CONCRETE

- C1. ALL WORKMANSHIP AND MATERIALS SHALL BE IN ACCORDANCE WITH THE CURRENT EDITION OF AS3600 INCLUDING AMENDMENTS, EXCEPT WHERE VARIED BY THE CONTRACT DOCUMENTS.
- C2. READYMIX CONCRETE SUPPLY SHALL COMPLY WITH AS1379
- C3. CONCRETE QUALITY

GENERAL REQUIREMENTS ARE GIVEN IN THE FOLLOWING TABLE. REFER TO THE SPECIFICATION FOR ADDITIONAL REQUIREMENTS FOR SPECIAL CLASS CONCRETE.

ELEMENT	CONCRETE CLASS	STENGTH GRADE (MPa)	CEMENT TYPE	MAX. AGG. SIZE (mm)	SLUMP (mm)	MAXIMUM SHRINKAGE STRAIN @ 56 DAYS (µm)
INDUSTRIAL DRIVEWAYS, PARKING AREAS	SPECIAL	32	GP	20	60	650
FOOTPATHS, CROSSINGS, KERB AND GUTTER	NORMAL	25	-	20	80	TO AS1379

- C4. PROJECT CONTROL TESTING SHALL BE CARRIED OUT ON ALL SPECIAL CLASS CONCRETE IN ACCORDANCE WITH AS1379, CLAUSE 6.5.
- C5. NO ADMIXTURES CONTAINING CHLORIDES SHALL BE USED.
- C6. REINFORCEMENT SHALL BE SUPPORTED ON PURPOSE MADE CONCRETE, STEEL OR PLASTIC SUPPORTS DEPENDING ON THE EXPOSURE CONDITION TO PROVIDE THE SPECIFIED CLEAR COVER. AT EXTERNAL SURFACES EITHER ALL PLASTIC OR CONCRETE SUPPORTS SHALL BE USED.
- C7. CONCRETE COVER SHALL BE MAINTAINED BY THE USE OF APPROVED CHAIRS AND/OR CONCRETE BLOCKS. CONDUITS, PIPES ETC. ARE NOT THE BE PLACED IN THE CONCRETE COVER.
- C8. ALL DOWELS PLACED IN DOWEL JOINTS AND IN EXPANSION JOINTS IN CONCRETE SLABS SHALL BE PLACED WITHIN THE FOLLOWING TOLERANCES. VERTICAL ALIGNMENT ± 2 DEGREES FROM LEVEL HORIZONTAL ALIGNMENT ± 2 DEGREES FROM A LINE PERPENDICULAR TO THE FACE OF JOINT. POSITION ± 5mm
- C9. GIVE A MINIMUM OF 24 HOURS NOTICE FOR INSPECTION OF REINFORCEMENT BY THE SUPERINTENDENT AS REQUIRED BY THE SPECIFICATION.
- C10. THE FINISHED CONCRETE SHALL BE A DENSE HOMOGENEOUS MASS, COMPLETELY FILLING THE FORMWORK THOROUGHLY EMBEDDING THE REINFORCEMENT AND FREE OF STONE POCKETS. ALL CONCRETE SHALL BE COMPACTED WITH MECHANICAL VIBRATORS.
- C11. CURING OF ALL CONCRETE IS TO BE ACHIEVED BY KEEPING SURFACES CONTINUOUSLY WET FOR A PERIOD OF 7 DAYS, UNLESS SPECIFIED OTHERWISE. APPROVED SPRAY ON CURING COMPOUNDS THAT COMPLY WITH AS3799 MAY BE USED WHERE FLOOR FINISHES WILL NOT BE AFFECTED. POLYTHENE SHEETING OR WET HESSIAN MAY BE USED TO RETAIN CONCRETE MOISTURE WHERE PROTECTED FROM WIND AND TRAFFIC. CURING IS TO COMMENCE IMMEDIATELY AFTER CONCRETE PLACEMENT.
- C12. CONSTRUCTION SUPPORT PROPPING IS TO BE LEFT IN PLACE WHERE NEEDED TO AVOID OVERSTRESSING THE STRUCTURE DUE TO CONSTRUCTION LOADING. BACKPROPPING IS SUBJECT TO APPROVAL BY THE SUPERINTENDENT. NO BRICKWORK OR PARTITION WALLS ARE TO BE CONSTRUCTED ON SUSPENDED LEVELS UNTIL ALL PROPPING IS REMOVED AND THE SLAB HAS DEFLECTED UNDER ITS SELF WEIGHT.
- C13. ALL PIPEWORK CAST INTO CONCRETE IS TO BE SLEEVED OR LAGGED WITH APPROPRIATE COMPRESSIBLE MATERIAL FOR THE FULL LENGTH OF EMBEDMENT.
- C14. ALL CONCRETE SHALL BE CURED IN ACCORDANCE WITH THE SPECIFICATION OR TO THE APPROVAL OF THE SUPERINTENDENT.
- C15. ALL CONCRETE PLACED IN POSITION SHALL BE ADEQUATELY VIBRATED.
- C16. REINFORCEMENT NOTATION
 - R DENOTES STRUCTURAL GRADE PLAIN ROUND BARS TO AS1302
 - N DENOTES HOT ROLLED DEFORMED BARS TO AS1302
 - SL72 DENOTES REINFORCEMENT FABRIC TO AS1304 (72 DENOTES SIZE OF FABRIC)

