



380-500 MHz Panel antennas RAO-2U-60, RAO-2U-120, RAO-3U-120, RAO-4U-120

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RAO-2U-120



RAO-4U-120

Electrical specifications

Model	RAO-2U-60	RAO-2U-120	RAO-3U-120	RAO-4U-120
Operating frequency band, MHz	RAO-2UL-60 380-440 RAO-2UH-60 435-500	400-470	400-470	400-470
VSWR, not more than			1.5	
Gain, dBi	10	8	10.5	11
Sector in vertical plane , -3dB, ± 1°		36°	22°	17°
Sector in horizontal plane , -3dB, ± 5°	60°	120°	120°	120°
Impedance, Ohm			50	
Max. power input, W	500	400	400	400
Lightning protection			all-metal structure	

Mechanical specifications

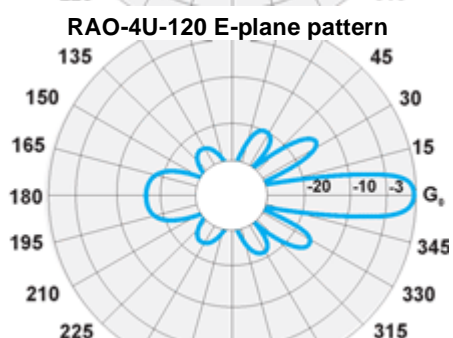
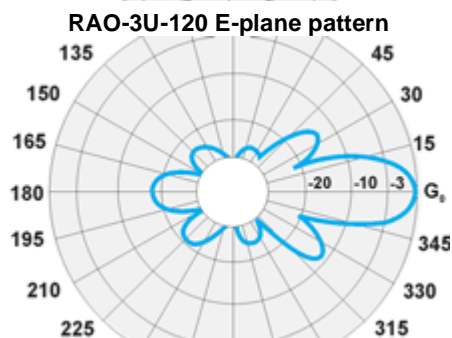
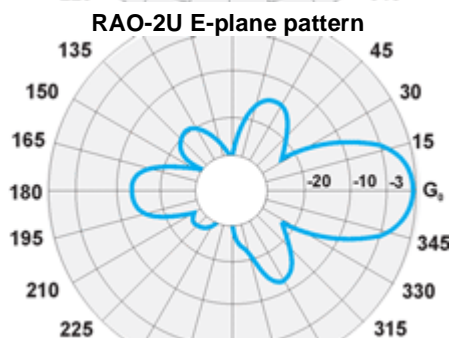
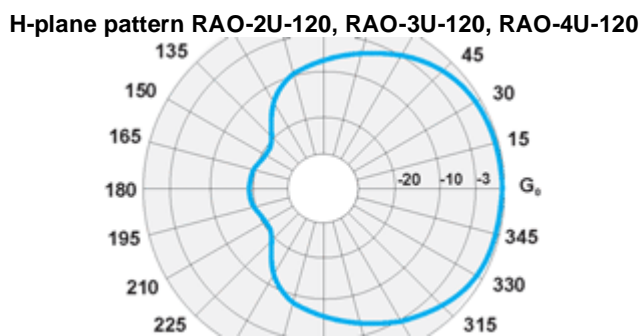
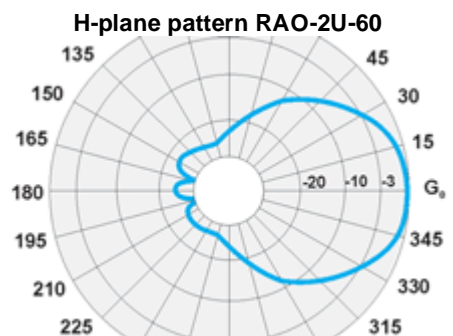
Model	RAO-2U-60	RAO-2U-120	RAO-3U-120	RAO-4U-120
Weight not more than , kg	9.5	7	11.7	15.6
Radiating unit construction material			aluminum	
Radome material			ABS	
Radome color			grey	
Standard mounting			to a 45-60 mm dia. tube	
Optional mounting			wall mount or frame side mount	
Rated wind velocity, m/s			40	

Wind loading area, m ²	0.8	0.46	0.64	0.84
Temperature range, °C			from -50 to +50	
Connector			7/16 DIN (N-female optional)	
Size, sm	80x113x26	41x113x26	41x155x26	41x205x26

RAO 2U Series antennas are designed for using as transceiving antennas in trunking multichannel systems supporting Tetra and MPT1327 standards, as well as in NMT 450 and CDMA 450 cellular systems. The antennas can be used both as stand-alone sector antennas in telecommunication systems operating in cellular-segmented service zones and as the components of circular antenna arrays. The antennas of this type are of great demand due to enhanced gain factor.

The RAO 2U antenna represents a phased array comprising two broad passband components with parallel feeding. Specific form of the reflector element provides the necessary radiation sectors (60° and 120°).

The panel antennas of this class favorably differ from the classical folded dipole antenna arrays in that they have guaranteed standard width of the directional diagram, enhanced backfire suppression, as well as high degree of rainfall protection due to high-quality fiberglass radiotransparent radome. Its special ABS coating provides reliable protection from solar ultraviolet radiation.



VSWR diagram, RAO-2UL-120, RAO-2UH-120

