Bently Nevada 330876 Series Service Manual

330878-51-05

1. Description

Manufacturer : Bently Nevada

3. Product Information

Manufacturer : Bently Nevada

Product No. :330878-51-05

Product Type : 3300 XL 50 mm Proximitor Sensor

Made in U.S.A

Total Length and Mounting Option : 50 = 5.0 metres (16.4 feet) system length, panel mount

Agency Approval Option : 0 5 Multiple Approvals

The 3300 XL 50 mm Proximitor Sensor has the same advanced features as all 3300 XL Proximitor Sensors. Its thin design allows it to be mounted in either a high-density DIN-rail installation or a more traditional panel mount configuration. Improved RFI/EMI immunity allows the 3300 XL Proximitor Sensor to achieve European CE mark approvals without any special mounting considerations. This RFI immunity prevents the transducer system from being adversely affected by nearby high frequency radio signals. SpringLoc terminal strips on the Proximitor Sensor require no special installation tools and facilitate faster, highly robust field wiring connections.

Proximitor Sensors are supplied by default from the factory calibrated to AISI 4140 steel. Calibration to other target materials is available upon request.

Proximitor Sensor Input

Accepts one noncontacting 3300 XL 50 mm Proximity Probe and Extension Cable.

Power

Requires -17.5 Vdc to -26 Vdc without barriers at 12 mA maximum consumption, -23 Vdc to -26 Vdc with barriers. Operation at a more positive voltage than -23.5 Vdc can result in reduced linear range.

Output resistance 50 Ω

Extension cable capacitance

69.9 pF/m (21.3 pF/ft) typical

Proximitor Sensor Material A380 aluminum

Operating Temperature

-51°C to +100°C (-60°F to +212°F)

Storage Temperature

-51°C to +105°C (-60°F to +221°F)

Hazardous Area Approvals

3300 XL Proximitor Sensor

ia
When installed
with
intrinsically
safe zener
barriers per
drawing 141092
or when
installed with
galvanic
isolators.
Class I, Zone 0: AEx/Ex ia IIC T4/T5 Ga;
Class I, Groups A, B, C, and D,
Class II, Groups E, F and G,
Class III;
T5 @ Ta= -55°C to + 40°C.
T4 @ Ta= -55°C to + 80°C.
nA, ec
When installed
with nonincendive
circuit
connected per
drawing
140979.
Class I, Zone 2: AEx/Ex nA IIC T4/T5 Gc;
Class I, Division 2, Groups A, B, C, and
D;
Class I, Zone 2: AEx/Ex ec IIC T4/T5 Gc;
Class I, Division 2, Groups A, B, C, and
D;
T5 @ Ta= -55°C to + 40°C
T4 @ Ta= -55°C to + 80°C
Temperature Schedule
Ambient Temperature
(Probe Only)
For EPL Ga and Gc
Temperature Classification T1 Ambient Temperature -55°C to +232°C
Temperature Classification T2 Ambient Temperature -55°C to +177°C
Temperature Classification T3 Ambient Temperature -55°C to +120°C
Temperature Classification T4 Ambient Temperature -55°C to +80°C
Temperature Classification T5 Ambient Temperature -55°C to +40°C
For EPL Dc
Temperature Classification T280°C @ Ta Ambient Temperature -55°C to +232°C
Temperature Classification T225°C @ Ta Ambient Temperature -55°C to +177°C
Temperature Classification T170°C @ Ta Ambient Temperature -55C to +120°C
Temperature Classification T130°C @ Ta Ambient Temperature -55°C to +80°C
Temperature Classification T105°C @ Ta Ambient Temperature -55°C to +100°C
Temperature Classification T90°C @ Ta Ambient Temperature -55°C to +40°C