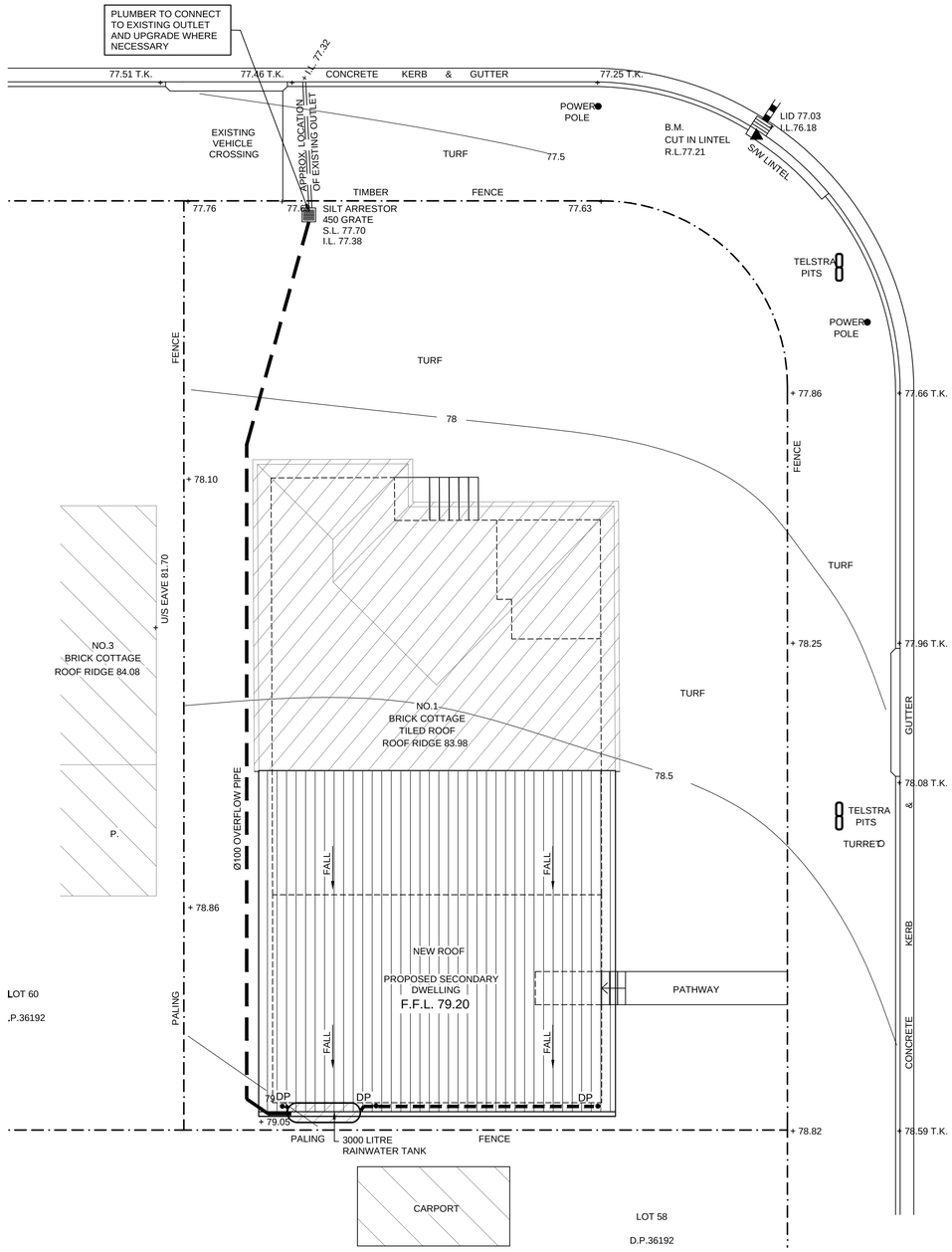
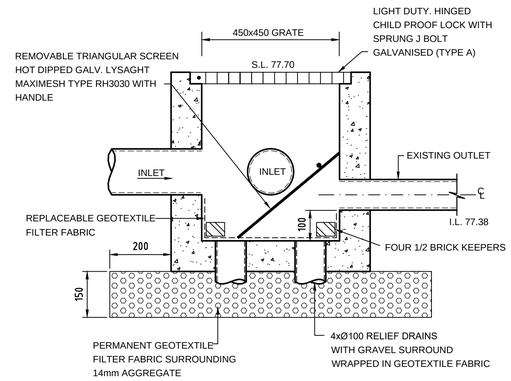


