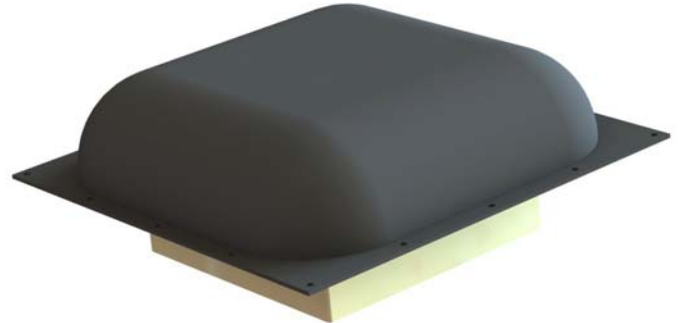




21-160-10
Semi Conformal Tuned
VHF/UHF Antenna
30 to 600 MHz

FEATURES

- **Ultra Low profile - less than 3" Height**
- **Digital (fast) Tuning for Frequency hopping**
- **Comparable SINGARS Gain to AS-3191**
- **UHF LOS gain +1dBi, includes EPLRS**
- **Designed to MIL-STD-810**
- **Separate Logic Converter Units available for latest generation Software Defined Radios as well as current ARC201, ARC210 and ARC231**



The 21-160-10 represents the latest in tuneable antenna technology and provides extremely wide bandwidth for Line of Sight (LOS) communications in an ultra low profile design.

Specially shaped radiating elements are tuned by a multiplicity of reactive components by high power p-i-n diodes which in turn are fast-tuned by digital command and thus compatible with latest frequency agile systems.

The antenna tuning modules are located in an aluminum cavity which recesses 3 inches below aircraft skin line and requires an 8 inch square cutout in the skin. The external portion of the antenna is less than 3 inches height and is environmentally sealed within a glass epoxy radome.

Digital tuning commands (20 lines) are provided by a separate logic converter unit that uses latest FPGA technology and can be interfaced with latest generation, wide band transceivers.

Cooper Antennas Ltd for non-USA customers
Thames Industrial Estate, Unit K, Fieldhouse Lane,
Buckinghamshire SL7 1TB, UK
Tel: +44 (0) 1628 482 360
Email: sales@cooperantennas.com
www.cooperantennas.com



Australian Representatives
ROJONE, PTY LTD.
Tel: 02 9829 1555
E: sales@rojone.com.au
www.rojone.com.au

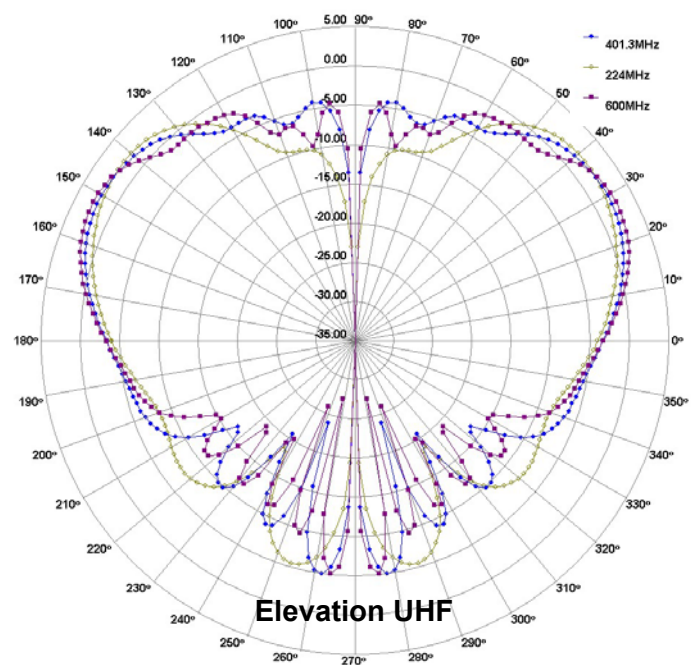
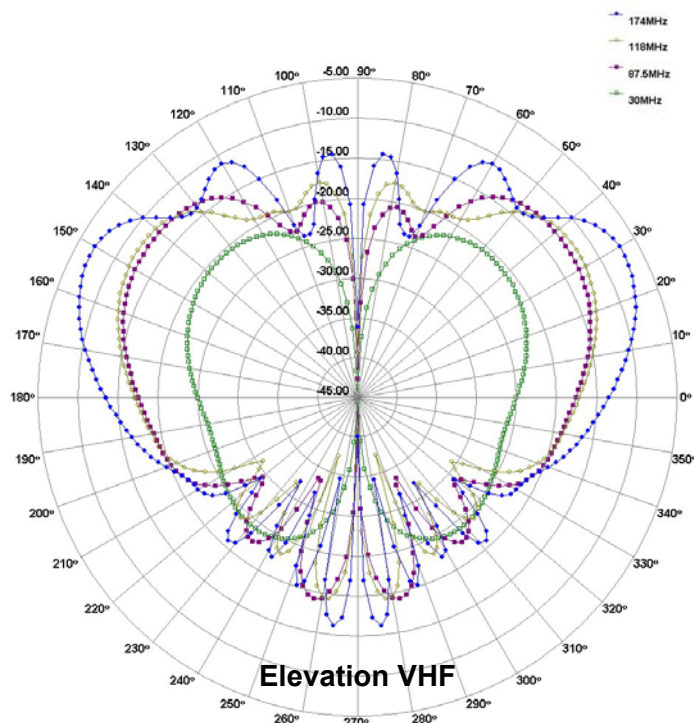
Cooper Antennas Ltd is Accredited to: ISO9001, AS9100, ISO14001 and MAA Approved

SPECIFICATIONS

Cooper Antennas Model 21-160-10 Semi Conformal Tuned VHF/UHF Antenna

ELECTRICAL

Frequency	30 - 600 MHz	
Gain	30MHz	-22.5dBi
	88MHz	-11dBi
	118-174MHz	-8dBi average
	225-600MHz	+1dBi average
VSWR	≤ 2.5:1	
Impedance (nominal)	50 Ohms	
Polarization	Vertical	
Radiation	Nominally omni-directional in azimuth, Elevation -see graph	
Power Handling	25 Watts CW VHF	
	50 Watts CW UHF	
Tuning Control	Via separate Logic Converter Unit (LCU) on 20 switch lines	
Power Supply	28V DC, 1A max. (via LCU)	
Tuning Time	60 μ seconds	



MECHANICAL

Dimensions	12 inches (309mm) x 12 (309mm) inches square + 0.5 inch (13mm)fixing flange	
Height (above skin)	2.9 inches (74mm)	
Depth (below skin)	3 inches (76mm)	
Weight	5lbs (2.7kg) max (antenna only)	
	2.2lbs 0.9kg max (LCU)	

FINISH

Urethane Lusterless Black
Other finish options are available.

**Note: Cooper Antennas Ltd has a policy of continuous product improvement and data herein is therefore subject to change.
Please check with Cooper Antennas Ltd that this data sheet is at latest issue before initiating contract activity.**