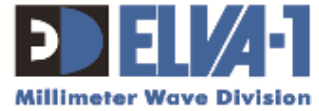


PPC-1000-LL LOW LATENCY RADIO



FOR FREQUENCY BANDS
71-76/81-86 GHZ
40.5-43.5 GHZ
37.0-40.0 GHZ



PRODUCT SPECIFICATIONS 1 Gigabit Ethernet Wireless Link

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PRODUCT SPECIFICATIONS

Tx / Rx Specs

| Model | PPC-1000-E/LL | PPC-1000-Q/LL | PPC-1000-Ka/LL |
|---------------------------------------|--|--|--|
| Frequency range | 71-76/81-86 GHz (E-band) 74-76/84-86 GHz for Czech Republic | 40.5-43.5 GHz (Q-band) | 37.0-40.0 GHz (Ka-band) |
| Throughput | 1000 Mbps Full duplex | 1000 Mbps Full duplex | 1000 Mbps Full duplex |
| Latency | 45 ns from SFP socket to antenna port (on one ODU) | | |
| Channel Bandwidth | 1250 MHz | | |
| Modulation | QPSK | | |
| MTBF | 150 000 hours | | |
| Max Distance * | up to 20.0 km (12.4 miles) with 2ft antennas at clear sky | up to 35.0 km (21.7 miles) with 3ft antennas at clear sky | up to 35.0 km (21.7 miles) with 3ft antennas at clear sky |
| Max output power | +25 dBm (315 mW) | +27 dBm (500 mW) | +27 dBm (500 mW) |
| Rx Sensitivity @ 10 ⁻⁹ BER | -64 dBm | -65 dBm | -65 dBm |
| System Gain | 89 dB | 92 dB | 92 dB |
| Management | SNMP v.2; MIB-II and Enterprise MIB; WEB; CLI; Telnet | | |
| Ethernet Interface | 1 × SFP slot (1000Base-X) | | |
| Management Port | 100 Base-Tx (RJ – 45) | | |
| Forward Error Correction | n/a | | |
| Polarization | Vertical / Horizontal | | |

Antenna

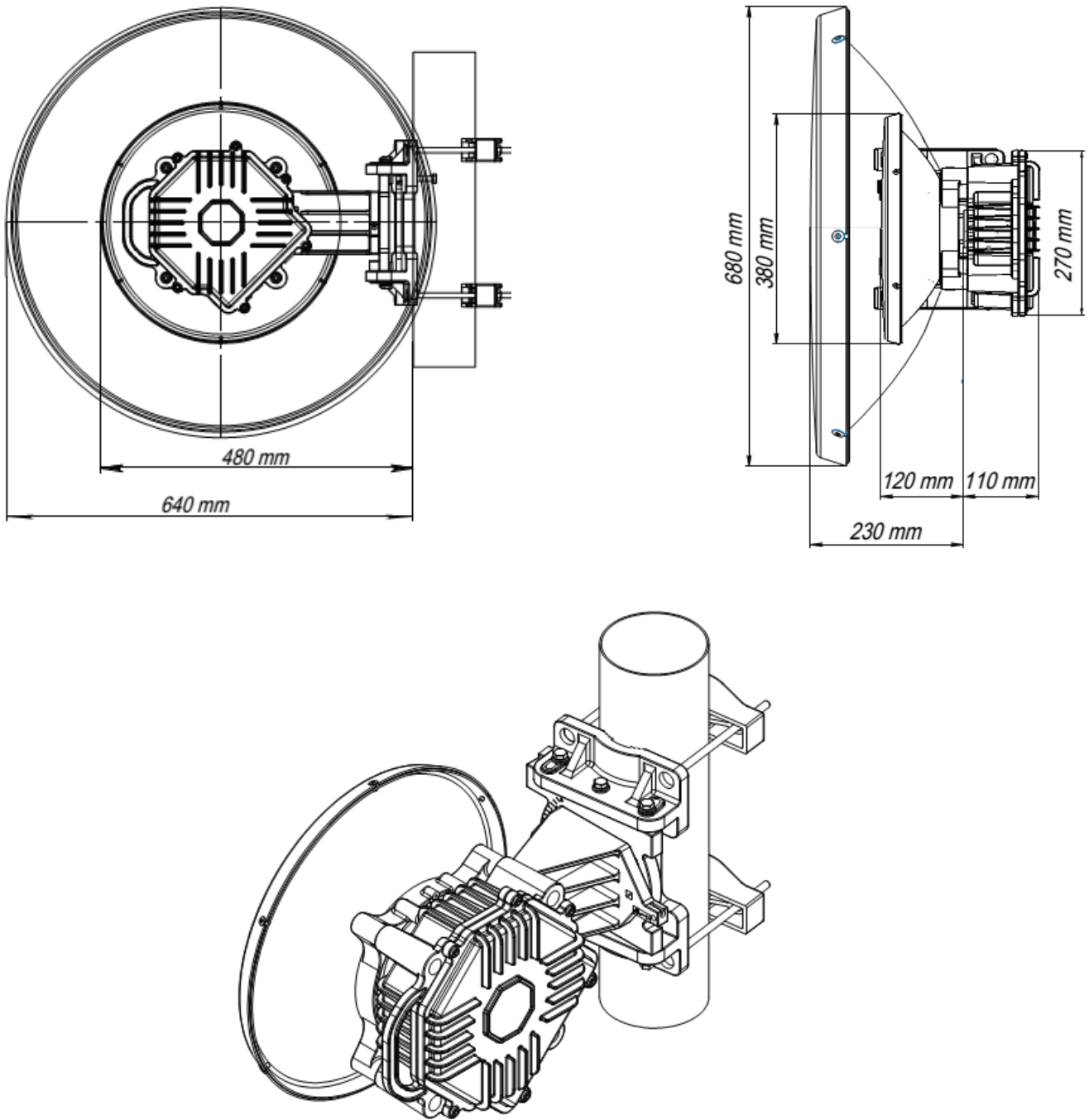
| Antenna Type | Cassegrain type antenna with radio-transparent radome | | |
|--|---|------------------------|-------------------------|
| Antenna Gain/Beamwidth for frequency band: | 71-76/81-86 GHz (E-band) | 40.5-43.5 GHz (Q-band) | 37.0-40.0 GHz (Ka-band) |
| 1ft antenna | 45 dB/0.7° | 38 dB/1.5° | 38 dB/1.5° |
| 2ft antenna | 51 dB/0.35° | 44 dB/0.7° | 44 dB/0.7° |
| 3ft antenna | n/a | 47 dB/0.5° | 47 dB/0.5° |

