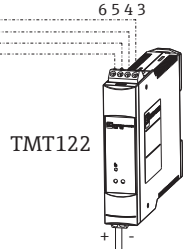


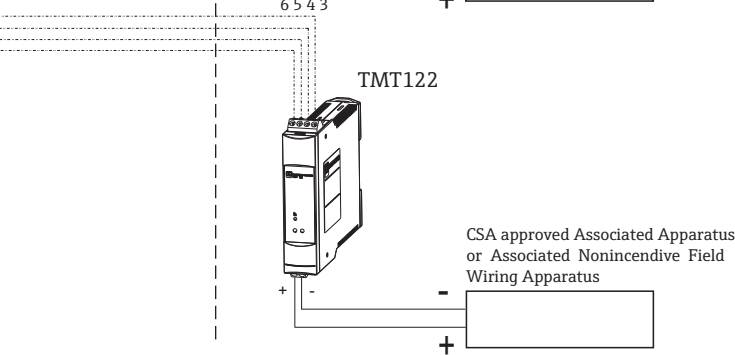
Hazardous (Classified) Location  
Class I / Division 1 / Groups ABCD  
Class I / Division 2 / Groups ABCD

Nonhazardous Locations

e.g. RTD or TC Sensor  
(Simple Apparatus)  
remote mounted



e.g. RTD or TC Sensor  
(Simple Apparatus)  
remote mounted



### Temperature range

T4 -40°C ... +85°C  
T5 -40°C ... +70°C  
T6 -40°C ... +55°C

**INTRINSICALLY SAFE** IS Class I / Div. 1 / Groups ABCD  
**NONINCENDIVE, FIELD WIRING** NI Class I / Div. 2 / Groups ABCD

Sensor circuits (Terminals 3...6)

$U_o$  or  $V_{oc}$  or  $V_t = 5.0$  V     $I_o$  or  $I_{sc} = 5.9$  mA     $P_o = 7.2$  mW

Group A, B resp. IIC     $C_o$  or  $C_a = 100$   $\mu$ F     $L_o$  or  $L_a = 100$  mH  
Group C resp. IIB     $C_o$  or  $C_a = 1000$   $\mu$ F     $L_o$  or  $L_a = 100$  mH  
Group D resp. IIA     $C_o$  or  $C_a = 1000$   $\mu$ F     $L_o$  or  $L_a = 100$  mH

### Installation Notes TMT122

- CSA approved apparatus must be installed in accordance with manufacturer's instructions.
- Use supply wires suitable for 5°C above surroundings.
- Stating that only simple apparatus should be terminated to the sensor connection.  
Simple apparatus is defined as a device that will neither generate nor store more than 1.2V, 0.1A, 0.25mW or 20 $\mu$ J. Examples are Thermocouples or RTDs.

### INTRINSICALLY SAFE

Exia/ Class I / Div. 1 / Groups ABCD

- Installation should be in accordance with the Canadian Electrical Code (CEC).
- CSA Approved Associated Apparatus must meet the following parameters:  
 $U_o \leq U_i$      $I_o \leq I_i$      $P_o \leq P_i$      $C_a \geq C_i + C_{cable}$      $L_a \geq L_i + L_{cable}$   
Transmitter entity parameters are as follows:  
 $U_i$  or  $V_{max} \leq 30$  V DC     $C_i = 0$   
 $I_i$  or  $I_{max} \leq 100$  mA     $L_i = 0$   
 $P_i \leq 750$  mW

- $V_{oc} + V_{oc}$  of Handheld device <  $V_{max}$ ,  $I_{sc} + I_{sc}$  of Handheld device <  $I_{max}$ ,  
 $P_o + P_o$  of Handheld device <  $P_i$ ,  $C_a > C_i + C_{cable} + C_i$  of Handheld device,  
 $L_a > L_i + L_{cable} + L_i$  of Handheld device, when Programming Handheld device is used.
- Warning: Substitution of components may impair intrinsic safety.
- Avertissement: La substitution de composants peut compromettre la sécurité intrinsèque.

### NONINCENDIVE

Class I / Div. 2 / Groups ABCD

- Intrinsic safety barrier is not required.  $V_{max} \leq 35$  V DC.
- Warning: Do not disconnect equipment unless power has been switched off or the area is known to be non-hazardous.
- Avertissement: La substitution de composants peut rendre ce matériel inacceptable pour les emplacements de Class I, Division 2.
- Transmitter provides nonincendive field wiring to the Thermocouple/RTD
- Nonincendive field wiring installation  
The Nonincendive Field Wiring Circuit Concept allows interconnection of Nonincendive Field Wiring Apparatus with Associated Nonincendive Field Wiring Apparatus or Associated Intrinsically Safe Apparatus or Associated Apparatus not specifically examined in combination as a system using any of the wiring methods permitted for unclassified locations, when  $V_{oc} \leq V_{max}$ ,  $C_a \geq C_i + C_{cable}$ ,  $L_a \geq L_i + L_{cable}$ .  
Transmitter Nonincendive Field Wiring parameters are as follows:

$U_i$  or  $V_{max} \leq 30$  V DC     $C_i = 0$      $L_i = 0$   
 $I_i$  or  $I_{max}$  = see following note below

For these current controlled circuits, the parameter  $I_{max}$  is not required and need not to be aligned with parameter  $I_{sc}$  and  $I_t$  of the Associated Nonincendive Field Wiring Apparatus or Associated Apparatus.

### Functional ratings

These ratings do not supersede Hazardous Location values  
 $U_{nom} \leq 35$  V DC     $I_{nom} \leq 4$  to 20 mA



	Approved Pfanzelt	Date (yyyy-mm-dd) 2001-12-04	Drawing No. 14 14 01 112A	Dwg.rev. B	Revision no. W15105	Revision date (yyyy-mm-dd) 2015-01-08	Name MP	Material 71540282 XA02296T/09/EN/01.20	Endress+Hauser
Volume (mm³)	Designed Pfanzelt	Date (yyyy-mm-dd) 2001-12-04	Unit ITEMP TMT122	Scale 1:1	Title CONTROL DRAWING CSA			Series	
Refer to protection notice ISO 16016	Edge of working parts ISO 13715	Geometrical tolerancing ISO 2768-mH-E	Part No. -	Format A4	Objekt version	Sheet 1 of 1	Endress + Hauser Wetzler GmbH+Co. KG Nesselwang / Germany		