

Part 1 General

1.1 REFERENCE STANDARDS

- .1 CSA Group
 - .1 C22.2 No. 0.3, Test Methods for Electrical Wires and Cables.
 - .2 CSA-C22.2 No. 38, Thermoset-Insulated Wires and Cables.
 - .3 CSA-C22.2 No. 131, Type TECK 90 Cable.
 - .4 CSA-C22.2 No. 174, Cables and Cable Glands for Use in Hazardous Locations.
 - .5 CSA-C22.2 No. 239, Control and Instrumentation Cables.

1.2 PRODUCT DATA

- .1 Provide product data in accordance with Section 01 33 00 - Submittal Procedures.

Part 2 Products

2.1 ARMoured CABLE FITTINGS (GLANDS)

- .1 Approvals: CSA
- .2 Body material: aluminum
- .3 Type: watertight, suitable for the application.
- .4 Accessories: locknut and grounding bushing
- .5 Sized: As required for the applicable cable.
- .6 Approved products:
 - .1 ABB (TnB) Star Tech series.
 - .2 Approved equal in accordance with B7.

Part 3 Execution

3.1 GENERAL CABLE INSTALLATION

- .1 Do not splice cables. A continuous length is required for all feeds.
- .2 Install in accordance with manufacturer's recommendations, observing requirements for minimum bending radius and pulling tensions.
- .3 Lay cable in cable trays in accordance with Section 26 05 36 - Cable Trays for Electrical Systems.
- .4 Maintain cable spacing a minimum of one cable diameter apart; unless otherwise indicated on the drawings or specifications.
- .5 Support cables utilizing appropriate metal clamps for the application.

- .6 Cable Colour Coding:
 - .1 To Section 26 05 00 - Common Work Results for Electrical.
- .7 Lace or clip groups of feeder cables at distribution centres, pull boxes, and termination points.
- .8 Installations in Category 1 Locations
 - .1 Install the cable with a minimum of 12 mm space from the supporting surface.
 - .2 Install every joint and cable connectors to be water-tight.
 - .3 Install grounding and bonding conductors to be protected from corrosion.
- .9 Installations in Category 2 Wet Locations:
 - .1 Comply with all requirements of Category 1 locations.
- 3.2 CABLE RE-INSTALLATION**
 - .1 Replace all cable glands / fittings on all re-installed cables.
- 3.3 INSTALLATION OF TECK90 AND ARMoured CONTROL CABLE (0 -1000 V)**
 - .1 Group cables wherever possible on channels and cable tray. Unless otherwise specified on the drawings, more than two conductors in parallel shall be installed in cable tray.
 - .2 Install cable exposed, securely supported by straps, hangers, and cable tray.
 - .3 Where surface mounted, provide clamps spaced a maximum of 1 m apart, unless otherwise indicated.
- 3.4 INSTALLATION AND TERMINATION OF CONTROL AND INSTRUMENTATION CABLE**
 - .1 Install ferrules on all stranded wire.
 - .2 Provide all installations in accordance with best industry practices for industrial facilities.
- 3.5 INSTALLATION OF ARMoured CABLE FITTINGS**
 - .1 Install fittings in accordance with manufacturer's instructions.
- 3.6 IDENTIFICATION**
 - .1 Install cable tags on all cables.
 - .2 Install wire tags on all switched and control wiring, or on any wiring where the cable tag together with the wire phase color does not simply identify the wires.
- 3.7 TESTING**
 - .1 Test all existing power conductors prior to removal in accordance with 26 08 05 – Electrical Commissioning.
 - .2 Test all conductors 10 AWG and larger in accordance with 26 08 05 – Electrical Commissioning.

END OF SECTION