

Omnidirectional Antennas Vertical Polarization

370...470

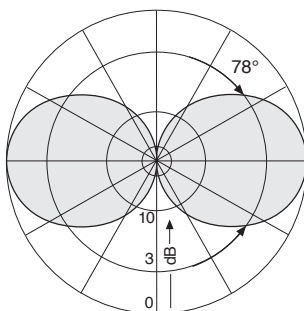
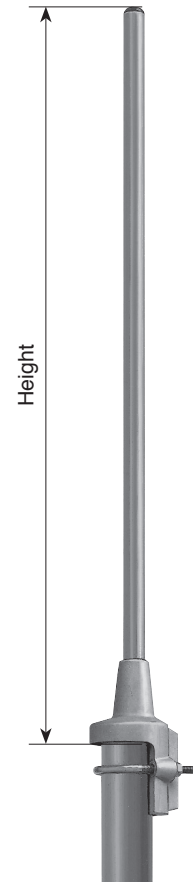
V

KATHREIN
Antennen · Electronic

737003: VPol Omni 370–430 360° 2dBi

K751121: VPol Omni 406–470 360° 2dBi

| Type No. | 737003 | K751121 |
|---|--|---------------|
| Frequency range | 370 – 430 MHz | 406 – 470 MHz |
| Polarization | Vertical | |
| Gain | 2 dBi | |
| Impedance | 50 Ω | |
| VSWR | 370 – 380 MHz: < 1.6 380 – 430 MHz: < 1.5 | < 1.5 |
| Intermodulation IM3 (2 x 37 dBm carrier) | < -150 dBc | |
| Max. power | 100 W (at 50 °C ambient temperature) | |



Vertical Pattern

| Mechanical specifications | 737003 | K751121 |
|---------------------------|--------------------|----------------|
| Input | N female | |
| Connector position | Bottom | |
| Weight | 1.0 kg | 0.8 kg |
| Radome diameter | 21 mm | |
| Wind load | 20 N (at 150 km/h) | |
| Max. wind velocity | 200 km/h | |
| Packing size [mm] | 112 x 97 x 654 | 112 x 97 x 614 |
| Height [mm] | 555 | 515 |

936.0377/g Subject to alteration.

Accessories (order separately)

| Type No. | Description | Remarks | Weight approx. | Units per antenna |
|----------|-----------------------|----------------------------|----------------|-------------------|
| K61335 | Side-mounting bracket | Mast: 40 – 105 mm diameter | 2.2 kg | 1 |

Mounting: The antenna can be attached in two ways with the supplied mounting kit:
 1. On the tip of a tubular mast of 40 – 54 mm diameter (connecting cable runs inside the mast).
 2. Laterally at the tip of a tubular mast of 20 – 54 mm diameter (connecting cable runs outside the mast).

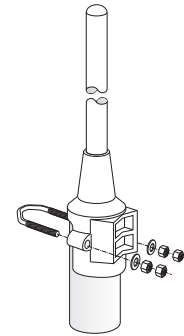
Material: **Radiator:** Brass. **Radome:** Fiberglass, color: Grey.
Base: Weather-proof aluminum.
Mounting kit, screws and nuts: Stainless steel.

Grounding: The inner conductor and the mounting kit are DC grounded.

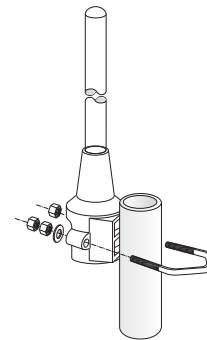
Environmental conditions: Kathrein cellular antennas are designed to operate under the environmental conditions as described in ETS 300 019-1-4 class 4.1 E.
 The antennas exceed this standard with regard to the following items:
 – Low temperature: –55 °C
 – High temperature (dry): +60 °C

Ice protection: Due to the very sturdy antenna construction and the protection of the radiating system by the radome, the antenna remains operational even under icy conditions.

Environmental tests: Kathrein antennas have passed environmental tests as recommended in ETS 300 019-2-4. The homogenous design of Kathrein's antenna families use identical modules and materials. Extensive tests have been performed on typical samples and modules.



On the tip



Laterally at the tip

Please note:

As a result of more stringent legal regulations and judgements regarding product liability, we are obliged to point out certain risks that may arise when products are used under extraordinary operating conditions.

The mechanical design is based on the environmental conditions as stipulated in ETS 300 019-1-4 and thereby respects the static mechanical load imposed on an antenna by wind at maximum velocity. Wind loads are calculated according to DIN 1055-4. Extraordinary operating conditions, such as heavy icing or exceptional dynamic stress (e.g. strain caused by oscillating support structures), may result in the breakage of an antenna or even cause it to fall to the ground. These facts must be considered during the site planning process.

The installation team must be properly qualified and also be familiar with the relevant national safety regulations.

The details given in our data sheets have to be followed carefully when installing the antennas and accessories.

The limits for the coupling torque of RF-connectors, recommended by the connector manufacturers must be obeyed.

Any previous datasheet issues have now become invalid.

