

## **Data Sheet**

## **120mm Cylindrical Transponder**



## Specifications:

Part number	RI-TRP-R9TD	RI-TRP-W9TD	RI-TRP-D9TD	
Functionality	Read Only	Read/Write	MPT	
Memory (Bits)	64	80*	1360*	
Memory (Pages)	1	1	17*RW	
Operating Frequency	134.2 kHz			
Modulation	FSK (Frequency Shift Keying) 134.2 kHz / 123.2 kHz			
Transmission Principle	HDX (Half Duplex)	HDX (Half Duplex)		
Power Source	Powered from the reader signal (batteryless)			
Typical Reading Range	≤ 200 cm**			
Typical Programming Range		30 % of specified reading range		
Typical Reading Time	70 ms	70 ms 86 ms		
Typical Programming Time		309 ms	293 ms	
Typical Programming Cycles	100,000			
Operating Temperature	-25 to +85°C	-25 to +70°C	-25 to +85°C	
Storage Temperature	-40 to +100°C (Total +125°C for 1000 hours, +150°C for 100 hours, +175°C for 5 hours)			
Case Material	Reinforced Poly-Ether-Imide (PEI), black			
Protection Class	IP 67			
EMC	Programmed code is not affected by normal electromagnetic interference or x-rays			
Signal Penetration	Transponder can be read through virtually all non-metallic material			
Mechanical Shock	IEC 68-2-27, Test Ea; 200 g, half sine, 3 ms, 2 axes, 6 shocks per axis			
Vibration	IEC 68-2-6, Test Fc; 20 g, 20 - 500 Hz, 2 axes, 10 cycles per axis			
Dimensions	Ø 21 mm ± 0.8 mm * 121 mm ± 2 mm			
Weight	60 g			

We recommend that you split each 80 bit page into 64 user programmable bits plus a 16 bit wide CRC CCITT Block Check Character as is done by TI-RFID LF readers.

For more information, contact the sales office or distributor nearest you. This contact information can be found on our web site at: <a href="http://www.ti-rfid.com">http://www.ti-rfid.com</a>

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<sup>\*\*</sup> Depending on RF regulation in country of use, the Reader Antenna configuration used, and the environmental conditions.