviewed Documents	<ul style="list-style-type: none"> ● SPEL Body of Evidence application submission (Prepared by Drapper Environmental Consultants) ● Statutory Declaration by Drapper Environmental Consultants ● Hydrographs of compliant and partially compliant events at the Hilton Foods site showing inflow, outflow, rainfall and samples collected (42 items) ● Sample collection and/or reset emails/site records at the Hilton Foods site (50 items) ● Laboratory Chain of Custody forms, Quality Control reports, QC Compliance Reviews & Certificates of Analysis ● Subsequent hydrograph plots for Hilton Foods site that included monitored outflow rates (and summary table of results) – (37 items), 17 October 2022.

Technology Information

Applicant's Verified Performance Claims	Treatable flow rate = 3 L/s per filter cartridge
	Total Suspended Solids (TSS) 85 %
	Total Phosphorus (TP) 74 %
	Total Nitrogen (TN) 59 %
	Total Petroleum Hydrocarbons 0 %
	Gross Pollutants 0 %

Maintenance performed during monitoring	None over 13 months
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Verified method to model in MUSIC	<p>Modelling a SPELFilter in MUSIC is as follows:</p> <ol style="list-style-type: none"> 1. Use a detention basin node to represent the vault (with modified 'K' values and nominal detention time set to the treatment flow rate of the cartridges) 2. Use a generic node with the monitored pollutant reduction values and have a high flow bypass of 3 L/s per cartridge.  <p>● The input criteria for the node is;</p> <ol style="list-style-type: none"> 1. Use a detention basin node to represent the vault <ul style="list-style-type: none"> ● with modified 'K' values with K=1 ● use size of 1m² per cartridge and 0.85m extended detention depth ● adopt a nominal detention time of 0.1 hours (plus or minus 10%). 2. Use a generic node with: <ul style="list-style-type: none"> ● a high flow bypass of 3 L/s per cartridge ● pollutant reductions of 85% for TSS ● pollutant reductions of 74% for TP ● pollutant reductions of 59% for TN. <p>When entering the data into MUSIC the detention basin surface area and high flow bypass rate of the generic node is factored up depending on the number of filter cartridges proposed. All other values listed above remain the same (note: the <i>Notional Detention Time</i> is adjusted by changing the <i>Low Flow Pipe Diameter</i>).</p>
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Conditions	<p>The limitations of the acceptance of these claims include:</p> <ul style="list-style-type: none"> ● Pit insert "Stormsacks" (for coarse material capture) are used for inlets upstream of the SPELFilter installation to ensure longevity of the filters ● Regular inspection & maintenance should be performed in accordance with the Manufacturer's Maintenance Plans.
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Independent Reviewers	<p>Dr Robin Allison Dr Ricky Kwan</p>
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Accepted by Governance Panel	22 December 2022
Accepted by Stormwater Australia Board	23 December 2022

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