




M-Crown Tag (Global)

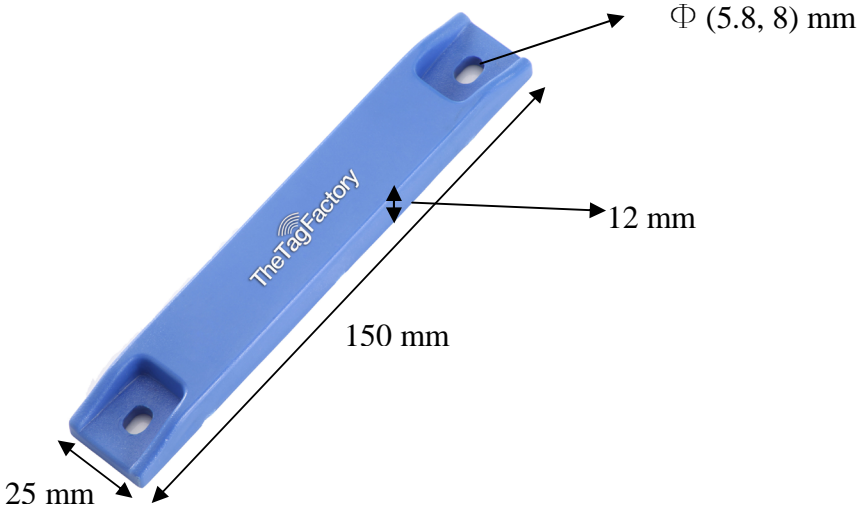
FEATURES

- M-Crown Tag is ATEX approved and thus can be used in potentially explosive atmosphere
- The tag is frequency independent and operates effectively with read range of over 15m when attached to metal.
- Rugged construction for high durability.
- Can be attached by screws with the help of two holes.
- Can also be provided with Adhesive tape for easy attachment.

APPLICATIONS

- Due to global frequency tuning and high read range, M-Crown can be effectively used in asset tracking, Ware house management, Containers and Railway Coaches identification in any part of the world irrespective of frequency used in country.
- Factory automation, Automotive & Security purpose.

| | | |
|------------------------------|---|------------------------------------|
| Chip Type: | Alien Higgs 3 EPC Class 1 Gen 2 | |
| | EPC 96 bit extendable up to 480 bits | |
| | User Memory 512 bit | |
| | Data retention of 50 years | |
| | Write endurance 100.000 cycles | |
| Mechanical: | Dimension | 150 x 25 x 12 mm |
| | Material | ABS |
| | Colour | Blue |
| | Weight | 25.8 g |
| Electrical: | Operating Frequency | 860-960 MHz |
| | Operating mode | Passive (battery-less transponder) |
| Ingress Protection: | IP67 | |
| Thermal: | Storage Temp. | -20°C to +70°C |
| | Operating Temp. | -20°C to +70°C |
| Part Number: | 315V2-Ex | |
| Atex Marking details: |  II 1 G, Ex ia IIC T5 Ga | |
| Options: | Available with: | |
| | Other IC type on request | |
| | Other plastic material and colours e.g. PC/ABS | |
| | Adhesive backing for easy mounting | |



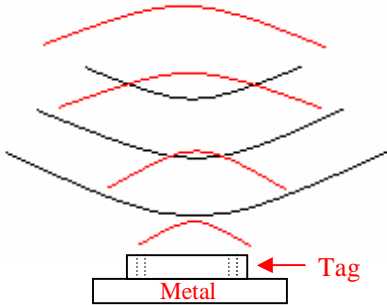
Tag Placement

- ✦ M-Crown is polarized perpendicular to TTF logo.
- ✦ Place the tag in such a way that most of its bottom area comes in direct contact with metal.
- ✦ Ensure that there is no hindrance between the tag and the reader antenna.
- ✦ Reader antenna should be parallel to the tag length as shown in below figure:

Correct way



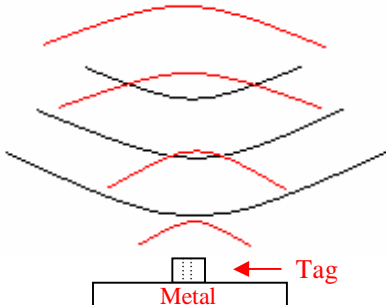
Antenna



Wrong way

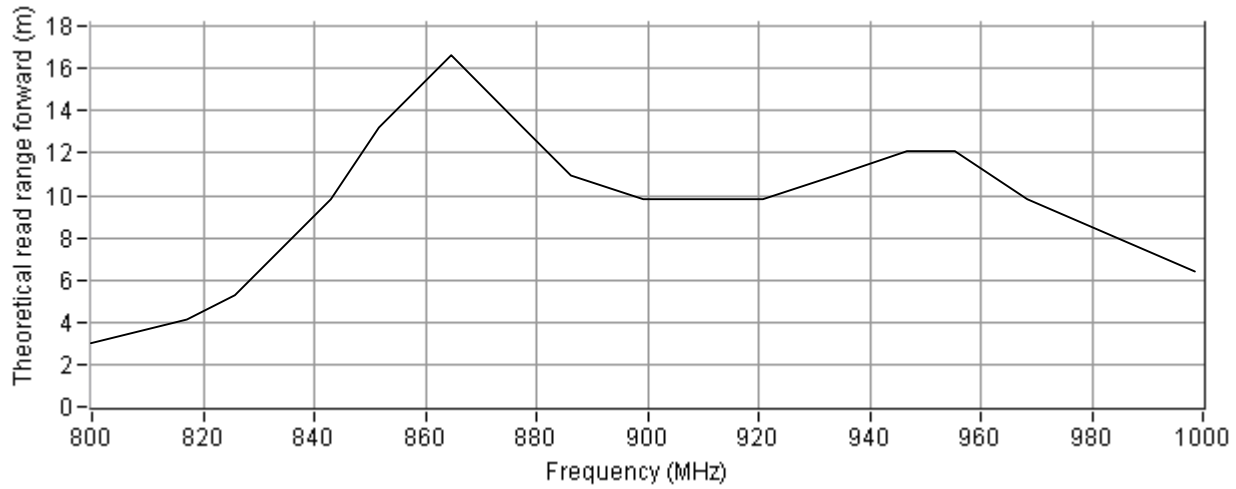


Antenna



- ✦ Tag can be attached either through screw M5/ Rivets / Adhesive tape.
- ✦ The distance between hole to hole is 126.5mm. Elliptical shape of hole provides flexible attachment of tag.

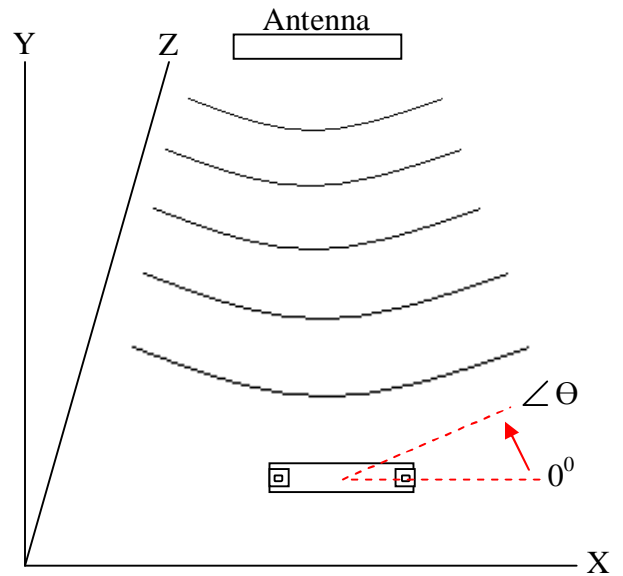
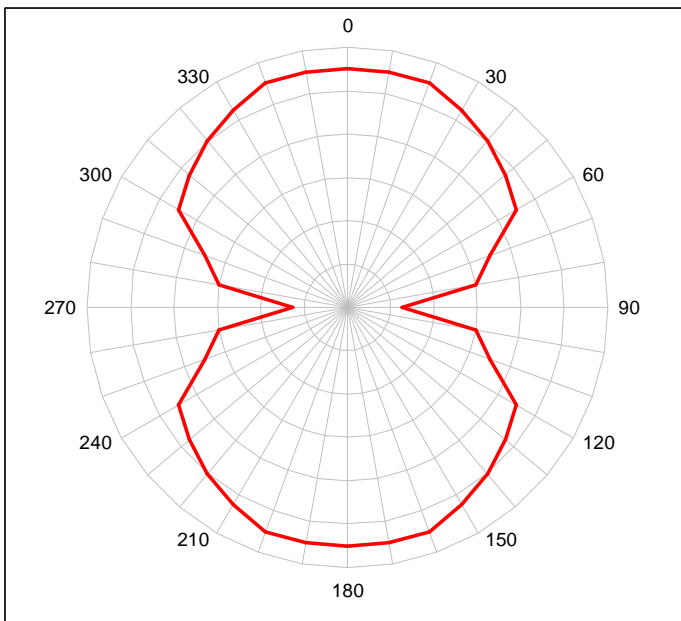
Frequency v/s Read Range Graph



Angular Sensitivity

M-Crown Tag Angular Sensitivity

(Relative Read Range vs. Orientation)



Tag is rotated in the X-Y plane about the z axis