NOTES

GENERAL

G1. DESIGN HEREIN HAS BEEN PREPARED
BY WARREN SMITH AND PARTNERS PTY LTD
CONSULTING CIVIL ENGINEERS,
LEVEL 1, 123 CLARENCE ST, SYDNEY NSW 2000.
TEL:- (02) 9299 1312, FAX:- (02) 9290 1295.

G2. THE DRAWINGS HEREIN SHALL BE READ AS
REQUIRED IN CONJUNCTION WITH ARCHITECTURAL DRAWINGS
BY
FJMT ARCHITECTS
TEL:- (02) 9251 7077 FAX:- (02) 9251 7072

G3. ALL DIMENSIONS IN MILLIMETRES UNO.
REDUCED LEVELS AND CHAINAGES ARE IN METRES.
DO NOT SCALE DRAWINGS. USE FIGURED DIMENSIONS.

G4. THE PROPOSED WORKS DETAILED HEREIN
SHALL BE CONSTRUCTED TO THE REQUIREMENTS
OF COUNCIL GENERALLY AS DETAILED HEREUNDER.

G5. ALL EXISTING SERVICES SHALL BE VERIFIED FOR
DEPTH AND HORIZONTAL POSITION BY PHYSICAL MEANS
PRIOR TO EXCAVATION. ANY DISCREPANCIES SHALL
BE BROUGHT FORTHWITH TO THE PROJECT MANAGER'S
ATTENTION.

STORMWATER & SUB-SOIL DRAINAGE

MATERIALS:

STW1. PIPES AND FITTINGS FOR STORMWATER
DRAINAGE SHALL BE AS FOLLOWS UNO ON THE
DRAWINGS:

A. POLYVINYL CHLORIDE (PVC) WITH SOLVENT
WELDED JOINTS FOR BELOW GROUND DRAINAGE
UP TO 225mm.

B. FIBRE REINFORCED CEMENT WITH RUBBER RINGS
FOR PIPE DIA'S GREATER THAN 225mm. UNO.

C. REINFORCED CONCRETE WHERE REQUIRED BY
AS 3500 FOR EXCESSIVE DEPTH.

D. INSTALL IN ACCORDANCE WITH AUSTRALIAN
STANDARD AS3500 EXCEPT WHERE
VARIED BY THE CONTRACT DOCUMENTS.

STW2. PIPES & FITTINGS FOR SUBSOIL DRAINAGE SHALL BE
SLOTTED POLYVINYL CHLORIDE (PVC) WITH SOLVENT
WELDED JOINTS, MIN. 150mm DIAMETER.

STW3. IN GROUND DRAINAGE PIPEWORK SERVING DP's
SHALL BE MINIMUM 150mm DIA. UNO.

STW4. GRATED DRAINS SHALL BE 150mm NOM.
A. 150mm NOM. WIDTH IN NON TRAFFICABLE AREAS.
B. 225mm NOM. WIDTH IN TRAFFICABLE AREAS.

STW5. STORMWATER PITS ARE AS SHOWN & SPECIFIED ON
THE PLANS . PRECAST TYPE ACCEPTABLE WITH STEP IRONS
FOR DEPTH GREATER THAN 1000.
BENCH ALL PITS MIN. 50mm & FORM SMOOTH TRANSITION
FROM INLET TO OUTLET

STW6. SELECT FILL SHALL BE MATERIAL OBTAINED FROM
EXCAVATION OF THE PIPE TRENCH OR IMPORTED WITH
A PARTICLE SIZE FOR ROCK NOT GREATER THAN 75mm
OR FOR OTHER THAN ROCK NOT GREATER THAN
150mm.

STW7. IMPORTED FILL SHALL BE EITHER, AND GENERALLY
CONSIST OF SINGLE SIZED AGGREGATE WITH PARTICLE
SIZE NOT GREATER THAN 5mm WRAPPED ALL ROUND
WITH GEOTEXTILE FILTER FABRIC OR APPROVED HIGH
COMPACTION SAND OR APPROVED CRUSHED ROAD
GRAVEL CONFORMING TO RTA FORM 3051 OR SIMILAR.

