

LPH 30/24

APPLICATIONS

The LPH-30, and LPH-24 rotatable log periodic antennas provide excellent reliability in medium to long range HF communications circuits.

FEATURES

The rotatable LP has high gain, azimuth selection, high power capability and allows communications between a fixed station and mobile stations such as ships, aircraft, or tactical deployments.

CHARACTERISTICS

The antennas consist of tubular step-tapered aluminum elements and a horizontal aluminum boom supported atop a galvanized steel rotating mast. The twin-guyed galvanized steel towers restrain the mast laterally. A base-mounted rotator supports and rotates the mast and array. A rotary joint allows continuous rotation.

EQUIPMENT SUPPLIED

Array, mast, twin towers and guys, rotator remote control, rotary joint, anchors, and erection kit without winch.

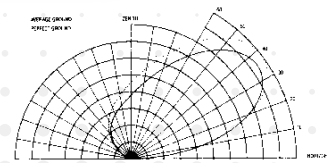
OPTIONAL EQUIPMENT

Obstruction lights, ladder climbing devices and winch. Coaxial cable, connector adapters and mating adapters. Computer controller with RS-232 interface.

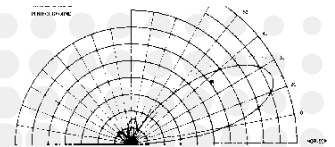
ROTATABLE

HORIZONTAL
POLARIZATION

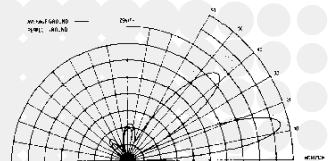
LOG PERIODIC



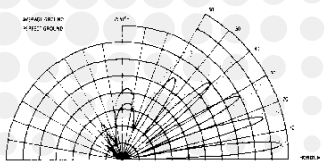
ELEVATION INTERPOLATION AT 20 MHz CURVES FOR AVERAGE AND PERFECT GROUND



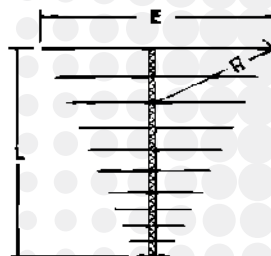
ELEVATION INTERPOLATION AT 10 MHz CURVES FOR AVERAGE AND PERFECT GROUND



ELEVATION INTERPOLATION AT 5 MHz CURVES FOR AVERAGE AND PERFECT GROUND



ELEVATION INTERPOLATION AT 3 MHz CURVES FOR AVERAGE AND PERFECT GROUND



SPECIFICATIONS

GAIN	13 dBi
BACK AND SIDE LOBE	20 dB nom, 14 dB min
POWER CAPABILITY	25 kW avg./50 kW PEP
INPUT IMPEDANCE	50 Ohms unbalanced
AZIMUTH BEAM WIDTH	Typically 65
VSWR	2:1 maximum
INPUT CONNECTOR	1-5/8" EIA
WIND LOADING	120 mph or 80 mph with 1/4" ice

MODEL

LPH-30

LPH-24

FREQUENCY RANGE	6-30 MHz	4-30 MHz
ROTATION SPEED	.5 rpm	.3 rpm
MAXIMUM HEIGHT (H)	87 ft	87 ft
BOOM LENGTH (L)	66 ft	116 ft
LONGEST ELEMENT (E)	82 ft	123 ft
TURNING RADIUS (R)	57 ft	72.5 ft
SHIPPING WEIGHT (lbs.)	9,000	14,000
SHIPPING VOLUME (cu. ft)	580	700
MILITARY NOMENCLATURE	-	AS-2978/GRC