

# AA3233-003

## Subway Rail Antenna

TransCore's AA3233-003 Subway Rail Antenna is a rugged, reliable 915 MHz antenna specifically designed for mounting between track rails.

Constructed for high shock and vibration environments, the IP65/68 rugged weatherproof enclosure provides protection from harsh environmental conditions encountered in railroad applications.

When paired with TransCore's AT5000-series transportation tags, the AA3233-003 Heavy Rail Antenna can read rail transponders at speeds up to 75 mph (120 km/h) and at close distances of approximately 18 to 35 inches (45 cm to 90 cm).



### Features

- ▶ Constructed for high shock and vibration environments
- ▶ IP65/68 weatherproof enclosure
- ▶ Corrosion and chemical resistant

### Applications

- ▶ Train positioning
- ▶ Rail Automatic Equipment Identification (AEI)

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## COMMUNICATIONS

### Frequency Range

902 to 928 MHz

### Gain (peak, near field)

10 dBi

### Polarization

Linear

### VSWR

<2.0:1

### Impedance

50 ohms nominal

### Beamwidth

E-Plane: 33°

H-Plane: 80°

## HARDWARE FEATURES

### Connectors

N-type female and jam nut connectors inside waterproof box

## PHYSICAL

### Dimensions

**Size:** 26.9 x 11.3 x 4.9 in (68.8 x 28.8 x 12.5 cm)

**Overall Length:** 34 in (85.4 cm)

### Junction Box Dimensions

**Size:** 6.1 x 5.3 x 2.2 in (15.5 x 13.5 x 5.6 cm) not including mounting flange

### Enclosure

IP65/68 at 1.1 m for 60 minutes

## ENVIRONMENTAL

### Operating Air Temperature

-40°F to +167°F (-40°C to 75°C)

### Humidity

100% condensing

### Vibration Tolerance

4 G<sub>RMS</sub> 5 to 1500 Hz, flat random spectrum

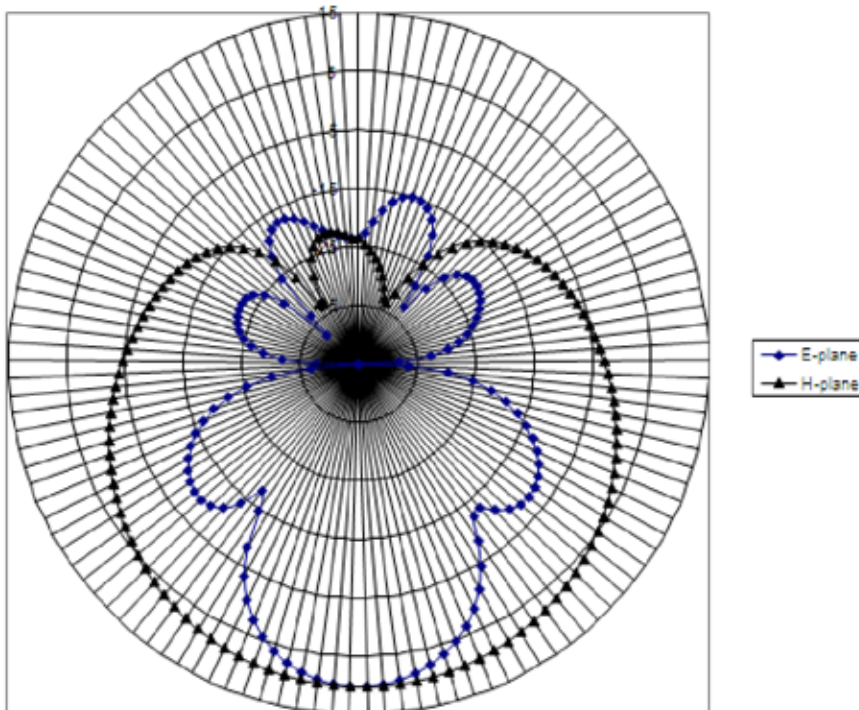
### Shock Tolerance

10 G zero to peak x 7 ms

Isolated from 100 G, high-frequency, wheel shocks

## MODEL PART NUMBERS

**12-3233-003** Subway Rail Antenna



Antenna Field Pattern

## For more information:

### Sales Support

800.923.4824

### Technical Support

505.856.8007

[transcore.com](http://transcore.com)

