

STORMWATER MANAGEMENT PLAN

~ 1:200

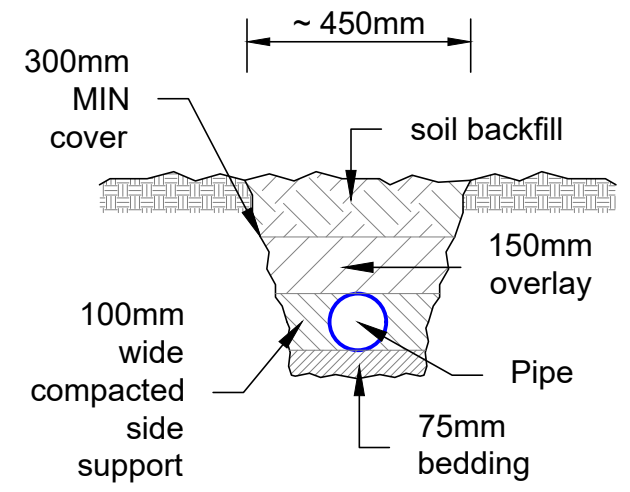
Proposed new residence refer to plans by Gartner Trovato Architects for details.
 Total Site Area - 1878m² Net Site Area - 1276m² (E4 Zone only)
 System as per Northern Beaches Councils Water Mangement for Development Policy Section 9.0 On Site Stormwater Management
 Section 9.3.1 Onsite Stormwater Disposal Requirementst Region 1 - Northern Catchments.
 Table 7 Requirements for Size and Allowable Discharge from On-Site Detention Systems.
 Existing hard surface area 292m² Proposed hard surface area 553m²

250 - 300m² additional hard surface therefore Minimum Capacity of OnSite Detention Tank - 18000l Discharge rate - 9 l/s
 Trunk drainage lines shown above to be 150 dia uPVC, Pits to be 450x450 uPVC.
 Complete system design (inc roof drainage) to be detailed in Construction Certificate documentation.

Table 7 Requirements for Size and Allowable Discharge from On-Site Detention Systems

Additional Hard (Impervious) Surface Area (square metres)	Minimum Capacity of On-Site Detention Tank (Litres)	Discharge Rate Litres/Sec
0 - 50	Nil	Nil
>50 - 75	4,500	2
>75 - 100	6,000	3
>100 - 150	9,000	4
>150 - 200	12,000	6
>200 - 250	15,000	7
>250 - 300	18,000	9
>300 - 400	24,000	12
>400 - 500	30,000	15
>500 - 600	36,000	18
>600 - 700	42,000	21
>700 - 800	48,000	24
>800 - 900	54,000	27
>900 - 1,000	60,000	30
>1,000*	A minimum storage capacity of 60 litres per m ² of additional hard/impervious surface area, and a discharge rate which replicates the discharge from the site were it to be undeveloped.	

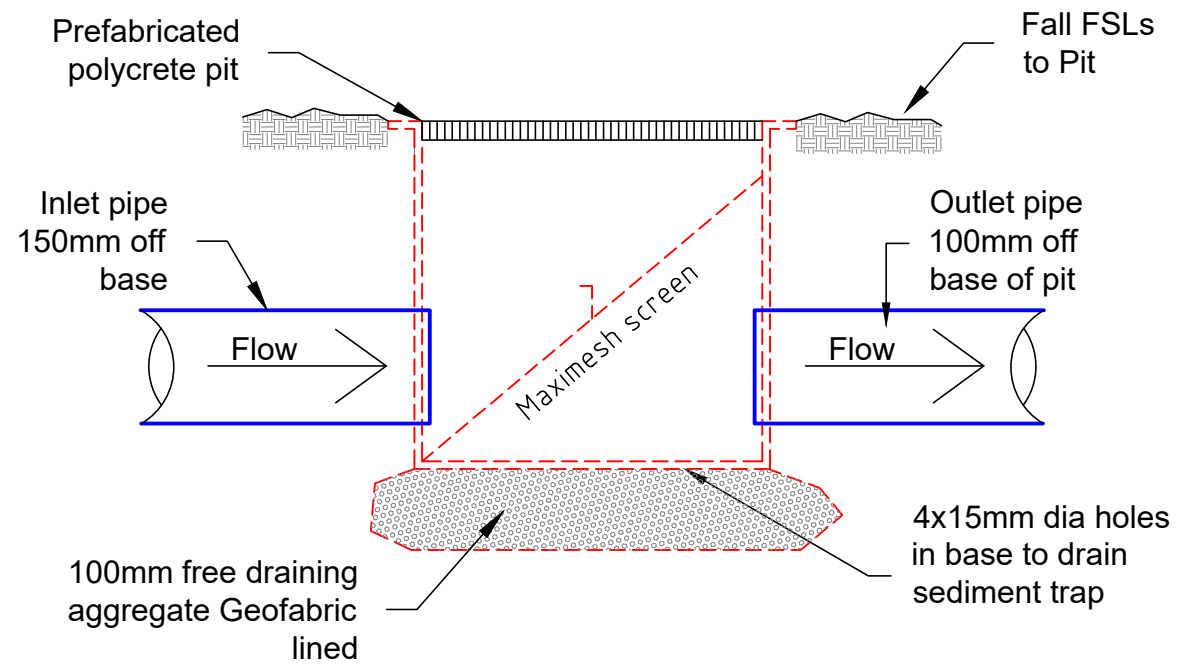
*Developments exceeding 1,000 square metres of additional hard (impervious) surface area must also provide with the Water Management Plan, an Integrated Water Management Strategy prepared by a suitably qualified and experienced Water Engineer. The plan must demonstrate that stormwater flows discharged from the site is to be no greater than what would have occurred predevelopment, and that Water Sensitive Urban Design principles have been practically maximised within the proposed development.



