Corona Resistant Stator RTD

Overview

Motor manufacturers that use variable speed drives for flexibility and high performance can experience corona related problems. PWM inverters can create high voltage spikes exceeding 1600 volts. Minco has answered the call with a corona resistant RTD. This RTD is specifically designed for the latest generation of variable frequency drives for AC motors. Minco uses special materials and manufacturing techniques to create an RTD that is virtually corona-proof, eliminating the need for expensive reactors or filters for the sensors.**

- Designed for AC motors with variable frequency drives (VFD)
- Proprietary design* resists detrimental effects of corona
- Protect expensive motors with an inexpensive overtemperature warning system
- Tested to 10,000 VAC without failure
- Widths from 0.305" to 1.25"
- Lengths from 7" to 30"

Specifications - Model S8025

Temperature: 180°C (356°F); Class H.

Thickness: 0.030" (0.075" max. thickness over lead bulge).

Length: 7" to 30".

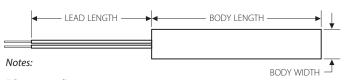
Width: 0.305" to 1.25" (2 and 3 lead models); 0.344" to 1.25" (4 lead models).

Leadwires: 2, 3, or 4 AWG #22, stranded copper; PTFE or polyimide insulation.

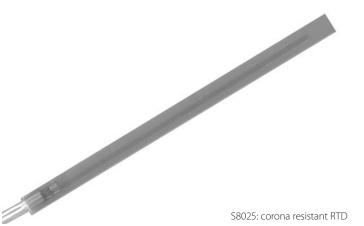
Element: Platinum; $100 \Omega \pm 0.5\%$ at 0°C; 0.00392 TCR.

Body material: Polyimide, corona resistant.

Dielectric strength: Body: 8000 VRMS at 60 Hz; Leads and leadwire exit (0.5" into body): 5000 VRMS at 60 Hz.



^{*} Patent pending



Specification and order options

S8025	Model Number
PA	Sensing element
	PA = Platinum, 100 Ω ±0.5%, 0.00392
120	Body length:
	Specify in 0.1" increments
	(Example: 120 = 12.0")
	Minimum = 70; maximum = 300
Т	Leadwire insulation:
	T = PTFE
	K = Polyimide
500	Body width:
	Specify in 0.001" increments
	(Example: 500 = 0.500")
	Minimum = 305 (2 and 3 lead models)
	Minimum = 344 (4 lead models)
	Maximum = 1250
Z	Number of leads per element:
	Y = 2 leads
	Z = 3 leads
	X = 4 leads
36	Lead length in inches
F	Leadwire configuration
	F = Flat
	T = Twisted
S8025PA120T500Z36F = Sample part number	

Specifications subject to change

^{**} Reducing the effects of corona on motor windings is the responsibility of the motor manufacturer