STW8. STORMWATER PITS AND GRATES TO CONFORM WITH
STANDARD COUNCIL REQUIREMENTS, WHERE ON PUBLIC LAND.
GRATES TO BE SUPPLIED IN CLASS SHOWN ON THE DRAWINGS.

INSTALLATION REQUIREMENTS:

STW9. PIPES SHALL BE TRUE TO GRADES SHOWN AND
ALIGNED SO THAT THE CENTRES OF THE INLET PIPES
INTERSECT WITH THE CENTRE OF THE OUTLET PIPE AT
THE DOWNSTREAM FACE OF THE PIT.

STW10. MINIMUM GRADES FOR GRAVITY STORMWATER DRAINAGE
SHALL CONFORM TO AS3500 PART3 AS FOLLOWS, UNO:
1% FOR 100 AND 150 mm DIA.
0.5% FOR 225 mm DIA
0.4% FOR 300 mm DIA
0.35% FOR 375 mm DIA

STW11. MINIMUM DEPTH OF COVER SHALL BE :-
- 300mm IN PRIVATE PROPERTY (NON VEHICULAR TRAFFIC).
- 450mm IN PUBLIC AREAS.
- 600mm IN VEHICULAR TRAFFICABLE AREAS (FOOTWAY/ROADWAY).

STW12. BED ALL PIPES FIRMLY AND EVENLY ONTO IMPORTED
BEDDING FILL MATERIAL.

STW13. LAY AND JOINT ALL PIPES IN ACCORDANCE WITH THE
MANUFACTURERS RECOMMENDATIONS AND
AS 3725-2007 LOADS ON BURIED CONCRETE PIPES
AS 2566-1998 BURIED FLEXIBLE PIPELINES
AS 1597.2-1996 PRECAST REINFORCED CONCRETE BOX CULVERTS.
AS 3500-2003 NATIONAL PLUMBING & DRAINAGE CODE.
PART 2, SANITARY PLUMBING AND SANITARY DRAINAGE.
SYDNEY WATER REQUIREMENTS.

STW14. ALLOW TO TEST ALL PIPES AND PITS TO
MANUFACTURERS REQUIREMENTS.

CONCRETE WORKS

C1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE
WITH AS3600, THE SAA STANDARDS CITED IN AS3600,
THE DRAWINGS AND THE SPECIFICATION.

C2. ALL CONCRETE SHALL BE 80mm NOMINAL SLUMP, 20mm MAXIMUM
AGGREGATE WITH NO ADMIXTURES OR FLY ASH,
UNLESS OTHERWISE APPROVED.

ALL CONCRETE WORK IN CONTACT WITH SEWER TO HAVE
TYPE SL PORTLAND CEMENT, OTHERWISE TYPE A CEMENT

FOR BRIDGE WORKS, A MAXIMUM 56 DAYS SHRINKAGE OF
600 MICROSTRAIN, A MINIMUM CEMENT CONTENT 350kg/m3 AND
MAXIMUM WATER:CEMENT RATIO OF 0.40

C3. STRENGTH GRADE OF CONCRETE SHALL BE :
25 MPa (KERBS, EDGE STRIPS & CONCRETE ENCASEMENT)
AND 32 MPa ELSEWHERE.

C4. CONSTRUCTION JOINTS SHALL BE PROPERLY FORMED AND USED
ONLY WHERE SHOWN OR APPROVED.
GENERALLY FOR HAND PLACED KERB & GUTTER 6mm THICK APPROVED
BITUMINOUS MASTIC JOINTING MATERIAL SHALL BE PROVIDED AT
INTERVALS NOT EXCEEDING 6m. FOR MACHINE PLACED KERB & GUTTER
6mm THICK APPROVED BITUMINOUS MASTIC JOINTING MATERIAL
SHALL BE PROVIDED AT INTERVALS NOT EXCEEDING 12m & GUILLOTINED
DUMMY GROOVED JOINTS, 25mm IN DEPTH, SHALL BE FORMED EVERY
3m OF GUTTER. JOINTS ARE ALSO REQUIRED AT EACH END OF GUTTER
CROSSING AND GULLY PITS. JOINTS SHALL BE SET VERTICAL AND
SQUARE TO THE KERB.

C5. REINFORCEMENT IS REPRESENTED DIAGRAMMATICALLY AND IS NOT
NECESSARILY SHOWN IN TRUE PROJECTION.

