0 dB Mobile GlassFix® Antenna for the 450 MHz Band

DESCRIPTION

- Half-wave, 0 dB mobile antenna for the 450 MHz band using the GlassFix® mounting principle.
- Mounting on car window glass – no holes required.
- Double-adhesion procedure ensures fast and reliable fixing.
- Internal matching unit feeds external antenna through window glass.
- Half-wave design – no ground plane required.
- High positioning gives performance equal to conventionally mounted car roof antenna.
- FME FastCabling system (cable to be ordered separately).
- Simple tuning procedure by means of tuning screw on matching unit.
- Easily removable whip for cleaning in car-washing machine.
- Swivel joint for 180° angle adjustment.
- If removal of antenna installation is necessary, a quick dismantling procedure leaves no trace of the installation.

NOTE

GF antennas are not suitable for car models with windows having heat reflective coating.



SPECIFICATIONS

Electrical	
Model	GF 401/...
Frequency	450 MHz band covered by three tunable models
Antenna Type	½ λ Mobile GlassFix®antenna
Max. Input Power	25 W
Polarisation	Vertical
Impedance	50 Ω
VSWR	≤ 1.3 @ f.res
Bandwidth	≥ 8 MHz @ VSWR ≤ 2.0 ≥ 15 MHz @ VSWR ≤ 3.0
Gain (EIA RS-329-1)	0 dB

Mechanical	
Materials	Whip: Stainless steel and black-chromed brass Mount and indoor unit: Weather- and shockproof plastics Corrosion-safe and corrosion-protected metals
Cable	FME-cable to be ordered separately
Colour	Black
Height	Approx. 280 mm / 11.02 in.
Weight	Approx. 0.065 kg / 0.14 lb
Mounting	On car windows with silicone glue (52 mm x 47 mm obstruction-free mounting area required)
Glass Thickness	2.5 - 7 mm / 0.10 - 0.28 in.

ORDERING

Model	Product No.	Frequency
GF 401/s	130001117	380 ... 410 MHz
GF 401/l	130001115	406 ... 440 MHz
GF 401/h	130000780	430 ... 470 MHz
Accessories FME-Cables		
1 m FME	130000437	
2 m FME	130000447	
3 m FME	130000457	
4 m FME	130000466	
5 m FME	130000474	
6 m FME	130000483	
4 m FME-white	110000064	
6 m FME-white	110000066	
12 m FME-white	110000068	
18 m FME-white	110000069	
Accessories FME-Connectors		
FME-FME	130000583	
FME-P (Prolongation)	130000565	
FME-N	130000571	
FME-FSMA (Female-SMA)	130000578	
FME-BNC	130000566	
FME-TNC	130000569	
FME-UHF	130000572	
FME-MUHF (Mini-UHF)	130000573	
FME-EMUHF (Elbow-MUHF)	130000582	
FME-EBNC (Elbow-BNC)	130000580	
FME-ETNC (Elbow-TNC)	130000581	
FME-SMA	130000577	

NOTE

For further information about other types of FME-cables and FME-connectors, please compare the cable and connector data sheets under accessories in our catalogue.

1. BEFORE INSTALLATION

- When selecting mounting location take into consideration: positions of back view mirror, wiper blade paths and defrosting wires (when mounting on rear window). The driver's view should not be obstructed.
- Max. allowed curvature of the glass surface on the mounting spot is 2 mm deflection per 100 mm length.
- Environmental- and car temperature must be above 15° C at installation and surfaces to be glued must be dry and clean.

2. INSTALLATION



Do not use sealer on rubber gasket or other places.

3. AFTER INSTALLATION

- Allow the silicone gluings to dry off 2 hours at a temperature above 15° C. To ensure full strength of the glue, it is recommended to keep the whip off the mount for 24 hours.

4. TUNING INSTRUCTIONS

- Insert a forward/reflection-type wattmeter between the transmitter and the antenna.
- Key the transmitter and observe the forward and the reflected power.
- Adjust the tuning screw on the matching unit until minimum returned power is obtained.

REINSTALLATION KIT

A reinstallation kit including all necessary parts for transfer of the antenna to another vehicle is available under order No. »GF-RK« (130000329).

WARING

SAFETY PRECAUTIONS

Antennas mounted on the windscreen may cause relatively high field strengths in the passenger cabin and near the dashboard.

1. To prevent health hazard due to RF radiation, persons must not closer than 30 cm to the antenna whip (transmitter output power to the matching unit: 20 W). (DIN 57 848).

2. The RF signals at the dashboard may cause interference in electronic equipment such as broadcast radio, computer automatics, braking systems, electronic ignition, relays etc. Some cars are more susceptible to disturbances than others. It is the responsibility of the installer to carry out a thorough check of the proper functioning under any conditions of such circuits before finishing installation.

The supplied silicone adhesive contains acetic acid and fungicides. Keep out of reach of children and dispose properly.

ASSEMBLY DETAILS

