

Specification	TR41A	TR42A	TR43A		TR45	
Measurement Channels	Temperature 1ch	Temperature 1ch	Temperature 1ch, Humidity 1ch		Temperature 1ch	
Sensor	Thermistor (Internal)	Thermistor	Thermistor	Polymer Resistance	Thermocouple: Type K, J, T, S, R (Not provided)	Pt100, Pt1000 (3-wire, 4-wire*1) (Available as option)
Measurement Units	°C, °F	°C, °F	°C, °F	%RH	Connection Terminal (M3.5)	
Measurement Range	-40 to 80 °C	-60 to 155 °C	0 to 55 °C	10 to 95 %RH	Type K : -199 to 1370 °C Type J : -199 to 1200 °C Type T : -199 to 400 °C Type S : -50 to 1760 °C Type R : -50 to 1760 °C	-199 to 600 °C
Accuracy	Avg. ±0.5 °C	Avg. ±0.3 °C at -20 to 80 °C Avg. ±0.5 °C at -40 to -20 °C, 80 to 110 °C Avg. ±1.0 °C at -60 to -40 °C, 110 to 155 °C	±0.5 °C	±5 %RH at 25 °C, 50 %RH	Thermocouple Measurement (Sensor inaccuracies not included) Type K, J, T : ±(0.5 °C + 0.3 % of reading) at -100°C or above Type S, R : ±(1.5 °C + 0.3 % of reading) at 100°C or above Cold Junction Compensation ±0.5 °C *at 10 to 40 °C ±0.8 °C *at -40 to 10 °C, 40 to 80 °C	±(0.3 °C + 0.3 % of reading) *at 10 to 40 °C ±(0.5 °C + 0.3 % of reading) *at -40 to 10 °C, 40 to 80 °C
Measurement Resolution	0.1 °C	0.1 °C	0.1 °C	1 %RH	Type K, J, T, E: 0.1 °C Type S, R : Approx. 0.2 °C	0.1 °C
Responsiveness	Response Time (90%) : Approx. 35 min.	Response Time (90%) : Approx. 80 sec.(in air) Approx. 7 sec. (in agitated water)	Response Time (90%) : Approx. 7 min.		-	-
Logging Capacity	16,000 readings	16,000 readings	8,000 data sets (One data set consists of readings for multiple channels.)		16,000 readings	
Recording Interval	Select from 15 choices: 1, 2, 5, 10, 15, 20, 30 sec. or 1, 2, 5, 10, 15, 20, 30, 60 min.					
Recording Mode	Endless (Overwrite oldest data when capacity is full) or One Time (Stop recording when capacity is full)					
LCD Display Items	Measurements (alternating display for multiple channel devices), Recording Status, Battery Life Warning, etc.					
Communication Interfaces	Bluetooth 4.2 (Bluetooth Low Energy)				Bluetooth 4.1 (Bluetooth Low Energy)	
Communication Time	Data Download Time (full logger) : Approx. 15 seconds				Data Download Time (full logger) : Approx. 1.5 minutes	
Power	Lithium Battery (LS14250) x 1					
Battery Life (*2)	Approx. 1.5 years (*3)				Approx. 1 year (*3)	
Dimensions	H 62 mm x W 47 mm x D 19 mm(excluding protrusions and sensor)				H 62 mm x W 47 mm x D 26.5 mm (excluding protrusions and sensor)	
Weight	Approx. 45 g				Approx. 50 g	
Operating Environment	-40 to 80 °C -30 to 80 °C during wireless communication				Temperature : -40 to 80 °C (-25 to 80 °C during wireless communication) Humidity : 90 %RH or less (no condensation)	
Waterproof Capacity	IP67: Immersion proof	IP64: Splash proof (rated for use in daily life) (*4)			None	
Accessories	-	Temperature Sensor TR-5106	Temp-Humidity Sensor THB3001		Cable Clamp	
	Lithium Battery LS14250, Registration Code Label, Strap, User's Manual (Warranty Included)					
Software (*5)	Mobile Applications (iOS, Android) T&D Thermo, TR4 Report				Mobile Applications (iOS, Android) T&D Thermo, ThermoREC, ThermoStorage, TR4 Report	

*1: In the case of a 4-wire sensor, one wire will be left unused.

*2: Battery life varies depending upon multiple factors including ambient temperature, recording interval, usage of applications, and battery performance. All estimates are based on operations carried out with a new battery and are in no way a guarantee of actual battery life.

*3: Estimated battery life when recording data at an interval of more than 10 seconds and displaying a graph in the app once a day.

*4: This is the waterproof capacity of the data logger with the sensor connected. Note that the temperature-humidity sensor is not water resistant.

*5: Free app download and information on OS compatibility is available on the Software page of our website at tannd.com/software/.

The specifications listed above are subject to change without notice.