C6. WELDING OR SPLICES IN REINFORCEMENT SHALL BE USED ONLY IN
POSITIONS APPROVED BY THE ENGINEER.

C7. CONCRETE CURING SHALL BE IN ACCORDANCE WITH AS3600. CURING
SHALL BE COMMENCED WITHIN TWO HOURS OF FINISHING OPERATIONS
AND SHALL BE CONTINUED FOR A MINIMUM OF SEVEN DAYS BY AN
APPROVED PROPRIETARY COMPOUND OR BY KEEPING CONTINUOUSLY
WET.

C8. FORMWORK SHALL BE DESIGNED AND CONSTRUCTED IN ACCORDANCE
WITH AS3610. FORMWORK SHALL NOT BE STRIPPED NOR PROPS
REMOVED WITHOUT APPROVAL.

C9. FABRIC LAP DETAILS SHALL BE IN ACCORDANCE WITH FIG.13.2.4 OF
AS3600.

C10. HOOKS, LAPS AND BENDS SHALL BE IN ACCORDANCE WITH
AS3600 UNO.

C11. ALL CHEMICAL ANCHORS SHALL BE EITHER 'CHEMSET' BY
"RAMSET" WITH THE GLASS CAPSULE SYSTEM INSTALLED IN
STRICT ACCORDANCE WITH MANUFACTURERS INSTRUCTIONS
OR
HILTI HVU ADHESIVE ANCHOR WITH FOIL CAPSULE SYSTEM
INSTALLED IN STRICT ACCORDANCE WITH MANUFACTURERS
INSTRUCTION. ALL CHEMICAL ANCHORS SHALL BE HOT DIPPED
GALVANIZED AND BE MIN M16 DIA. U.N.O.

GENERAL EARTHWORKS, SITEWORKS & FILLING:

FILLING:

SGE1. THE RECOMMENDATIONS CONTAINED IN THE GEOTECH REPORT SHALL
OVERIDE THE CLAUSES PRESENTED HEREIN

SGE2. STRIP ALL TOPSOIL AND UNDERLYING FILL AND STOCKPILE TOPSOIL
FOR LATER REUSE FOR LANDSCAPING PURPOSES.

SGE3. NEW FILL REQUIRED TO REINSTATE CUT LEVELS TO PROPOSED
BENCHING LEVELS SHALL BE SOURCED FROM OTHER PARTS OF THE
EXCAVATION AS SELECT FILL OR IMPORTED FILL AS SPECIFIED
BELOW IN SGE 4 AND SGE 5.

SGE4. SELECT FILL SHALL CONSIST OF LOCALLY DERIVED OR CUT
NATURAL CLAYS.

SGE5. IMPORTED FILL SHALL CONSIST OF RIPPED SANDSTONE OR SHALE
OR SIMILAR MATERIAL WITH MAXIMUM PARTICLE SIZE NOT GREATER
THAN 120mm AND A MOISTURE CONTENT WITHIN 2-3% OF
STANDARD OPTIMUM.

SGE6. ALL FILL (COHESIVE SOIL) SHALL BE PLACED IN LAYERS OF 200mm
MAXIMUM THICKNESS, COMPACTED BY MACHINE ROLLING TO ACHIEVE
A DRY DENSITY RATIO OF NOT LESS THAN 98% STANDARD
MAXIMUM AT A CORRESPONDING MOISTURE CONTENT WITHIN 2-3%
OF STANDARD OPTIMUM.

SGE7. IN AREAS WHERE HIGH IMPACT ROLLING IS USED TEST EACH FINAL
LAYER OF NOT GREATER THAN 300mm TO 400mm TO ACHIEVE A
DRY DENSITY RATIO OF NOT LESS THAN 98% STANDARD MAXIMUM
AT A CORRESPONDING MOISTURE CONTENT WITHIN 2-3% OF
STANDARD OPTIMUM.

EXCAVATION BATTERS:

SGE8. ALL TEMPORARY BATTERS CUT IN CLAY SUBSTRATE
SHALL BE 1 HORIZ : 1 VERT.
ALL LONG TERM EXPOSED BATTERS CUT IN CLAY SUBSTRATE
SHALL BE 2 HORIZ : 1 VERT.
ALL DETENTION BASIN BATTERS IN CLAY SUBSTRATE
SHALL BE 3 HORIZ : 1 VERT.
ALL DETENTION BASIN BATTERS IN ROCK SUBSTRATE
SHALL BE NEAR VERTICAL.

