# Product Data Sheet

1-855-276-(KPPA) 5772 or 780-702-7577 info@kpperformance.com

9850 W 190th St, Suite F, Mokena, IL 60448



## **KP-2DP33S-45**

#### 2.3 GHz to 2.7 GHz, 33 Degree Sector Antenna, 19.0 dBi, 2-Port, ±45 Slant

- Professional sector line with stable and high gain
- Interference mitigation with azimuth and elevation side-lobe suppression
- Ideal for 6-sector and 8-sector frequency-reuse one and two, respectively, with LTE equipment

### **Electrical Specification**

Frequency Band	MHz	2300—2500	2500—2700
Gain	dBi	18.5±0.25	19.0±0.25
Polarization		Slant (±45°)	Slant (±45°)
Horizontal HPBW	Degree	36±1	34±1
Horizontal Squint	Degree	±0.5	±0.5
Vertical HPBW	Degree	8.5±0.3	7.8±0.2
Electrical Downtilt	Degree	4	4
Front-to-Back Ratio @ 180°±30°	dB	35	30
Upper Side Lobe Suppression (+20°)	dB	16	15
Cross-polarization Ratio over HPBW	dB	14	15
VSWR		1.3 typ   1.5 max	1.3 typ   1.5 max
Return Loss	dB	17 typ   14 max	17 typ   14 max
Port-to-Port Isolation	dB	30	25
Max. Input Power per Port	W	50	50
Impedance	Ohms	50	50

#### **Mechanical Specifications**

RF Connector Type	N-Type Female
RF Connector Quantity	2
RF Connector Position	Bottom of radome
Electrical Grounding	RF connector grounded to reflector and mounting bracket
Radome Material	UV resistant PVC
Reflector Material	Anodized Aluminium
Ingress Protection	IP65 rain and dust resistant
Wind Load, frontal	343N @ 160km/h   77lbf @ 100mph
Max. Wind Speed	160km/h   100mph
Temperature Range	-40° to +60° C   -40° to +140° F

#### **Bracket Specifications**

Material Type	Powder Coated High-Strength Aluminium
Mechanical Tilt (Degree)	-1 to +11 (Slot A)   -3 to +7 (Slot B)
Mounting Type	Pipe Mount
Mounting pole diameter	19 mm – 114 mm   0.75 in – 4.5 in
Antenna-to-Pipe Distance	121 mm   4.8 in
Bracket-to-Bracket Distance	808 mm   31.8 in

# **Product Data Sheet**

1-855-276-(KPPA) 5772 or 780-702-7577 info@kpperformance.com

9850 W 190th St, Suite F, Mokena, IL 60448



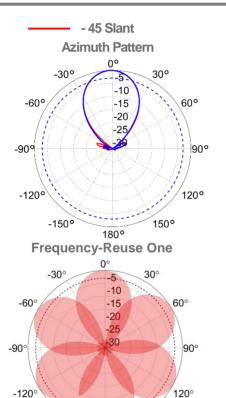
**Sector Dimensions** 

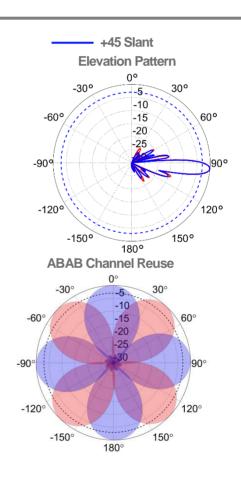
Length	918 mm   36.1 in
Width	286 mm   11.3 in
Height	131 mm   5.2 in
Net Weight, with brackets	9.4 kg   20.7 lb

#### **Shipping Dimensions**

Length	1200 mm   47.2 in
Width	320 mm   12.6 in
Height	180 mm   7.1 in
Net Weight, with brackets	9.5 kg   20.9 lb

### **Graphical Data**





#### **Appendix**

HPBW: Average and variation of the antenna's 3dB beamwidth (half power beamwidth) in its horizontal (Azimuth) or vertical (Elevation) pattern. Horizontal Squint: Angle in the antenna's azimuth pattern in which the maximum gain occurs. Reported is the maximum variation in the frequency band. Electrical Downtilt: Angle in the antenna's elevation pattern in which the maximum gain occurs.

Gain: Antenna's average gain and variation in each frequency band.

-150°

Front to Back Ratio @ 180°±30°: Difference between the antenna's maximum gain and the maximum gain in the antenna's back lobe over ±30° angles. Upper Side Lobe Suppression: The maximum value for the antenna's elevation upper side lobes from the main beam to +20°.

Cross-polarization Ratio over HPBW (dB): Maximum difference between the co-polarization and cross-polarization gain across the sector's HPBW.

150°

180