TYPICAL PIPE & TRENCH DETAIL

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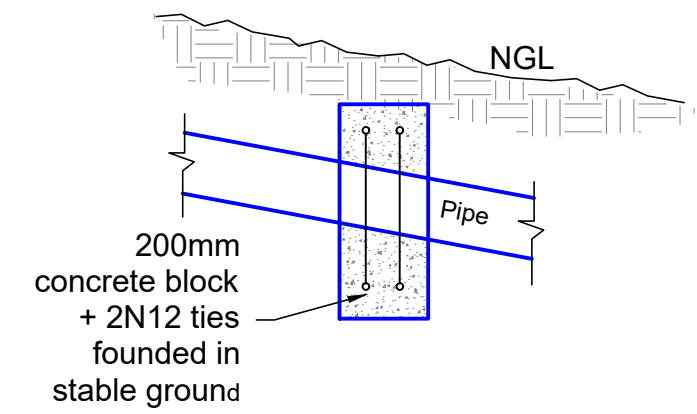
Note -
 Bedding / overlay to be -
 a) sand, free from rock, hard or sharp objects
 b) max 14mm crushed rock or gravel
 c) the excavated material free of rock, hard or sharp objects and broken up with no soil lumps > 75mm dia



TYPICAL STORMWATER FILTRATION DEVICE / POLLUTANT / SEDIMENT CONTROL PIT DETAIL

NTS

NOTE - 100mm Sediment trap and maximesh screen to collect organic matter and coarse sediments