SITE AND ROOF DRAINAGE PLAN

SCALE 1:100

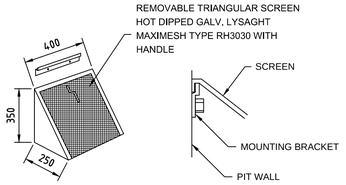
NOTE:
1. MINIMUM ROOF FALL 1% TO OUTLETS
2. PROVIDE SAFETY OVERFLOW TO ALL ROOFS
3. ALL DOWNPIPES CHARGED TO THE RAINWATER TANK ARE TO BE SEALED UP TO GUTTER LEVEL & BE PRESSURE TESTED AND CERTIFIED.
4. ALL DOWNPIPES TO BE CONSTRUCTED OF ONE MATERIAL FOR AESTHETICS REASONS AND PAINTED TO PROTECT THEM AGAINST ULTRA-VIOLET LIGHT DAMAGE.

OCEANA STREET



SILT ARRESTOR PIT-SECTION

SCALE 1:10



MULTI PURPOSE FILTER SCREEN

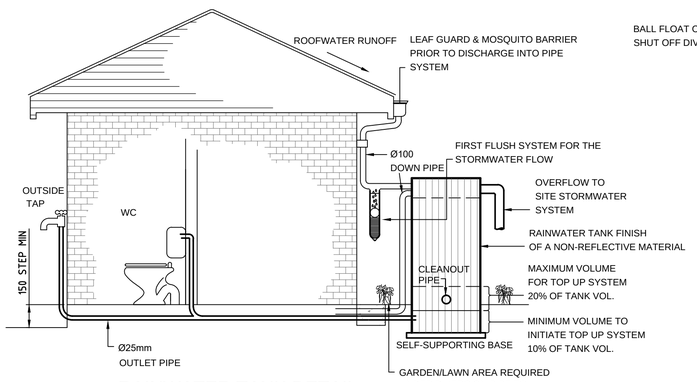
SCALE 1:20

PRODUCT CODE: MMMPS (MASCOT ENGINEERING)

RAINWATER TANK TO COMPLY WITH BASIX CERTIFICATE No. A311203_02

STORAGE TANK NOTES

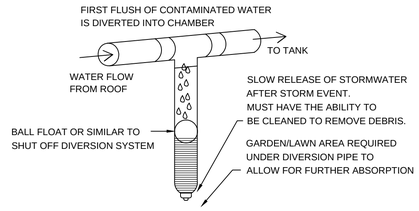
1. TANK WATER TAPS SHALL BE MARKED "RAINWATER NOT TO BE USED FOR HUMAN CONSUMPTION"
2. MINIMUM TANK SIZE 3000 LITRES
3. RAINWATER TANKS SHALL BE CONNECTED TO MAINS WATER SUPPLY AS BACKUP
4. THE PUMPS ARE TO BE INSULATED IN ACCORDANCE WITH COUNCIL POLICY
5. PUMPS SHALL PROVIDE MINIMUM 150 kPa PRESSURE
6. TANK TO BE CONNECTED TO AN OUTDOOR TAP FOR IRRIGATION USE
   TANK TO BE CONNECTED TO ALL TOILETS FOR TOILET FLUSHING
7. RAINWATER TANKS TO BE CLEANED OUT EVERY 6 MONTHS
8. WATER TANK AND ASSOCIATED STRUCTURE TO BE THE SAME COLOUR, OR A COLOUR COMPLEMENTARY TO THE DWELLING
9. TOP OF TANK TO BE BELOW TOP OF NEAREST FENCE, OR 1.8 METRES, WHICHEVER IS LESSER.
10. THE WATER TANK SHOULD BE LOCATED AT LEAST 900mm FROM ANY PROPERTY BOUNDARY
11. PLUMBING FROM THE WATER TANK IS TO BE KEPT SEPARATE FROM THE RETICULATED WATER SUPPLY SYSTEM
12. TANK TO BUILT ON SELF-SUPPORTING BASE
13. PROVIDE BACK-FLOW PREVENTION DEVICE AT MAINS WATER METER
14. ROOF DRAINING TO TANK MUST NOT CONTAIN LEAD, TAR BASED PAINTS OR ASBESTOS
15. WATER TO BE DRAWN FROM ANAEROBIC ZONE OF TANK