SGE9. GEOTECHNICAL TESTING IS TO BE UNDERTAKEN TO
AT LEAST LEVEL 1 CONTROL OF FILL COMPACTION
STANDARD, AS DEFINED IN AS. 3738 AS FOLLOWS

- FOR GENERAL FILL OR CUT AREAS OVER THE AREA
PROVIDE ONE (1) TEST PER 200mm LAYER, OVER AN
AREA NOT GREATER THAN 500 m².

- FOR GENERAL FILL AREAS IN CONCENTRATED AREAS ADJACENT
TO AND BEHIND THE STRUCTURE AND ADJACENT TO AND
BEHIND RETAINING WALLS PROVIDE ONE (1) TEST PER 200mm
LAYER, OVER AN AREA NOT GREATER THAN 50m².

SGE10. SUBMIT ALL GEOTECHNICAL TEST RESULTS TO
WARREN SMITH & PARTNERS FOR REVIEW PRIOR TO
CONTINUATION WITH SUBSEQUENT SECTION OF WORK.

EARTH WORKS FOR SERVICES

E1. EXCAVATE TRENCHES AND STOCKPILE ALL MATERIAL FOR
INSPECTION WITH REGARD TO RE-USE FOR TRENCH BACKFILL.
REMAINING MATERIAL TO BE REMOVED FROM SITE.

E2. BEDDING MATERIAL SHALL CONSIST OF IMPORTED FILL
ONLY. THICKNESS OF BEDDING LAYER SHALL BE 75mm
IN O.T.R. AND 200mm IN ROCK.

E3. EMBED ALL PIPES WITH IMPORTED FILL. PROVIDE
200mm SIDE SUPPORT AND 150mm OVERLAY ABOVE
PIPE CROWN.

E4. TRENCH FILL ABOVE THE EMBEDMENT ZONE TO THE
UNDERSIDE OF THE ROAD PAVEMENT OR FOOTWAY FILL
MATERIAL SHALL BE AS FOLLOWS :
UNDER ROADWAY
TRENCH FILL MATERIAL SHALL CONSIST OF IMPORTED FILL
AS SPECIFIED HEREIN OF EITHER HIGH GRADE COMPACTION SAND
OR APPROVED CRUSHED ROAD GRAVEL CONFORMING TO
RTA FORM 3051 OR SIMILAR.
OTHER THAN ROADWAY
TRENCH FILL MATERIAL EXCAVATED SHALL CONSIST OF
SELECT FILL AS SPECIFIED HEREIN AND SHALL NOT CONTAIN
MORE THAN 20% OF STONES OF SIZE BETWEEN 75mm & 150mm
AND NONE LARGER THAN 150mm.
PRIOR TO THE USE OF THE EXCAVATED MATERIAL IT SHALL
BE INSPECTED AND APPROVED BY THE CONSULTANT.

E5. COMPACT BEDDING, EMBEDMENT AND TRENCH FILL
MATERIALS AS FOLLOWS:

EMBEDMENT:-
FOR GRANULAR FILL MATERIAL (NON-COHESIVE SOILS)
EG. COARSE AGGREGATE FILL, HIGH GRADE
COMPACTION SAND, THE DENSITY INDEX (ID) SHALL BE
NOT LESS THAN 70%.

TRENCH FILL:-
FOR GRANULAR MATERIAL (NON-COHESIVE SOILS), THE
DENSITY INDEX (ID) SHALL BE NOT LESS THAN 70%.

FOR NON-GRANULAR FILL MATERIAL (COHESIVE SOILS),
THE DRY DENSITY RATIO (RD) SHALL BE NOT LESS
THAN 95%.

E6. MEASURE OF COMPACTION:-
THE DEGREE OF COMPACTION SHALL BE MEASURED
BY ONE OF THE FOLLOWING PARAMETERS :-

GRANULAR FILL (NON-COHESIVE SOILS). THE DENSITY
INDEX (ID) DETERMINED IN ACCORDANCE WITH AS
1289.E6.1 BASED ON THE MAXIMUM AND MINIMUM DRY
DENSITIES IN ACCORDANCE WITH AS 1289.E5.1 AND
THE FIELD DRY DENSITY IN ACCORDANCE WITH AS
1289.5.3.2, AS 1289.E3.5 OR AS 1289.E8.1.