Power / Environment

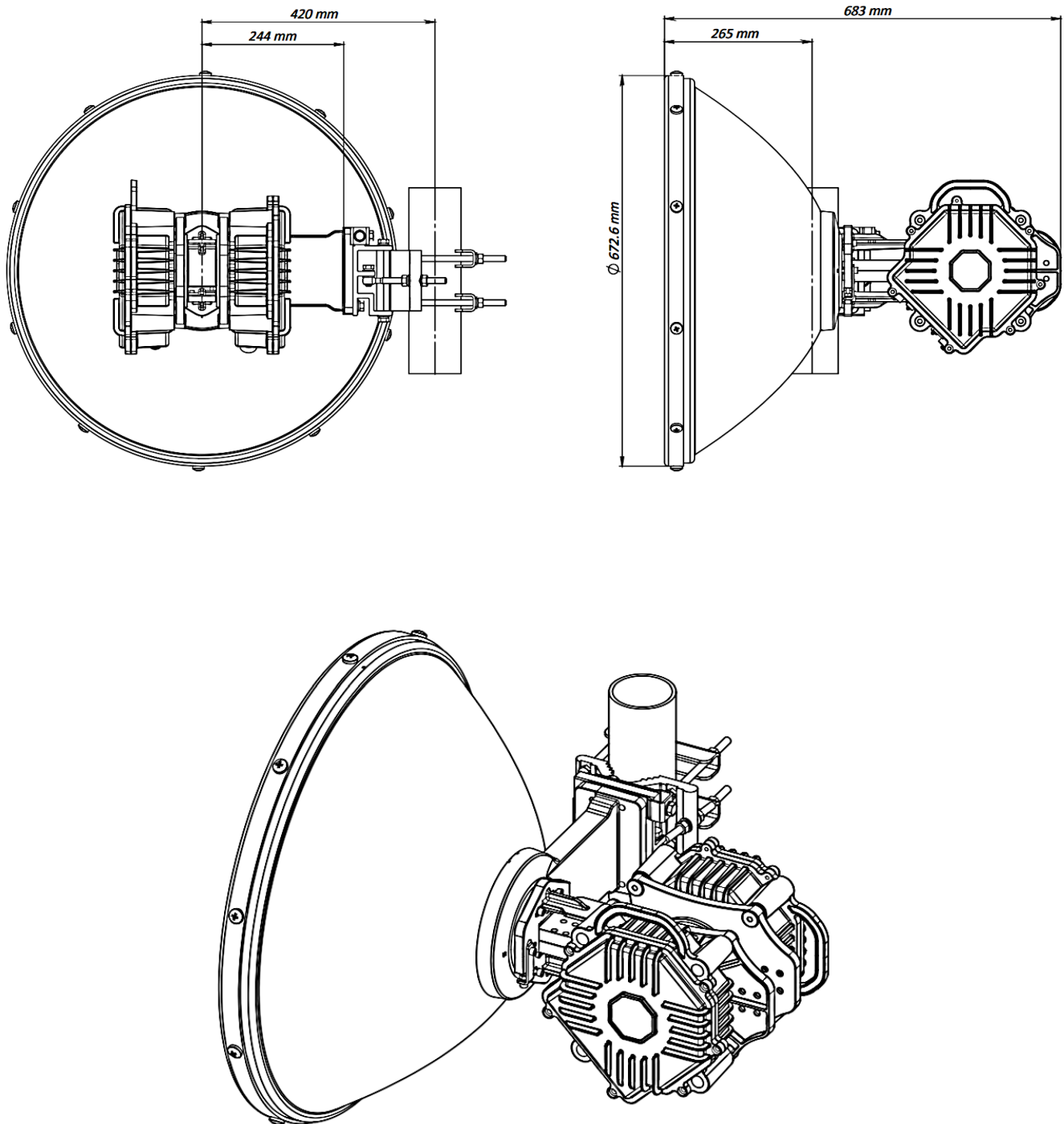
| | |
|-------------------------|---|
| Power Supply AC | Input 88-132 / 176-264 Volts, 50/60 Hz |
| Power Consumption | 45 W (60 W when heater is switched on) per radio |
| DC Power | 36 to 60 Volts DC |
| Power Connection | IP-67 |
| Operational Temperature | -50°C to +60°C / -58°F to 140°F |
| Humidity | Up to 100% |

* For actual max distance in your climate conditions, frequency band and antenna size please use ELVA-1 Link Budget Calculator <http://linkbudgetcalc.elva-1.com/>

1.1 E-BAND PPC-1000-LL DRAWING WITH 1FT AND 2 FT ANTENNAS



1.2 Q-BAND AND KA-BAND PPC-1000-LL DRAWING WITH 2 FT ANTENNA



End of document

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