Chipsmall Limited consists of a professional team with an average of over 10 year of expertise in the distribution of electronic components. Based in Hongkong, we have already established firm and mutual-benefit business relationships with customers from,Europe,America and south Asia,supplying obsolete and hard-to-find components to meet their specific needs.

With the principle of "Quality Parts,Customers Priority,Honest Operation,and Considerate Service",our business mainly focus on the distribution of electronic components. Line cards we deal with include Microchip,ALPS,ROHM,Xilinx,Pulse,ON,Everlight and Freescale. Main products comprise IC,Modules,Potentiometer,IC Socket,Relay,Connector.Our parts cover such applications as commercial,industrial, and automotives areas.

We are looking forward to setting up business relationship with you and hope to provide you with the best service and solution. Let us make a better world for our industry!

Contact us

3M^{TM} RFID Premium Tag – Technical Data Sheet
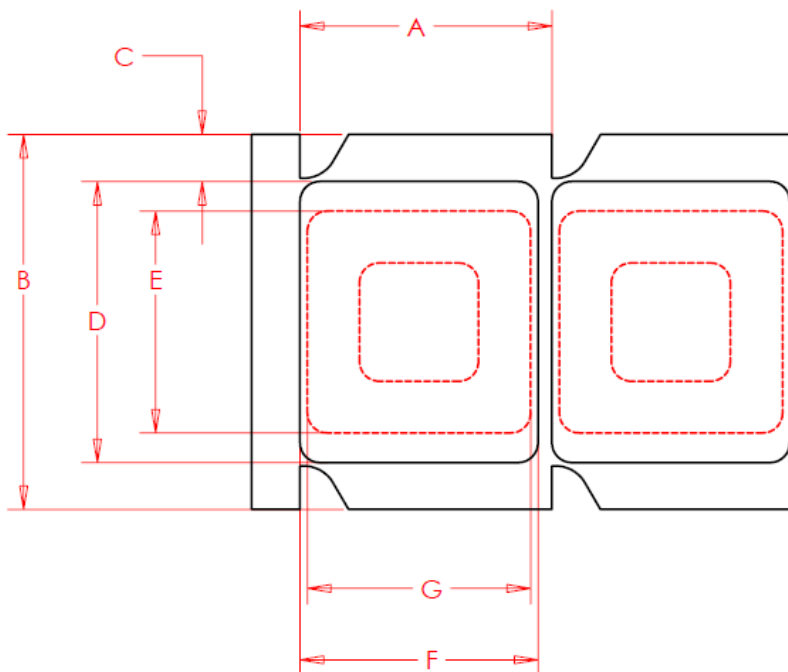## 57mm x 48mm (2.25" x 1.89")
75-0500-6593-9

Description

This tag is provided as a pressure sensitive label on a silicon paper liner. The tags are wound on a single tag width roll. The integrated circuit is a 13.56 MHz 2048 bit memory design that is ISO 18000-3 Mode 1 compliant. A black security coating masks the antenna. Bad tags are marked.

Dimensions

A	Tag to Tag Pitch	50.8 mm (2")
B	Web Width	76 mm (3")
C	Web edge to label	9.5 mm (0.375")
D	Tag Width	57 mm (2.25")
E	Antenna Width	45 mm (1.77")
F	Tag Length	48 mm (1.89")
G	Antenna Length	45 mm (1.77")
	Tag thickness over antenna (without IC)	0.25 mm (0.01")
	Tag thickness (maximum, with IC)	0.5 mm (0.02")
	Core inside diameter	76 mm (3")
	Maximum roll diameter	171 mm (6.75")

3M^{TM} RFID Premium Tag (continued)

Electronic Specifications

IC	TI Tag-it HF-I Plus Transponder
Operating Frequency	13.56 MHz
Supported Standard	ISO 18000-3 Mode 1, ISO 15693-3
Read/Write Cycles	Unlimited number of read cycles and up to 100,000 write cycles.
Read Rate	Up to 50 tags per second (dependent on application).
Anti-collision	Yes - Linear Algorithm
Memory Format	2048-bits programmable read/write
Read Range	Dependent on reader power and reader antenna
Data Rate	26 kb/s as per ISO 18000-3 Mode 1 Specification

Material Specifications

Face Material	Opaque Thermal Transfer Paper
Adhesive	3M Acrylic General Purpose Adhesive
Adhesive PH	6.0 to 7.5
Antenna	Aluminum
IC to antenna construction	Chip bonded to antenna using Anisotropic Conductive Film adhesive
Tag base material	PET (Polyethylene terephthalate)

General Specifications

Operating temperature	-20 C to 70 C (-4 F to 158 F)
Storage temperature	15 C to 25 C (59 F to 77 F) and at 20% to 70% relative humidity
Storage life	2 year
Reliability testing	65 C(149 F)/95%RH for 15 weeks
ESD voltage immunity	+/- 2 kV peak
Bending diameter	>50mm

Delivery and Packaging Specifications

Tags per roll	1000
Rolls in package	1
Winding	Tags out
Inspection and delivered tags	100% inspected, 1000 good tags per roll
Bad Tags Marked	Yes
Warranty	Please contact the local 3M sales representative for warranty information