NON-GRANULAR FILL (COHESIVE SOILS). THE DRY
DENSITY RATION (RD) DETERMINED IN ACCORDANCE
WITH AS 1289.5.4.1 BASED ON THE FIELD DRY DENSITY
IN ACCORDANCE WITH AS 1289.5.3.2 AND THE MAXIMUM
DRY DENSITY IN ACCORDANCE WITH AS 1289.5.1.1

E7. GEOTECHNICAL TESTING IS TO BE UNDERTAKEN TO
AT LEAST LEVEL 1 CONTROL OF FILL COMPACTION
STANDARD, AS DEFINED IN AS. 3738 AS FOLLOWS

- TEST EACH 300mm LAYER ABOVE PIPE CROWN.

- TEST BASE & SUB-BASE LAYERS WHERE APPLICABLE.

- TESTS SHALL BE REQUIRED AT EACH 50m CENTRES WHERE
THE LENGTH OF TRENCH IS WITHIN THE 50m REQUIREMENT.

E8. SUBMIT ALL GEOTECHNICAL TEST RESULTS TO
WARREN SMITH & PARTNERS FOR REVIEW PRIOR TO
CONTINUATION WITH SUBSEQUENT SECTION OF WORK.

RESTORATION:

RES1. RESTORE ALL TRAFFIC AREAS TO PRE EXISTING
CONDITION.

RES2. FOR ALL SURFACES OTHER THAN IN TRAFFIC AREAS
RESTORE DISTURBED SURFACES TO PRE-EXISTING
CONDITIONS AND COMPACT AS SPECIFIED.

RES3. RESTORE ALL AUTHORITY OWNED AREAS
TO COUNCIL STANDARDS

ROAD WORKS, DRIVEWAYS & CARPARKS

R1. ALLOW FOR LEVEL 2 TESTING AND SUB-GRADE CONDITIONS
& PAVEMENT THICKNESS TO BE VERIFIED BY
GEOTECHNICAL CONSULTANT AFTER INSPECTION
OF PRELIMINARY BOXING.

R2. ALLOW FOR ANY SUB-GRADE REPLACEMENT WORK TO BE
DETERMINED AS REQUIRED BY GEOTECHNICAL CONSULTANT
AT THE TIME OF PAVEMENT CONSTRUCTION.

R3. MINIMUM DRY DENSITY RATIOS (AS 1289 3.4.1-1993) TO BE:

BASECOURSE	98% MODIFIED
SUB-BASE	95% MODIFIED
SUB-GRADE	100% STANDARD
SUB-GRADE REPLACEMENT	100% STANDARD

R4. PAVEMENT MATERIALS TO COMPLY WITH RTA SPECIFICATION
No. 3051 OR SIMILAR AS APPROVED BY
GEOTECHNICAL CONSULTANT.

R5. PROVIDE (1) TEST FOR EACH LAYER NOT EXCEEDING
250mm THICK BEING BASECOURSE, SUB-BASE &
SUB-GRADE OVER AN AREA NOT GREATER THAN
500m².

R6. SUBMIT ALL GEOTECHNICAL TEST RESULTS TO
WARREN SMITH & PARTNERS FOR REVIEW PRIOR TO
CONTINUATION WITH SUBSEQUENT SECTION OF WORK.

APPROVALS

A1. THE AS CONSTRUCTED WORKS SHALL BE INSPECTED
BY DESIGN CONSULTANT. MINIMUM 48 HOURS
NOTICE SHALL APPLY TO ALL INSPECTIONS.

A2. THE DESIGN PLANS HEREIN ARE SUBJECT TO
COUNCIL APPROVAL PRIOR TO CONSTRUCTION. OBTAIN
EXPRESS (WRITTEN) ADVICE TO PROCEED FROM
PROJECT MANAGER PRIOR TO COMMENCEMENT.

A3. SUBMIT WORK-AS-EXECUTED DRAWINGS IN CIVILCAD OR DXF
DIGITAL FORMAT AND HARD COPY FORMAT. VERIFY ALL
CONSTRUCTION WORKS SHOWN HEREON.

