About Proxim Wireless

Proxim Wireless is a pioneer and global leader in advanced Wi-Fi, point to point, and point to multipoint outdoor wireless systems that deliver high performance and high availability communications.

With over 30 years of wireless experience, Proxim is recognized for its unparalleled reliability, superior performance and drive for innovation.

Fast and Flexible Backhaul Solutions

The Tsunami Quickbridge® 10100 series delivers high bandwidth backhaul with carrier class reliability in even the toughest of conditions.

Perfectly suited for the service provider or enterprise that needs to connect critical applications and services to the data center or the world.

The range of high-power, integrated and external antenna models provide the flexibility to design a backhaul link that will meet the most stringent criteria.

The Tsunami® Quickbridge® 10100 supports the following key features that are critical for carriers, wireless service providers and Government organizations that need to know they can rely on the network.

Rugged and Reliable

Designed for harsh environments, the Tsunami® QuickBridge® 10100 is fully IP67 rated, and will deliver years of reliable service in conditions that include, high winds, high salt, and high temperature extremes.

Highlights

• Service flow based QoS with deep packet inspection (DPI) to ensure that the most important data arrives with priority
• Very low latency enables support for time critical applications
• Operates in unlicensed bands from 4.900 to 5.925 GHz
• Flexible RF planning with 20, 40 and 80 MHz channel size
• Non Line-of-Sight capability provided by Advanced Orthogonal Frequency Division Multiplexing (OFDM) along with 2x2 MIMO eases deployment in challenging areas
• Deployment tools include spectrum analyzer, antenna alignment and remote management configuration
• Fully integrates within ProximVision® Advanced Carrier Management System.

Enabling Technologies

Proxim WORP®
Combines network access control, data scheduling, advanced QoS and encryption to ensure highly efficient and secure data transmission.

Proxim ClearConnect™
A suite of interference mitigation technologies ensuring robust and reliable communications in high-density wireless deployments.
## Specifications

<table>
<thead>
<tr>
<th>PRODUCT MODELS</th>
<th>PART NUMBERS</th>
</tr>
</thead>
<tbody>
<tr>
<td>QB-10100-LNK</td>
<td>902-00769 QB-10100-LNK-US</td>
</tr>
<tr>
<td>QB-10150-LNK</td>
<td>902-00771 QB-10150-LNK-US</td>
</tr>
<tr>
<td>QB-10150-LKL</td>
<td>902-00775 QB-10150-LNK-WD</td>
</tr>
<tr>
<td>QB-10150-LKL-U</td>
<td>902-00779 QB-10150-LKL-US</td>
</tr>
<tr>
<td>QB-10150-LKL-WD</td>
<td>902-00780 QB-10150-LKL-WD</td>
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</tbody>
</table>

### Interfaces

**Wired Ethernet**
- Two auto MDI-X RJ45 10/100/1000Mbps Ethernet (Port #1 with PoE in & Data, Port #2 with PoE out & Data)

**Wireless Protocol**
- WORP® (Wireless Outdoor Router Protocol)

### Radio & TX Specs

- **MIMO**: 2x2
- **Modulation**: OFDM with BPSK, QPSK, QAM16, QAM64, QAM256
- **Frequency**: 4.900 – 5.925 GHz (Subject to Country Regulations)
- **Channel Size**: 80 MHz, 40 MHz and 20 MHz (+50ppm channel accuracy)
- **Data Rate**: MCS 0 to 9 with Dynamic Data Rate Selection
- **TX Power**: Up to 28 dBm (dual chain)
- **TX Power Control**: 0 – 27 dB, in 1 dB steps. Automatic TPC with configurable EIRP limit

<table>
<thead>
<tr>
<th>Frequency</th>
<th>TX Power (80 MHz)</th>
<th>TX Power (40 MHz)</th>
<th>TX Power (20 MHz)</th>
</tr>
</thead>
<tbody>
<tr>
<td>80 MHz</td>
<td>MCS0: 28</td>
<td>MCS0: 28</td>
<td>MCS0: 29</td>
</tr>
<tr>
<td></td>
<td>MCS9: 21</td>
<td>MCS9: 22</td>
<td>MCS9: 25</td>
</tr>
<tr>
<td>40 MHz</td>
<td>MCS0: -89</td>
<td>MCS0: -93</td>
<td>MCS0: -94</td>
</tr>
<tr>
<td></td>
<td>MCS9: -68</td>
<td>MCS9: -71</td>
<td>MCS9: -74</td>
</tr>
</tbody>
</table>

### Throughput
- Up to 633 Mbps (80 MHz)
- Up to 324 Mbps (40 MHz)
- Up to 137 Mbps (20 MHz)

### Other
- Dynamic Channel Selection (DCS) based on interference detection
- Dynamic Frequency Selection (DFS) based on radar signature
- Automatic Transmit Power Control (ATPC) with EIRP limit support

### Antenna

- **QB-10100-EPA**: Two N-type Connectors with built-in Surge Protection, Integrated 2x2 MIMO 22dBi Dual Polarized 1 foot Panel Antenna
- **QB-10150-EP**: Two N-type Connectors with built-in Surge Protection, Integrated 2x2 MIMO 28dBi Dual Polarized 2 feet Panel Antenna
- **QB-10150-EP**: Two N-type Connectors with built-in Surge Protection, Integrated 2x2 MIMO 28dBi Dual Polarized 2 feet Panel Antenna

