



## VHF/UHF Wideband End Fed Dipole Fiberglass Omnidirectional Antennas

Type WDTC is a wide band end-fed vertical dipole suitable for masthead mounting or stand-off mounting from a tower or mast. A high degree of decoupling from the support structure and the feeder cable is achieved without the use of groundplane rods.

The radiating elements are encapsulated in low-loss polyurethane foam which bonds them firmly to the inside of the radiator housing thus ensuring good mechanical stability. The antenna is fitted with a short length of URM67 coaxial cable terminated in a type N series plug.

### Features

- Unity gain
- Exceptional bandwidth
- Slim tapered design
- Integral mounting clamp
- Rugged glass fibre protection
- Digital PMR applications



# WDTC



### Technical Data

Maximum Power: 100 watts
Polarization: Vertical
Nominal Impedance: 50 ohms
VSWR: < 1.7:1 typical
Radiator Housing Diameter: 32 mm max OD
Radiator Housing: Green tapered glass fibre tube
Radiator Material: Copper
Lightning Protection: DC ground
Termination: N male (Other terminations available)
Feeder Tail: 3 ft (915 mm) URM67 coaxial cable
Mounting: Integral clamp mounts to a 32-51 mm pipe for in-line, offset or stand-off fixing
Integral clamp: Aluminium casting, stainless steel U-bolts and fasteners



## Antenna Electrical Specifications

Model	Frequency Band	Gain (Rel. 1/2 wave dipole)	Bandwidth	E-Plane Beamwidth (-3 dB)
WDTC70	70-83 MHz	Unity	15% typical	90° typical
WDTC75	72-85 MHz	Unity	15% typical	90° typical
WDTC80	75-88 MHz	Unity	15% typical	90° typical
WDTC130	116-138 MHz	Unity	15% typical	90° typical
WDTC150	136-160 MHz	Unity	15% typical	90° typical
WDTC160	145-175 MHz	Unity	15% typical	90° typical
WDTC260	240-279 MHz	Unity	15% typical	90° typical
WDTC410	370-440 MHz	Unity	15% typical	90° typical
WDTC440	400-480 MHz	Unity	15% typical	90° typical
WDTC480	430-530 MHz	Unity	15% typical	90° typical

## Mechanical Specifications

Model	Antenna Length	Weight (Mass)	Rated Wind Velocity	Windloading (kg) @ 193 km/h
WDTC70	8.63 ft (2630 mm)	2.65 lbs (1.2 kg)	119.925 mph (193 km/h)	18.1 lbs (8.2 kg)
WDTC75	8.63 ft (2630 mm)	2.65 lbs (1.2 kg)	119.925 mph (193 km/h)	18.1 lbs (8.2 kg)
WDTC80	8.63 ft (2630 mm)	2.65 lbs (1.2 kg)	119.925 mph (193 km/h)	18.1 lbs (8.2 kg)
WDTC130	6.07 ft (1850 mm)	2.20 lbs (1.0 kg)	119.925 mph (193 km/h)	15.0 lbs (6.8 kg)
WDTC150	4.79 ft (1460 mm)	1.87 lbs (0.85 kg)	119.925 mph (193 km/h)	13.49 lbs (6.1 kg)
WDTC160	4.79 ft (1460 mm)	1.87 lbs (0.85 kg)	119.925 mph (193 km/h)	13.49 lbs (6.1 kg)
WDTC260	2.82 ft (860 mm)	1.54 lbs (0.7 kg)	119.925 mph (193 km/h)	6.83 lbs (3.1 kg)
WDTC410	2.82 ft (860 mm)	1.54 lbs (0.7 kg)	119.925 mph (193 km/h)	6.83 lbs (3.1 kg)
WDTC440	2.82 ft (860 mm)	1.54 lbs (0.7 kg)	119.925 mph (193 km/h)	6.83 lbs (3.1 kg)
WDTC480	4.79 ft (1460 mm)	1.54 lbs (0.7 kg)	119.925 mph (193 km/h)	6.83 lbs (3.1 kg)