A4. CERTIFY THAT THE AS CONSTRUCTED SYSTEM HAS BEEN
BUILT IN ACCORDANCE WITH THE APPROVED PLANS
ISSUED FOR CONSTRUCTION.

SERVICES UNDER ROAD SURFACES

S1. ALL OTHER SERVICES INCLUDING BUT NOT LIMITED TO WATER,
HYDRANT, GAS, SEWER, ELECTRICAL AND COMMUNICATIONS
CONDUITS OR CABLES SHALL BE LAID WITH MINIMUM 600mm U.N.O.
COVER BELOW PROPOSED ROAD SURFACE OR APPROVED OTHER
MEANS TO PROTECT DURING CONSTRUCTION.

ROAD SIGNS & LINE MARKING

RS1. ALL SIGNS AND LINEMARKING SHALL BE TO ROADS & TRAFFIC AUTHORITY
STANDARDS AND SPECIFICATIONS AND AS.1742, MANUAL OF UNIFORM
TRAFFIC CONTROL DEVICES

RS2. ALL LINEMARKING SHALL BE AUGMENTED BY RETROREFLECTIVE RAISED
PAVEMENT MARKERS (RRPMs) AND ALL SHALL BE TO AS 1742.2 - 1994
AND AS 1742.2 /AMDT 1/1997-10-05

RS3. ALL ROAD SIGNS AND POSTS SHALL BE TO AS 1742.2 - 1994
AND AS 1742.2 /AMDT 1/1997-10-05

HYDRAULIC SERVICES

H1. ALL WORKS CARRIED OUT SHALL COMPLY WITH AS-3500, SYDNEY
WATER & COUNCIL REQUIREMENTS. OBTAIN NECESSARY AUTHORITIES
APPROVALS PRIOR TO COMMENCING WORKS.

H2. PRIOR TO COMMENCING WORKS SURVEY & INSPECT SITE & CONFIRM
LOCATION & LEVELS OF ALL HYDRAULIC SERVICES PIPEWORK.
NO CLAIMS FOR ADDITIONAL COSTS RESULTING FROM THE LACK OF
KNOWLEDGE OF SITE CONDITIONS RELATING TO WORKS TO BE DONE
OR LOCATIONS AND LEVELS OF EXISTING AND NEW SERVICES WILL
BE ACCEPTED.

H3. PRIOR TO CAPPING OFF & REMOVAL OF REDUNDANT SERVICES
CONFIRM ON SITE THAT SERVICE IS NOT SUPPLYING EXISTING
BUILDINGS OR AMENITIES.

H4. COLD WATER PIPEWORK SHALL CONSIST OF COPPER TUBE &
FITTINGS IN ACCORDANCE WITH AS 1432 TYPE B. PIPES AND
FITTINGS SHALL BE JOINTED WITH 15% SILVER SOLDER.

H5. ALL NEW UNDERGROUND METAL PIPEWORK SHALL BE INSTALLED
WITH POLYETHYLENE SLEEVING OBTAINED FROM "TYCO WATER
AUST" AND INSTALLED TO MANUFACTURE'S REQUIREMENTS.

H6. LANDSCAPE IRRIGATION WATERING PIPEWORK SHALL CONSIST OF
MEDIUM DENSITY POLYETHYLENE PIPE CLASS PN16 WITH ELECTRO
FUSION JOINTS OR EQUAL TO EXISTING PIPEWORK.

PROTECTION OF TREES

T1. WHERE STORMWATER DRAINAGE IS LAID IN THE VICINITY OF
TREES / CANOPIES OF TREES, PARTICULARLY IN THE NORTH EAST
CORNER OF THE SITE, ALLOW THE CONSULTANT ARBORIST TO
INSPECT PROGRESSIVELY THE EXCAVATION AND CONSTRUCTION
WORKS.