### Management

- **SNMP**
- Telnet and SSH, Web GUI and SSL/TLS, TFTP, SNMPv3
- Syslog, sFlow™ agent, SNTP and local time, Spectrum analyzer

### Synchronization

- Pass-through IEEE 1588v2 Ethernet Synchronization

### Security

- **Encryption**: AES 128
- **Authentication**: Internal MAC Address Control List, Radius based Authentication (with VLAN and GoS provisioning)
- **QoS**: Asymmetric Bandwidth Control, Packet Classification, Capabilities Scheduling
- **Capabilities Scheduling**: Asymmetric UL/DL committed and maximum information rate per service flow
- **Asymmetric UL/DL**: 802.1p priority, IPTOS, VLAN ID, IP addresses, ports, Ethernet addresses, IP protocol, and EtherType
- **Scheduling**: Best Effort, Real Time Polling Services

### Network

- **Modes**: Bridging (support LACP through external switches), Routing (RIP v2 and IP tunneling)
- **IP Stack**: IPv4 and IPv6 simultaneously
- **Gateways**: DHCP Server & relay, NAT with Std ALGs, PPPoe end point with Proxy DNS
- **VLAN**: 802.1Q: Management VLAN, Transparent, Access, Trunk and Mixed mode. QinQ double tagging

### Power

<table>
<thead>
<tr>
<th>Input</th>
<th>Output</th>
</tr>
</thead>
<tbody>
<tr>
<td>36 to 57 VDC</td>
<td>48 to 57 VDC – 25 Watt on Ethernet port2 (PoE – software controlled)</td>
</tr>
<tr>
<td>12 VDC via Access port</td>
<td>12 VDC on Access port</td>
</tr>
</tbody>
</table>
**POWER CONSUMPTION**

<table>
<thead>
<tr>
<th>OPERATING TEMPERATURE</th>
<th>STORAGE TEMPERATURE</th>
<th>HUMIDITY - IP RATING</th>
<th>WIND LOADING</th>
</tr>
</thead>
<tbody>
<tr>
<td>-40º to 60ºC (-40º to 140º Fahrenheit)</td>
<td>-50º to 70ºC (-58º to 158º Fahrenheit)</td>
<td>100% relative humidity - IP67</td>
<td>QB-101x0-EPA/EPR - 200 km/h (125 mph)</td>
</tr>
<tr>
<td>QB-10150-EPL - 180 km/h (112.5 mph)</td>
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**PHYSICAL SPECS**

<table>
<thead>
<tr>
<th>DIMENSIONS PACKAGED</th>
<th>DIMENSIONS UNPACKAGED</th>
<th>WEIGHT (PACKAGED)</th>
<th>WEIGHT (UNPACKAGED)</th>
</tr>
</thead>
<tbody>
<tr>
<td>QB-10100-EPA</td>
<td>14.56 x 13.0 x 7.87 in (370 x 331 x 200 mm)</td>
<td>9.84 x 8.66 x 2.83 in (250 x 220 x 72 mm)</td>
<td>9.92 lbs (4.5 kg)</td>
</tr>
<tr>
<td>QB-10150-EPR</td>
<td>14.56 x 13.0 x 7.87 in (370 x 331 x 200 mm)</td>
<td>12 x 12 x 3.40 in (305 x 305 x 85 mm)</td>
<td>10.91 lbs (4.95 kg)</td>
</tr>
<tr>
<td>QB-10150-EPL</td>
<td>27.55 x 6.85 x 27.55 in (700 x 174 x 700 mm)</td>
<td>23.62 x 23.62 x 3.85 in (600 x 600 x 92 mm)</td>
<td>23.15 lbs (10.5 kg)</td>
</tr>
</tbody>
</table>

**SAFETY STANDARDS**

UL 60950, CAN/CSA-C22.2 No. 60950, IEC 60950, EN 60950 (part -1 and -2)

**CERTIFICATIONS**

USA: FCC 90Y + 15E (UNII 15.247), Canada: IC RSS 102 + RSS 111 + RSS 247
Europe: RED EN 301 489-1 + EN 301-489-17 + EN 301 893 + EN 302 502

**PACKAGE CONTENTS**

- One Tsunami® QB-10100-LNK with two N-type surge protected connectors (Two QB-10100-EPA)
  Or One Tsunami® QB-10150-LNK with integrated 22 dBi dual polarized antenna (Two QB-10150-EPR)
  Or One Tsunami® QB-10150-LKL with integrated 28 dBi dual polarized antenna (Two QB-10150-EPL)
- Two power injector and country specific power cord
- Two Connector weatherproofing kit (Includes all recommended weatherproofing material)
- Two Wall / Pole mounting kit
- Two Antenna alignment (RJ11) dongle
- Two Grounding kit
- Two Quick Installation Guide

**MTBF & WARRANTY**

MTBF over 250 000 hours & 2-year warranty with ServPak Extended Support available.