

SECTION 504 OPEN CONCRETE LINED DRAINS

504.01 DESCRIPTION

This section covers the requirements for the construction of open concrete lined drains at locations shown on the drawings or as directed by the Engineer.

504.02 MATERIALS

The concrete lining shall be cast in situ or precast concrete. All materials shall be supplied by the Contractor.

504.03 SUPPLY OF PRECAST UNITS

All precast units shall conform with the profiles shown on the drawings and shall have a dimensional tolerance of 10mm. Precast units shall be constructed from concrete complying with requirements of Section 601.

The surface of all sections shall be consistently smooth and of uniform colour. Any section damaged during handling, storing and transporting shall not be used.

504.04 CONSTRUCTION

All soft, wet or unstable material shall be removed up to 150mm below the underside of bedding and backfilled with selected fill, sand or gravel of a quality that when moistened and compacted will form a stable foundation.

All excavation shall be neatly trimmed to levels specified so as to permit accurate construction of concrete linings. All loose material shall be fully compacted to the specified level.

For cast insitu works, formwork shall be accurately set to line and level and shall be firmly held in position during placing of concrete.

All concrete work shall be carried out in accordance with the requirements of Section 601. Wherever mortar is used for bedding and jointing purposes, the mixture shall have a 6 to 1 sand to cement ratio.

Backfilling behind the concrete lined drains shall be with better quality common fill material compacted to a relative compaction of 95% standard compaction.

504.05 TOLERANCES

Concrete lined drains shall be constructed to within the following tolerances.

- (i) For horizontal and vertical alignment, 25mm and 10mm respectively from the required levels and position..
- (ii) For exposed surfaces, when tested with a 3m straight edge, surface irregularities shall not be more than 10mm.
- (iii) All cross-sectional dimensions shall be within 10mm of the specified dimensions.

504.06 MEASUREMENT AND PAYMENT

The unit of measurement shall be lineal metre of concrete lined drains constructed in place

Payment for the construction of concrete lined drains including surface preparation, trimming, and all labour, plant and materials required to do the work, shall be at the scheduled rate for all works completed in accordance with the specification.

STANDARD SPECIFICATION FOR ROADWORKS AND BRIDGEWORKS

SERIES 600 - INCIDENTAL CONSTRUCTION

SECTION 601	CONCRETE FOR INCIDENTAL CONSTRUCTION
SECTION 602	ROAD OPENINGS FOR UNDERGROUND UTILITY SERVICES
SECTION 603	CAST IN PLACE CONCRETE EDGINGS, PATHS AND OTHER SURFACINGS
SECTION 604	PRECAST CONCRETE KERB
SECTION 605	BLOCK PAVING
SECTION 606	BEACHING
SECTION 607	GABION BOXES & MATTRESSES
SECTION 608	GEOTEXTILES