

Yagi Antenna With Reflector for Digital TV Gap-Filler Application

YR-575

518-630 MHz.

13 dBi. (11dBd) Gain

DESIGN FEATURES: Antenna Experts Digital TV Gap-Filler yagi antenna with reflector design reflects innovative modern antenna construction. The yagi with reflector is highly suitable for vertical polarized power repeater application and low-power horizontal polarized digital TV gap-filler application from channel 27-40. Wireless digital TV gap-filler (Re-emitter) provides effective solutions for blind zones and shadowy zones. Yagi with reflector is mainly used in expressways, railways, tunnels, country sides, homes, multi-stories buildings and elevators. The unique design of the yagi antenna feed which works as matching device to keep the VSWR low resulting in increased efficiency of the yagi with reflector. The mounting hardware supplied facilitates mounting on either vertical or horizontal members. The grid reflector supplied in two segments for easy of shipping and handling. The yagi with reflector is highly suitable where high front to back ratio and high side lobe suppression are required.

CONSTRUCTIONS: Radiating elements and grid reflector members are permanently welded to the support boom making it rigid and to withstand the high wind load. The complete YR-575 yagi antenna with reflector have been constructed in high quality 6063T6 ultra corrosion resistant architectural anodized aluminum alloys to prevent corrosion. The yagi antenna with reflector uses special feed which eliminates the use of folded dipole. The Yagi antenna with reflector is supplied with N termination fixed on the driven element. The grid reflector increases the front to back ratio and reduced the side lobe level. This directional yagi antenna comes factory tuned and does not require any field adjustment. The small surface area on the yagi antenna minimizes wind resistance and conserves tower loading capacity.



ELECTRICAL SPECIFICATIONS:

Frequency Range	518 - 630 MHz.
Gain @ Mid Band	13 dBi. (11 dBd.)
Bandwidth	Entire Band
Polarization	Vertical or Horizontal
Input Impedance	50 Ohms.
Radiation Pattern	Directional
Horizontal Beam-width –Half Power Points.	55 Degrees
Vertical Beam-width –Half Power Points.	45 Degrees
Front to Back Ratio	22 dB.
VSWR – equal to better than	2.0:1
RF Power Handling Capacity	250 Watts.
Input Termination	N-Female

MECHANICAL SPECIFICATIONS:

Antenna Materials	6063T6 Aluminum Alloy
Mounting Hardware -Materials	Marine Grade Stainless Steel
Gross Weight	5 Kgs.
Wind Rating	200 Km/Hr.
Overall Length	1.2 Meters.
Shipping Length	1.25 Meters.
Support Boom-Materials -Cross Section-Outer Diameter.	Aluminum - Square Tube - 25.4mm
Elements-Materials-Cross Section-Outer Diameter.	Aluminum - Round Rod – 12.7mm
Maximum Mount Pipe Diameter	52mm (2 Inches)

ENVIRONMENTAL SPECIFICATIONS:

Operating Temperature	(-)30 to +70 Degrees Celsius
Storage Temperature	(-)40 to +80 Degrees Celsius
Humidity	0 to 95% RH

Please contact us for further information like Azimuth radiation pattern and frequency Vs VSWR graph etc.

Note: All information contained in the datasheet is subject to change without any prior notice.