

NNV4-65B-R6



12-port sector antenna, 4x 694–896 and 8x 1695–2690 MHz, 65° HPBW, 6x RET

- Uses the 4.3-10 connector which is 40 percent smaller than the 7-16 DIN connector
- Supports re-configurable antenna sharing capability enabling control of the internal RET system using up to two separate RET compatible OEM radios
- All internal RET actuators are connected in “Cascaded MRET” configuration

This product will be discontinued on: December 31, 2025

General Specifications

Antenna Type	Sector
Band	Multiband
Grounding Type	RF connector inner conductor and body grounded to reflector and mounting bracket
Performance Note	Outdoor usage Wind loading figures are validated by wind tunnel measurements described in white paper WP-112534-EN
Radome Material	Fiberglass, UV resistant
Radiator Material	Low loss circuit board
Reflector Material	Aluminum
RF Connector Interface	4.3-10 Female
RF Connector Location	Bottom
RF Connector Quantity, high band	8
RF Connector Quantity, mid band	0
RF Connector Quantity, low band	4
RF Connector Quantity, total	12

Remote Electrical Tilt (RET) Information

RET Hardware	CommRET v2
RET Interface	8-pin DIN Female 8-pin DIN Male
RET Interface, quantity	2 female 2 male
Input Voltage	10–30 Vdc
Internal RET	High band (4) Low band (2)

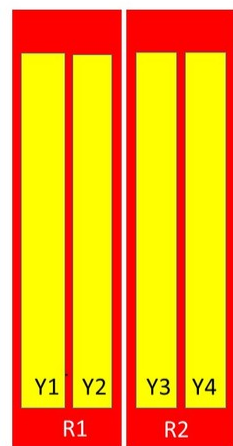
NNV4-65B-R6

Power Consumption, idle state, maximum	1 W
Power Consumption, normal conditions, maximum	8 W
Protocol	3GPP/AISG 2.0 (Multi-RET)

Dimensions

Width	498 mm 19.606 in
Depth	197 mm 7.756 in
Length	1848 mm 72.756 in
Net Weight, without mounting kit	37.8 kg 83.335 lb

Array Layout



Left Right
Bottom

Array	Freq (MHz)	Conns	RET (MRET)	AISG RET UID
R1	694-896	1-2	1	CPxxxxxxxxxxxxxxxxmm.1
R2	694-896	3-4	2	CPxxxxxxxxxxxxxxxxmm.2
Y1	1695-2690	5-6	3	CPxxxxxxxxxxxxxxxxmm.3
Y2	1695-2690	7-8	4	CPxxxxxxxxxxxxxxxxmm.4
Y3	1695-2690	9-10	5	CPxxxxxxxxxxxxxxxxmm.5
Y4	1695-2690	11-12	6	CPxxxxxxxxxxxxxxxxmm.6

(Sizes of colored boxes are not true depictions of array sizes)

Port Configuration

NNV4-65B-R6



Electrical Specifications

Impedance	50 ohm
Operating Frequency Band	1695 – 2690 MHz 694 – 896 MHz
Polarization	±45°
Total Input Power, maximum	900 W @ 50 °C

Electrical Specifications

Frequency Band, MHz	694–806	806–896	1695–1880	1850–1990	1920–2180	2300–2500	2500–2690
Gain, dBi	14.3	14.9	16.9	17.5	18.1	18.5	18.3
Beamwidth, Horizontal, degrees	68	64	71	67	62	59	59
Beamwidth, Vertical, degrees	11.4	10.2	6.9	6.5	6.1	5.2	4.9
Beam Tilt, degrees	2–14	2–14	2–12	2–12	2–12	2–12	2–12
USLS (First Lobe), dB	16	18	16	19	20	19	20
Front-to-Back Ratio at 180°, dB	31	30	33	35	34	32	29
Isolation, Cross Polarization, dB	25	25	25	25	25	25	25
Isolation, Inter-band, dB	25	25	25	25	25	25	25
VSWR Return loss, dB	1.5 14.0	1.5 14.0	1.5 14.0	1.5 14.0	1.5 14.0	1.5 14.0	1.5 14.0

NNV4-65B-R6

PIM, 3rd Order, 2 x 20 W, dBc	-150	-150	-150	-150	-150	-150	-150
Input Power per Port at 50°C, maximum, watts	300	300	300	250	250	200	250

Mechanical Specifications

Mechanical Tilt Range	0°–17°
Wind Loading @ Velocity, frontal	694.0 N @ 150 km/h (156.0 lbf @ 150 km/h)
Wind Loading @ Velocity, lateral	235.0 N @ 150 km/h (52.8 lbf @ 150 km/h)
Wind Loading @ Velocity, maximum	900.0 N @ 150 km/h (202.3 lbf @ 150 km/h)
Wind Loading @ Velocity, rear	571.0 N @ 150 km/h (128.4 lbf @ 150 km/h)
Wind Speed, maximum	241 km/h (150 mph)

Packaging and Weights

Width, packed	608 mm 23.937 in
Depth, packed	352 mm 13.858 in
Length, packed	2030 mm 79.921 in
Weight, gross	53.1 kg 117.065 lb

Regulatory Compliance/Certifications

Agency	Classification
CHINA-ROHS	Above maximum concentration value
ISO 9001:2015	Designed, manufactured and/or distributed under this quality management system
ROHS	Compliant/Exempted
UK-ROHS	Compliant/Exempted



Included Products

BSAMNT-3	–	Wide Profile Antenna Downtilt Mounting Kit for 2.4 - 4.5 in (60 - 115 mm) OD round members. Kit contains one scissor top bracket set and one bottom bracket set.
----------	---	--

* Footnotes

Performance Note	Severe environmental conditions may degrade optimum performance
-------------------------	---