PROTECTION OF FLORA - REFER SPECIFICATION

1. ANY TRENCHES WITHIN 3m OF TREES SHALL BE
HAND DUG TO AVOID DAMAGE TO TREE ROOTS.

2. THE SEWERAGE WORKS HAVE BEEN LOCATED TO MINIMISE CLEARING
AND DAMAGE TO THE EXISTING FLORA ENVIRONMENT. NO TREES ARE
PERMITTED TO BE REMOVED OR DAMAGED UNO. CONSTRUCTION OF THE
SEWER GRAVITY OR RISING MAIN IN THE VICINITY OF EXISTING TREES
SHALL BE HAND EXCAVATED ONLY, ENSURING IRREVERSIBLE
DAMAGE OF THE ROOT SYSTEM DOES NOT OCCUR.

3. IF IT IS CONSIDERED NECESSARY TO PERFORM ANY WORK ON TREES,
INCLUDING TRIMMING, LOPPING, ROOT CUTTING, REPAIR AND REMOVAL,
APPLICATION IN WRITING SHALL BE MADE BY THE CONTRACTOR TO THE
SUPERINTENDENT.
ANY WORK PERMITTED TO BE DONE ON TREES TO BE RETAINED SHALL
BE PERFORMED BY AN APPROVED TREE SURGEON.

4. NO MATURE TREES OR SHRUBS ARE TO BE REMOVED FOR THE PURPOSES OF
THE WORKS WITHOUT PRIOR APPROVAL OF THE BLACKTOWN CITY COUNCIL.

COUNCIL STANDARDS

LGA 1. THE DRAWINGS HEREIN SHALL BE READ IN CONJUNCTION
WITH COUNCIL'S STANDARDS & SPECIFICATIONS WHICH
SHALL OVERRIDE SPECIAL DETAILS SHOWN ON THE
DRAWINGS.

TRAFFIC NOTE:

1. A TRAFFIC CONTROL PLAN IS TO BE PREPARED BY AN
ACCREDITED RTA TRAFFIC CONTROLLER AND SUBMITTED TO
COUNCIL. THIS TRAFFIC PLAN IS TO BE CERTIFIED BY AND
IMPLEMENTED TO THE SATISFACTION OF AN ACCREDITED RTA
TRAFFIC CONTROLLER PRIOR TO COMMENCEMENT OF WORK

2. ALL TRAFFIC CONTROL WORKS SHALL ONLY BE CARRIED OUT BY
ACCREDITED RTA TRAFFIC CONTROLLERS.

CLOSED CIRCUIT COLOUR TV (CCTV)

CCTV 1. UNDERTAKE A CCTV INSPECTION OF ALL THE COMPLETED
DRAINAGE IN ACCORDANCE WITH THE GUIDELINES OF THE
AUSTRALIAN CONDUIT CONDITION EVALUATION MANUAL
(ACCEM)

CCTV 2. APPLY THE FOLLOWING REQUIREMENTS TO THE CCTV
INSPECTION:-
A. USE DATA CAPTURE SOFTWARE APPROVED BY SYDNEY
WATER
B. USE CERTIFIED CCTV OPERATORS
C. THE CCTV VIDEOTAPE SHALL BE OF QUALITY TO ALLOW
ACCURATE ASSESSMENT OF THE INTERNAL CONDITION OF
THE PIPE.

CCTV 3. FURNISH TO THE DESIGN CONSULTANT:-
A. TWO (2) VIDEO TAPES
B. ONE SET OF SURVEY DATA ON 3 1/2 DISKETTE
C. ONE HARD COPY PRINTOUT OF THE SURVEY DATA.

REINFORCED CONCRETE

1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH
AS3600, THE SAA STANDARDS CITED IN AS3600, THE DRAWINGS AND
THE SPECIFICATION.

2. ALL CONCRETE SHALL BE 80mm SLUMP, 20mm MAXIMUM
AGGREGATE WITH NO ADMIXTURES OR FLY ASH, UNLESS APPROVED
BY THE ENGINEER. ALL CONCRETE TO HAVE TYPE SL PORTLAND
CEMENT WITH NO FLY ASH.

3. CONSTRUCTION JOINTS SHALL BE PROPERLY FORMED AND USED ONLY
WHERE SHOWN OR APPROVED BY THE ENGINEER.

4. REINFORCEMENT IS REPRESENTED DIAGRAMMATICALLY AND IS NOT
NECESSARILY SHOWN IN TRUE PROJECTION.

5. WELDING OR SPLICES IN REINFORCEMENT SHALL BE USED ONLY IN
POSITIONS APPROVED BY THE ENGINEER.

6. CONCRETE CURING SHALL BE IN ACCORDANCE WITH AS3600. CURING
SHALL BE COMMENCED WITHIN TWO HOURS OF FINISHING OPERATIONS
AND SHALL BE CONTINUED FOR A MINIMUM OF SEVEN DAYS BY AN
APPROVED PROPRIETARY COMPOUND OR BY KEEPING CONTINUOUSLY
WET.

