



Description

PTS[®] Series Programmable Temperature Switches are of very compact design. This unique construction can replace other commonly used temperature switches in a variety of applications.

Intempco's PTS[®]50 Series assemblies are built for direct immersion into processes for applications that do not require a thermowell. The probe tube is precision tig welded directly to the process fitting.

The housing material of the PTS[®]50 is made of Aluminum, while the probe and fitting materials are fabricated from Stainless Steel 316/316L. Thus ensuring a highly durable and robust design for any industrial application.

The PTS[®]50 series offers standard features which simplifies the selection process. This simple selection method saves time and they offered at a lower cost due to their standardized construction.

Product Features

- Very low installation cost
- Vibration resistant
- Accurate to ±1 °C (±2.2 °F) of set-point and reset point
- Programmable set-point, reset point and time delay
- Best value and easy installation
- Compact size



PTS[®]820 hockey-puck transmitter

†PTS[®] is a trademark of Intempco Controls Ltd. and is registered in the US Patent and Trademark Office.



Custom Builder



BOX1 CODE	Switch Module Type	BOX 2 CODE	Head/Termination	BOX 3 CODE	Probe Length "U"
SA	PTS®820 Switch Module	AC2*	Aluminum die cast screw cover with Cable Gland, meets Type 4/ IP65		In 0.1 " increments Ex.: 065 = 6.5 " long

*Cable gland can be removed leaving 1/2" NPTF conduit

PTS®820 Switch Configuration

The PTS®820 switch is a precise, reliable, and robust transmitter that's ideal for use in industrial applications, for more details see the PTS®820 Datasheet. To fully configure the PTS®820 switch, please fill out the following table, on the right:



PTS®820 Dimensions : inches[mm]

Feature		Options	
	_	1: High Temp Limit Switching on Rising Temp.	
Alarm Type		2: Low Temp Limit Switching on Falling Temp.	
		3: Range Temp Limit Switching outside Temp. Range	
Switching Point		Ex.: 050 = 50 degrees	
Temperature		C: Switching temperature in Celsius (°C)	
Unit	_	F: Switching temperature in Fahrenheit (°F)	
Hysteresis		Ex.: 03 =3 degrees 2°C (3.6°F) default Value	
Time Delay (sec)		Ex.: 02 = 2.0 seconds 1.0 Second default value	
Quitruit Logio	_	A: Normal (std.)	
σαιμαι τοχις		B: Fail-safe	

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Specifications

Electronical Properties Optimal Operating Conditions :

@Vnom = 24 VDC, **T.ambient** = 25° C,

Power Supply :	12-30 VDC
Supply Effect :	Less than 0.005 %/V
Power Consumption :	Max. 50mA @ 24VDC
Input :	Pt100, 3-wire, α=0.00385, DIN EN 60751
Excitation Current RTD :	0.2 mA
Accuracy :	±0.5 °C with default factory calibration
Repeatability :	±0.25 °C
Sensor Lead Resistance RTD :	RTD resistance + lead wire resistance
	must be less than $3 K\Omega$
Output :	Relay SPDT Nominal Switching Capacity: 1A @ 30 VDC or 0.3 A @ 125 VAC
Switching Range :	Software programmable, between
	-200 °C to 600 °C (-328 °F to 1112 °F)
Hysteresis :	Software programmable from 0 to 99°, factory set to 1°
Response Time :	Software programmable from 0 to 99 seconds, factory set to 1 second
Switching Logic :	Software programmable between Rising, Falling, or Zone
Open Circuit Detection:	Software programmable
Ambient Operating Temperature :	-40°C to 80°C (-40 °F to 176°F)
Ambient Temperature Effect :	± 0.02 °C/°C
Storage Temperature :	-40°C to 80°C (-40 °F to 176°F)

Mechanical Properties

Head Assembly :	AC2: Aluminum die cast screw cover with integral Cable Gland, meets Type 4/ IP65
Probe Material :	Stainless Steel 316/316L, dual certified.
Max Operating Pressure :	500 PSIG (applies to sensor portion only)

• Information furnished by Intempco is believed to be accurate and reliable.

However, no responsability is assumed by Intempco for its use.

Specifications subject to change without notice.