ANCHOR BLOCK DETAIL

TO BE INSTALLED AT 6m CTS IF PIPE SLOPE > 1V TO 5H

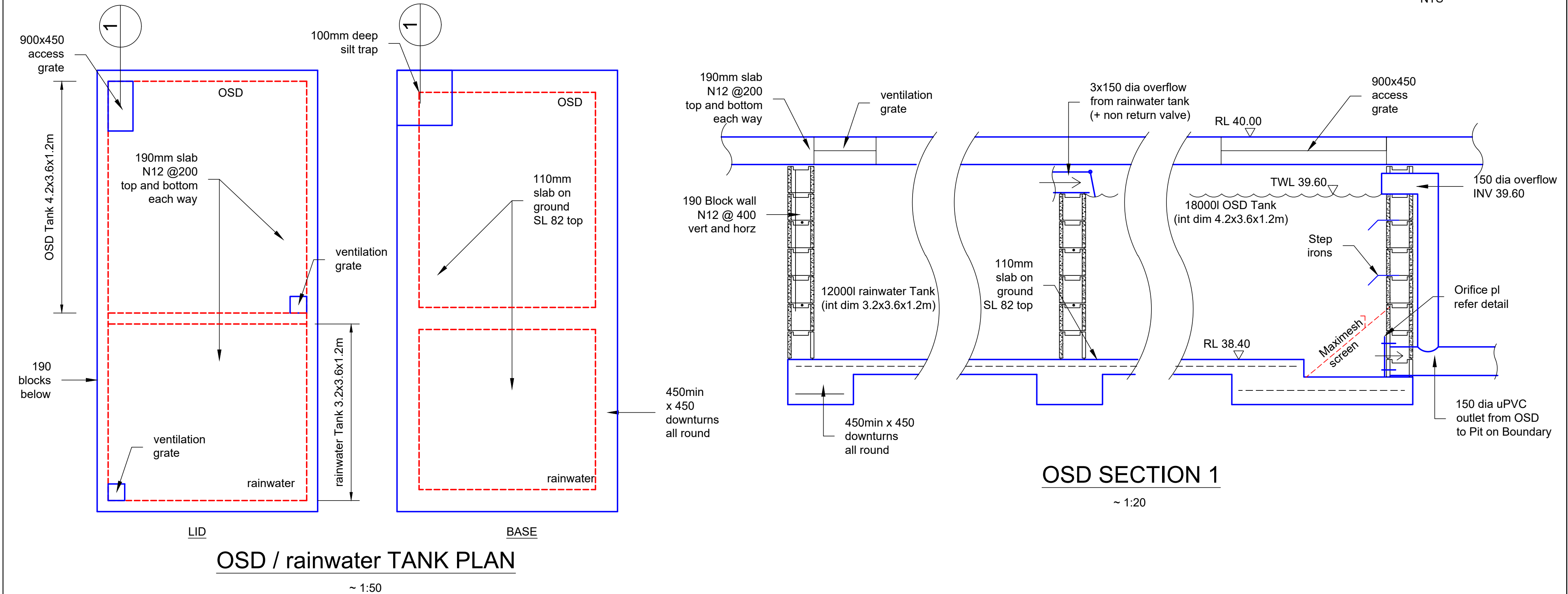
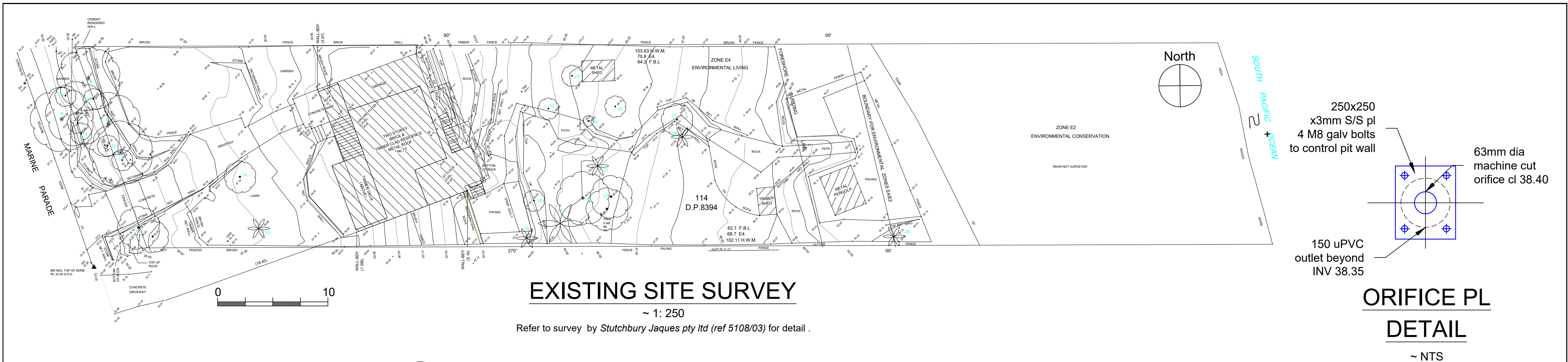
ISSUE:	Date	Description
	14. 12. 2021	Prelim issued for comment
	16. 12. 2021	Prelim issued for DA submission
	31. 03. 2022	DA-A Revised for DA submission, BASIX volume clarified
	27. 04. 2022	DA-B Revised for DA submission, OSD added

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PROJECT:
 PROPOSED
 NEW RESIDENCE
 73 MARINE PDE
 AVALON BEACH
 for ~ COURTNEY FAMILY

DRAWING :
 SITE STORMWATER
 MANAGEMENT PLAN

Job No : 211105
 Drawing No : SW1 DA-B
 Document Certification
 Barrenjoey Consulting Engineers Pty Ltd
 per Lucas Molloy MIEA CPEng NER Director



ISSUE: 27. 04. 2022 Prelim issued for DA submission			PROJECT: PROPOSED NEW RESIDENCE 73 MARINE PDE AVALON BEACH for ~ COURTNEY FAMILY			DRAWING : SITE STORMWATER MANAGEMENT DETAILING 1			Job No : 211105		Drawing No : SW2 _{DA}	
			Barrenjoey Consulting Engineers Pty Ltd Stormwater Structural Civil PO Box 672 Avalon NSW 2107 M: 0418 620 330 E: lucasbce@bigpond.com ABN: 13124694917 ACN: 124694917						Document Certification Barrenjoey Consulting Engineers Pty Ltd per Lucas Molloy MIEA CPEng NER Director			