7. FORMWORK SHALL BE DESIGNED AND CONSTRUCTED IN ACCORDANCE
WITH AS3610. FORMWORK SHALL NOT BE STRIPPED NOR PROPS
REMOVED WITHOUT THE APPROVAL OF THE ENGINEER.

8. FABRIC LAP DETAILS SHALL BE IN ACCORDANCE WITH DRAWINGS

9. HOOKS, LAPS AND BENDS SHALL BE IN ACCORDANCE WITH AS3600 UNO.

10. THE CONCRETE STRENGTH SHALL COMPLY WITH THE
FOLLOWING:

ELEMENT	MIN CEMENT CONTENT (kg/m³)	SLUMP (mm)	NOM MAX AGGREGATE SIZE (mm)	GRADE DESIGNATION (Mpa)
REINFORCED CONCRETE	360	80	20	SL32
MASS CONCRETE	260	80	20	N20
PILES	360	80	20	N40

11. NO PENETRATIONS, RECESSES OR CHASES OTHER THAN THOSE
SHOWN ON THE DRAWINGS SHALL BE MADE IN CONCRETE MEMBERS

12. ALL EDGES TO HAVE 20mm CHAMFERS, WHERE VISIBLE IN THE FINISHED WORK.

ALL CHEMICAL ANCHORS SHALL BE EITHER 'CHEMSET'
BY "RAMSET" WITH THE GLASS CAPSULE SYSTEM INSTALLED
IN STRICT ACCORDANCE WITH MANUFACTURERS INSTRUCTIONS
OR
HILTI HVU ADHESIVE ANCHOR WITH FOIL CAPSULE SYSTEM
INSTALLED IN STRICT ACCORDANCE WITH MANUFACTURERS
INSTRUCTION. ALL CHEMICAL ANCHORS SHALL BE HOT DIPPED
GALVANIZED AND BE MIN M16 DIA. U.N.O.

0 2 5 10m

GENERAL NOTES

- ALL DIMENSIONS AND EXISTING CONDITIONS SHALL BE CHECKED AND VERIFIED BY THE CONTRACTOR BEFORE PROCEEDING WITH THE WORK.
- ALL LEVELS RELATIVE TO AUSTRALIAN HEIGHT DATUM
- DO NOT SCALE DRAWINGS. USE FIGURED DIMENSIONS ONLY

KEYPLAN

LEGEND

REV.	DATE	DESCRIPTION	BY
A	19/11/10	PRELIMINARY ISSUED FOR DA REVIEW	LP

CLIENT

BANKSTOWN CITY COUNCIL

ARCHITECT
francis jones morehen thorp
fjmt
in association with MGT Sydney
SYDNEY
Level 5 MCA, 140 George Street
Sydney NSW 2000 Australia
T +61 2 9251 7077
F +61 2 9251 7072
E fjmt@fjmt.com.au
W www.fjmt.com.au
NOMINATED ARCHITECT: RICHARD FRANCIS-JONES (REG NO 5369)

Warren Smith & Partners Pty Ltd
A 1st Floor, 123 Clarence Street, Sydney 2000 NSW Australia
T 02 9299 1312 F 02 9290 1295 E wsp@warrensmith.com.au
ABN 38 300 430 126

SERVING THE CONSTRUCTION INDUSTRY
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Sydney Water Accredited • Water Servicing Co-ordinator
• Design and Project Management

PROJECT
BANKSTOWN TOWN HALL LIBRARY
CNR RICKARD RD & CHAPEL ST
BANKSTOWN
BANKSTOWN CITY COUNCIL

TITLE
SPECIFICATION NOTES

SCALE		DRAWN AM/JM	PROJECT CODE 3653
DATE	November 2010	APPROVED LP	
SHEET NO. CD-02			REVISION A

DEVELOPMENT APPLICATION