



Product: [UE1601BW](#)

Type EX Thermocouple, 1 Pr #16 Sol, XLPE Ins Pur, Red, OS, Purple LSZH Jkt, 600V TC 90C Dry/Wet SUN RES

Product Description

Type EX Thermocouple, 1 Pair 16AWG (Solid) Chromel+Constantan, XLPE Insulation Pur, Red Color Code, Overall Beldfoil® Shield, Purple LSZH Outer Jacket, 600V TC 90C Dry/Wet SUN RES

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
------------------------	---

Physical Characteristics (Overall)

Conductor

Element	AWG	Stranding	Material	No. of Pairs
Pair(s)	16	Solid	Chromel & Constantan	1

Conductor Count:	2
------------------	---

Insulation

Element	Material	Nominal Diameter
Pair(s)	XLP, XLPO, XLPE (Thermoset)	0.324 in

Color Chart

Color
Red
Violet

Outer Shield

Type	Material Trade Name	Coverage [%]	Drainwire Material	Drainwire AWG
Tape	Beldfoil®	100%	TC - Tinned Copper	18 AWG

Outer Jacket

Material	Nominal Diameter	Nominal Wall Thickness
LSZH - Low Smoke Zero Halogen (Flame Retardant)	0.324 in	0.047 in

Electrical Characteristics

Voltage

UL Voltage Rating
600 V RMS

Temperature Range

UL Temp Rating:	90°C Dry, 90°C Wet
Operating Temperature Range:	-25°C To +90°C

Mechanical Characteristics

UV Resistance:	Yes
Min Bend Radius (Overall):	2.6 in

Standards

NEC/(UL) Compliance:	TC
ANSI Compliance:	MC 96.1-1982 Type EX

Applicable Environmental and Other Programs

EU Directive 2000/53/EC (ELV):	Yes
EU Directive 2011/65/EU (RoHS 2):	Yes
EU Directive 2012/19/EU (WEEE):	Yes
EU Directive 2015/863/EU (RoHS 2 amendment):	Yes
EU Directive Compliance:	EU Directive 2003/11/EC (BFR)
EU CE Mark:	Yes

Suitability

Suitability - Burial:	Yes
Suitability - Indoor:	Yes
Suitability - Outdoor:	Yes
Suitability - Sunlight Resistance:	Yes

Flammability, LSOH, Toxicity Testing

UL Flammability:	UL1685 Vertical Tray Flame Test
IEEE Flammability:	IEEE 1202
UL voltage rating:	600 V RMS (Type TC)

History

Update and Revision:	Revision Number: 0.51 Revision Date: 02-15-2024
----------------------	---

© 2025 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.