

RFID systems for the UHF frequency range

Antennas SIMATIC RF600

SIMATIC RF640A, SIMATIC RF642A

Overview



The SIMATIC RF640A/RF642A are rugged and compact antennas for industrial applications in production and logistics.

- The SIMATIC RF640A is a universal antenna for numerous applications.
- The SIMATIC RF642A is, with its linear polarization, particularly suitable for severely metallic environments.

Both antennas can operate both in Europe and the USA (broadband) and with the UHF readers SIMATIC RF630R and RF670R.

Technical specifications

Antenna	SIMATIC RF640A	SIMATIC RF642A
Transmission frequency	865 ... 928 MHz	
Antenna gain	4 dBi	4.3 dBi
Impedance (nominal)	50 Ω	
Polarization	Circular	Linear
Approvals	ETSI EN 302208, CE, FCC, UL	
Connection	30 cm coax cable with reverse TNC coupling	
Ambient temperature		
• During operation	-25 ... +75 °C	
• During transportation and storage	-40 ... +85 °C	
Degree of protection according to EN 60529	IP65	
Type of construction		
Dimensions L x W x H (mm)	185 x 185 x 45	
Color	Pastel turquoise	
Weight	600 g	
Material	Plastic (PA12)	
Mounting	4 screws M4 Optional: Flexible mounting by antenna assembly kit	

Selection and ordering data

	Order No.
SIMATIC RF640A ▶	6GT2 812-0GA08
Circularly polarized antenna for UHF frequency 865 MHz to 928 MHz (ETSI, FCC)	
SIMATIC RF642A ▶	6GT2 812-1GA08
Linearly polarized antenna for UHF frequency 865 MHz to 928 MHz (ETSI, FCC)	
Accessories	
Note: To ensure proper functioning of the antennas, it is recommended that Siemens antenna cables are used.	

	Order No.
Antenna cable	
PE Material, UV-resistant, halogen-free, 50 Ω impedance, reverse TNC, UL certified	
Length 3 m, Ø 5 mm, attenuation 1 dB ▶ B	6GT2 815-0BH30
Length 10 m, Ø 5 mm, attenuation 4 dB ▶ B	6GT2 815-0BN10
Length 10 m, Ø 7.6 mm, attenuation 2 dB ▶ B	6GT2 815-1BN10
Length 20 m, Ø 7.6 mm, attenuation 4 dB ▶ B	6GT2 815-0BN20
Antenna mounting kit ▶ B	6GT2 890-0AA00
For flexible mounting with articulated bracket, VESA adapter 75 x 75 mm is supplied	

▶ Preferred type, available from stock.

B: Subject to export regulations AL = N and ECCN = EAR99H