



NTCALUG SERIES



NTC assembly for surface temperature measurement

Temperature monitoring is getting more and more important in Smart Farming and Agriculture applications. In greenhouses for example, the right temperature plays a key role for the growth of vegetables and plants. But also during the milking process, measuring the body temperature is very important to monitor the health status of the cow.

Manufactured with a 100 % lead (Pb)-free ceramic die, NTCALUG family thermistors contribute to a cleaner environment by eliminating all hazardous substances that could potentially cause issues during recycling and disposal.

The NTCALUG family includes a variety of devices that deliver accurate temperature sensing in multiple applications. Standard lug thermistors are capable of continuous operation to +150°C and long term reliability of 5,000 hours (dry heat). Devices featuring a nickel conductor and low profile closed ring tongue provide a low thermal gradient, while mini lug sensors are optimized for fast reactions in space-limited applications.

Available in both AEC-Q200 and cULus-recognized versions, devices in the NTCALUG family offer high insulation voltage ratings up to 2.7 kV_{AC}, a rugged construction, and easy mounting via their ring tongue terminals. The thermistors are offered with a range of customization options to meet specific design requirements of individual customer applications.

Key Features

- Wide range of RT curves, tolerances, LUG sizes and different cable material and diameter available
- Fast time response and accurate measurements due to low thermal gradient
- Temperature sensing at locations with limited space
- AEC-Q200 and UL approved

Key Applications

- Inverter and converter
- BMS
- Charging plugs and OBC
- Robotics
- Smart Farming and Agriculture/ Horticulture

Key Benefits

- Reliable operating temperature of up to 150°C over life-time
- Higher insulation voltage compared to competition
- Many variants available in standard portfolio (different RT curves, R25-tolerance, LUG size, cable diameter, insulation material)
- Many possibilities of customization (e.g. with connector, shrink tube)

