

## Dot XXS



### Functional Specifications

RF air protocol	EPC Global Class1Gen 2; ISO18000-6C
Operational frequency	UHF 902-928 MHz (US); 866-868 MHz (EU)
IC type	Alien Higgs-3
Memory configuration	96-EPC bits; 512-bit user memory
Functionality	Read / write (user programmed)
Memory – expected read / write cycles	100,000 cycles at 77°F (25°C)
Data retention	Up to 50 years <sup>1</sup>
Read rate	400 tags per second for 96-EPC bit number
Warranty (limited)	1 year
Applicable surface	Metal surfaces
Mounting methods	Epoxy, embedded
Weight	0.006 oz (0.16 g)

### Performance Characteristics

Read range on metal (2W ERP) <sup>2</sup>	Up to 1.6 ft (0.5 m)
Polarization	Linear

### Physical Specifications

Material	Ceramic
Paint color	Black
Logo color	Green (US) Grey (EU)

<sup>1</sup> The chip data retention is based on chip operating under general environment conditions.

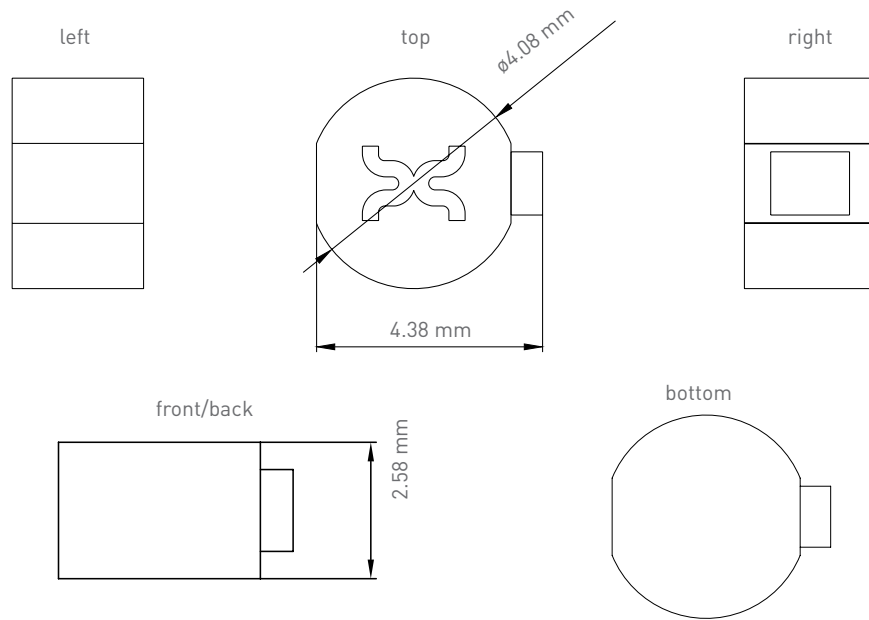
<sup>2</sup> Actual read range may vary based upon use case and attachment methods



**Environmental and Industry Compliance**

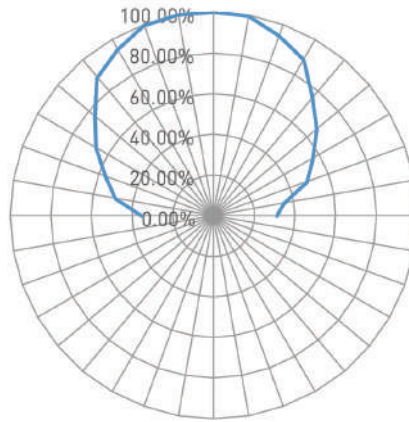
Compression strength	Packaging dependent
IP classification	IP68
Standard compliancy	RoHS (EU Directive 2002/95/EC) , CE (EU version)
Operational temperature	-40°F to +185°F (-40°C to +85°C)
Application temperature	-40°F to +302°F (-40°C to +150°C)
Humidity	
Operational humidity	5%-95% non-condensing
Storage humidity	5%-95% non-condensing

**Product Dimensions**



Dimensions (mm)	$\phi 4.08 \times 2.58$
tolerance	+/- 0.02
Dimensions (in)	$\phi 0.16 \times 0.10$
tolerance	+/- 0.008

## Radiation Pattern and Polarization



## Order information

X4302-US000-H3

Dot XXS US

X4302-EU000-H3

Dot XXS EU