



Product: [23541D](#)

ACIC 300V, 12 Tri #16 Str TC, XLPE Ins E1, IS/OS, PVC Jkt, AIA Armor, Blk PVC Jkt, 90C Wet 105C Dry CSA HLBCD SUN RES -40C

Product Description

Canadian Instrumentation Cable TC-ACIC 300V, 12 Triad 16AWG (7x24) Tinned Copper, XLPE Insulation E1 Color Code, Individual & Overall Beldfoil® Shield, PVC Inner Jacket, Aluminum Interlock Armor, Black PVC Outer Jacket, 90C Wet 105C Dry CSA HLBCD SUN RES -40C

Technical Specifications

Product Overview

Suitable Applications:	Industrial Control, Raceways Cable trays and ducts, Digital Control, Instruments (4-20ma, 0-10v, ...), low voltage digital control (24v, ...), encoders, control circuits, distributed control system (DCS), programmable logic controller (PLC), Solenoids, Valves, Actuators, Positioners
------------------------	---

Construction Details

Conductor

Element	Number of Element	Size	Stranding	Material
Triad(s)	12	16 AWG	7x24	TC - Tinned Copper

Insulation

Element	Material	Nom. Thickness	Nom. Insulation Diameter	Color Code
Triad(s)	XLP, XLPO, XLPE (Thermoset)	0.025 in (0.64 mm)	0.108 in mm	Black & White & Red and Numbered

Inner Shield

Shield Type	Material	Coverage	Drainwire Type
Tape	Bi-Laminate (Alum+Poly)	100%	18 AWG (7x26) TC

Outer Shield

Shield Type	Material	Coverage	Drainwire Type
Tape	Bi-Laminate (Alum+Poly)	100%	18 AWG (7x24) TC

Inner Jacket

Material	Nom. Thickness	Nom. Diameter	Ripcord
PVC - Polyvinyl Chloride	0.083 in (2.1 mm)	1.131 in (28.73 mm)	Yes

Armor

Armor Type & Material	Armor Thickness	Diameter Over Armor
AIA - Aluminum Interlock Armor	1.391 in (35.33 mm)	1.396 in (35.46 mm)

Outer Jacket

Material	Nom. Thickness	Nom. Diameter
PVC - Polyvinyl Chloride	0.052 in (1.3 mm)	1.495 in (37.97 mm)

Overall Cable Diameter (Nominal):	1.495 in (37.97 mm)
-----------------------------------	---------------------

Electrical Characteristics

Electricals

Nom. Conductor DCR	Nom. Inner Shield DCR	Max. Current
4.6 Ohm/1000ft	5.47 Ohm/1000ft (17.9 Ohm/km)	7.5 Amps per Conductor at 30°C

Voltage

Voltage Rating
300 V

Mechanical Characteristics

Temperature

Operating
-40°C To +90°C Wet/105°C Dry

Bend Radius

Stationary Min.	Installation Min.
17.94 in (455.7 mm)	17.94 in (455.7 mm)

Max. Pull Tension:	1543 lbs (699.9 kg)
--------------------	---------------------

Bulk Cable Weight:	1021 lbs/1000 ft
--------------------	------------------

Standards and Compliance

Environmental Suitability:	Indoor, Outdoor, Sunlight Resistance
----------------------------	--------------------------------------

Flammability / Reaction to Fire:	FT4
----------------------------------	-----

CEC / C(UL) Compliance:	HLBCD
-------------------------	-------

History

Update and Revision:	Revision Number: 0.58 Revision Date: 04-08-2022
----------------------	---

© 2022 Belden, Inc

All Rights Reserved.

Although Belden makes every reasonable effort to ensure their accuracy at the time of this publication, information and specifications described here in are subject to error or omission and to change without notice, and the listing of such information and specifications does not ensure product availability.

Belden provides the information and specifications herein on an "ASIS" basis, with no representations or warranties, whether express, statutory or implied. In no event will Belden be liable for any damages (including consequential, indirect, incidental, special, punitive, or exemplary damages) whatsoever, even if Belden has been advised of the possibility of such damages, whether in an action under contract, negligence or any other theory, arising out of or in connection with the use, or inability to use, the information or specifications described herein.

All sales of Belden products are subject to Belden's standard terms and conditions of sale.

Belden believes this product to be in compliance with all applicable environmental programs as listed in the data sheet. The information provided is correct to the best of Belden's knowledge, information and belief at the date of its publication. This information is designed only as a general guide for the safe handling, storage, and any other operation of the product itself or the one that it becomes a part of. The Product Disclosure is not to be considered a warranty or quality specification. Regulatory information is for guidance purposes only. Product users are responsible for determining the applicability of legislation and regulations based on their individual usage of the product.