RAINWATER TANK DETAIL

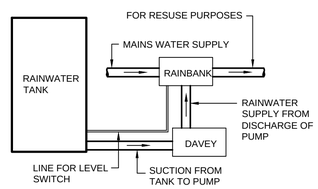
N.T.S.

INSTALLATION OF TANKS TO BE IN ACCORDANCE WITH MANUFACTURER SPECIFICATION.



FIRST FLUSH WATER DIVERTER DETAIL

NTS



PLAN

N.T.S.

EROSION CONTROL NOTES
1. ALL EROSION AND SILTATION CONTROL DEVICES ARE TO BE PLACED PRIOR TO THE COMMENCEMENT OF ANY CONSTRUCTION WORKS, AND ALL SILT TRAPS ARE TO HAVE DEPOSITED SILT REMOVED REGULARLY DURING CONSTRUCTION.
2. ALL TREES ARE TO BE PRESERVED UNLESS INDICATED OTHERWISE ON THE ARCHITECT'S OR LANDSCAPE ARCHITECT'S DRAWINGS. EXISTING GRASS COVER SHALL BE MAINTAINED EXCEPT IN AREAS CLEARED FOR BUILDINGS, PAVEMENTS ETC.
3. INSTALL TEMPORARY SEDIMENT BARRIERS TO ALL INLET PITS LIKELY TO COLLECT SILT LADDEN WATER, TO COUNCIL'S STANDARDS
4. NOT WITHSTANDING DETAILS SHOWN IT IS THE CONTRACTORS SOLE RESPONSIBILITY TO ENSURE THAT ALL SITE ACTIVITIES COMPLY WITH THE REQUIREMENTS OF THE CLEAN WATERS ACT.
5. ALL TOPSOIL TO BE CONSERVED FOR RE-USE ON SITE

