

Neo-Dyn® Series 100TC Temperature Switch/Internal Adjustment

Remote mount adjustable temperature switch with efficient Nega-Rate® Belleville spring mechanism and saturated vapor sensor for quick response and narrow deadband.

Operating Temperature Data

Adjustable Range Number	Adjustable Set Point Range		Deadband† (approx) Bottom/Top		Proof Temperature	
	Increasing °F	Decreasing °F	°F	°C	°F	°C
B	-50 to +65	-69 to +62	19/3	11 / 2	250	121
D	+30 to +175	+7 to +172	23/3	13 / 2	400	204
F	+95 to +250	+70 to +247	25/3	14 / 2	450	232
H	+175 to +360	+145 to +355	30/5	17 / 3	500	260
J	+335 to +500	+305 to +495	30/5	17 / 3	600*	315
L	+485 to +720	+445 to +714	40/6	22 / 3	900*	482

†Deadband decreases as the adjustable set point is increased. For narrow deadband select set point in upper half of adjustable range.

*Thermowell required for temperatures above 500°F.

Standard Specifications

Electrical

Snap action electrical switch recognized by Underwriters' Laboratories, Inc. and CSA International

Electrical Connection

½ NPT female conduit connection with terminal block

Process Connection

½ NPT Male
Remote mount Stainless steel 6' capillary with armor jacket, 10" minimum bendable tubing and ½" adjustable gland nut. Optional capillary lengths available.

Temperature Range

Ambient: -40°F to +180°F
(-40°C to +82°C)

System Pressure

1500 psig maximum

Proof Pressure

2250 psig

Adjustment

Concealed wrench flat adjustment with range scale

Shipping Weight

Approximately 5 pounds



Weather Proof
(NEMA 4 and 13)

Ordering Sequence — Select desired option for each category

OPTIONS

Wetted Material

5 300 series stainless steel, graphite filled non-asbestos packing

Adjustable Range

B	-69°F dec. to	+65°F inc.	-56°C dec. to	18°C inc.
D	+7°F dec. to	+175°F inc.	-14°C dec. to	79°C inc.
F	+70°F dec. to	+250°F inc.	21°C dec. to	121°C inc.
H	+145°F dec. to	+360°F inc.	63°C dec. to	182°C inc.
J	+305°F dec. to	+500°F inc.	152°C dec. to	260°C inc.
L	+445°F dec. to	+720°F inc.	229°C dec. to	382°C inc.

Electrical Form

- C 15 amp at 125 or 250 VAC; ⅛ hp at 125 VAC; ¼ hp at 250 VAC;
.5 amp resistive, .04 amp inductive at 125 VDC
- CC 11 amp, ¼ hp at 125 or 250 VAC; 5 amp resistive, 3 amp inductive at 28 VDC;
.5 amp resistive at 125 VDC
- Z 15 amp at 125 or 250 VAC; ¼ hp at 125 VAC; ½ hp at 250 VAC; 1 amp resistive,
.5 amp inductive at 125 VDC

Enclosure

3 Meets or exceeds the requirements of NEMA Type 3, 3R, 3S, 4, 4X and 13

Miscellaneous

- A Epoxy paint exterior — extra protection for severe environments
- J Annealed stainless steel port screws for H₂S environments
- L Neon indicator light — 115 VAC
- M Gold electrical contacts for extremely low current applications
- P 5-Pin Brad Harrison connector (Reduce AC electrical rating to 8 amps)
(Not for CC3 Electrical)
- W Stainless steel screws — exterior
- X CSA Certified and CE Mark

Optional Capillary Lengths

10', 15', 20' and 25' lengths available
(insert appropriate number at end of model number — see Example)

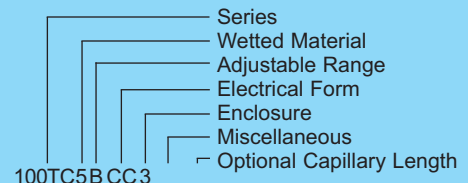
Special (Consult representative or factory)

- Thermowells
- Non-catalog adjustable range and/or set point and deadband

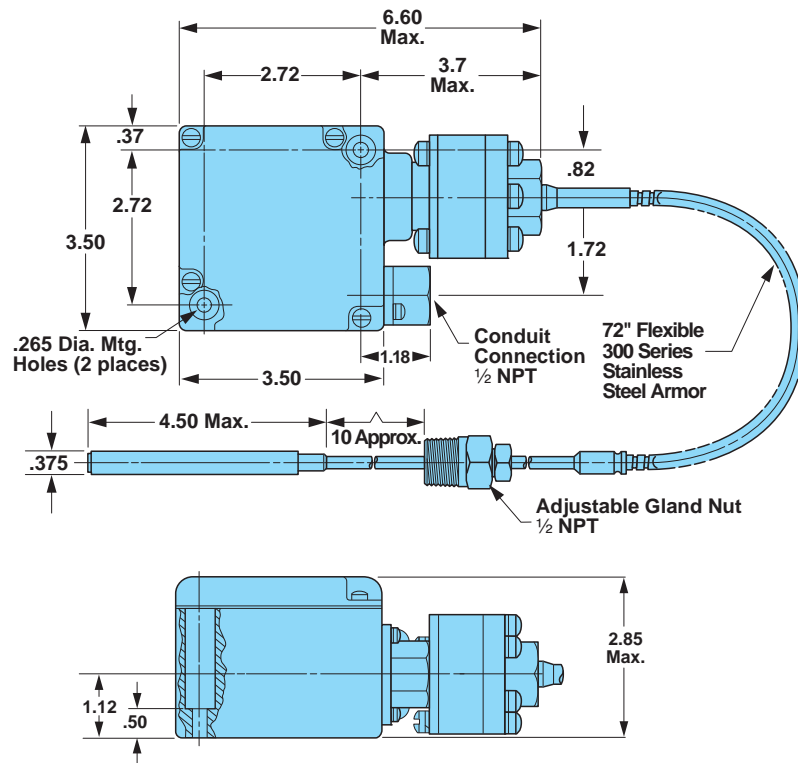
Ordering Procedure

- When factory presetting is desired, stipulate set point, increasing or decreasing
- Insert available option number or letter designation as required

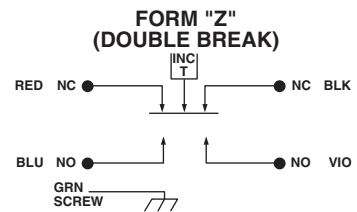
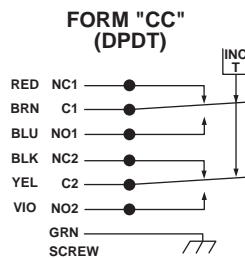
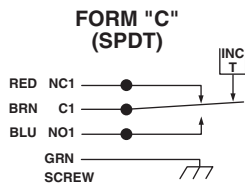
Example



Envelope Dimensions



Electrical Form



Basic Principles of Design