NOTES
1. ALL LINES ARE TO BE Ø100 U.P.V.C @ MIN 1.0% GRADE UNLESS NOTED OTHERWISE. CHARGED LINES TO BE SEWER GRADE & SEALED.
2. IT IS THE CONTRACTORS RESPONSIBILITY TO LOCATE & LEVEL ALL EXISTING SERVICES PRIOR TO THE COMMENCEMENT OF ANY EARTHWORKS.
3. ALL PIPES TO HAVE MIN 150mm COVER IF LOCATED WITHIN PROPERTY.
4. ALL PITS IN DRIVEWAYS TO BE 450x450 CONCRETE AND ALL PITS IN LANDSCAPED AREAS TO BE 450x450 PLASTIC.
5. PITS LESS THAN 600 DEEP MAY BE BRICK, PRECAST OR CONCRETE.
6. PITS DEEPER THAN 900 MUST BE 900x900 AND HAVE STEP RUNGS AT 300 CENTRES.
7. ALL BALCONIES AND ROOFS TO BE DRAINED AND TO HAVE SAFETY OVERFLOWS IN ACCORDANCE WITH RELEVANT AUSTRALIAN STANDARDS.
8. ALL EXTERNAL SLABS TO BE WATERPROOFED.
9. ALL GRATES TO HAVE CHILD PROOF LOCKS.
10. ALL DRAINAGE WORKS TO AVOID TREE ROOTS.
11. ALL DP'S TO HAVE LEAF GUARDS
12. ALL EXISTING LEVELS TO BE CONFIRMED BY BUILDER PRIOR TO CONSTRUCTION.
13. ALL WORK WITHIN COUNCIL RESERVE TO BE INSPECTED BY COUNCIL PRIOR TO CONSTRUCTION.
14. COUNCIL'S ISSUED FOOTWAY DESIGN LEVELS TO BE INCORPORATED INTO THE FINISHED LEVELS ONCE ISSUED BY COUNCIL.
15. ALL WORK SHALL BE IN ACCORDANCE WITH B.C.A. AND A.S.3500.3.
16. EXISTING STORMWATER PIPE LOCATIONS HAVE BEEN ASSUMED. PLUMBER TO INSPECT PRIOR TO WORKS AND UPGRADE PIPES AS NECESSARY.

SYMBOLS

F.F.L.	FINISHED FLOOR LEVEL
F.G.L.	FINISHED GARAGE LEVEL
T.K.	TOP OF KERB
* 11.0	FINISHED LEVEL
+ 11.0	EXISTING LEVEL
S.L.	SURFACE LEVEL
I.L.	INVERT LEVEL
20 R	ROOF CATCHMENT AREA (m2)
20 I	IMPERVIOUS CATCHMENT AREA (m2)
20 L	LANDSCAPED CATCHMENT AREA (m2)
DP	Ø100 DOWN PIPE OR EQUIVALENT
SP	SPREADER
VD	VERTICAL DROP
VR	VERTICAL RISER
	RAIN WATER HEAD & DOWN PIPE
	CLEAN OUT POINT
SUMP	Ø150 SUMP
	CONCRETE COVER JUNCTION PIT
	GRATED INLET PIT 450x450
	200Wx100D GRATED DRAIN WITH 2% BTM SLOPE
	STORMWATER PIPE
	SUSPENDED STORMWATER PIPE
	CHARGED STORMWATER PIPE
	PUMP LINE
	Ø100 SUBSOIL PIPE
	SILT FENCE
	OVERLAND FLOW

DIAL 1100 BEFORE YOU DIG

NO SUBSURFACE INVESTIGATION HAS BEEN MADE IT IS YOUR RESPONSIBILITY TO OBTAIN SERVICE DIAGRAMS FROM RELEVANT AUTHORITIES

ZAIT Engineering Solutions Pty Ltd
Suite 5, 5-7 Villiers Street,
Parramatta, NSW 2150
Phone: (02) 9630 3087
Email: david@zait.com.au
ABN 40 608 862 899
ACN 608 862 899

DATE ISSUED:		REVISION:
14-05-18	A	ISSUE FOR DA
28-05-19	B	ISSUE FOR SECTION 4.55

PROJECT:
ALTERATIONS & ADDITIONS
1 REID AVENUE, NARRAWEENA
NORTHERN BEACHES COUNCIL

CLIENT:
MASTER GRANNY FLATS

ACHITECT:
MASTER GRANNY FLATS

DRAWING TITLE:
SITE AND ROOF DRAINAGE PLAN FOR SECTION 4.55

DESIGNED:	DRAWN:	CHECKED:	DATE:	SCALE:
D.Z.	V.S.	D.Z.	MAY-18	1:100

ISSUE:	B
DRAWING NUMBER:	D01
JOB NUMBER:	18DZ1666

APPROVED:
DAVID ZAITER
BEng (Hons), MIEAust CPEng NER RPEQ

NORTH: