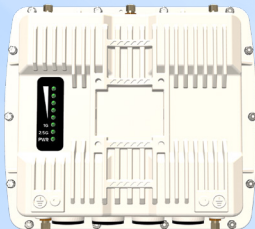


# Stratum<sup>®</sup> X5 - 6GHz



## Product Snapshot

The Stratum X5 is a high-capacity 6 GHz MIMO 4×4 wireless radio engineered for demanding fixed wireless connectivity, including video surveillance networks, intelligent transportation systems (ITS), security infrastructure, and broadband wireless links. It supports point-to-point and point-to-multipoint deployments and can operate as a Point-to-point endpoint, point-to-multipoint CPE, or a point-to-multipoint base station, supporting up to 64 client radios with a license upgrade.

Advanced 4×4 MIMO technology provides significant performance and reliability advantages. In 4×4:4 mode, at short to medium distances a 20 MHz channel can deliver up to twice the throughput of conventional 2×2 systems.

In 4×4:2 mode, antenna diversity creates mirrored data streams that improve link stability and performance in challenging RF environments.

### Key Highlights:

- 1.5 Gbps TCP / 1.8 Gbps UDP throughput
- 5.925 - 7.125 GHz wide-band operation
- 4×4 MIMO for higher capacity and reliability
- 2.5 GbE with optional 10 Gb SFP+
- AES-128 encryption (upgradeable to 256-bit).
- Full tilt and swivel mounting kit included.

## Integrated Antenna and Connectorized Models

The SX5-2042A includes an integrated quad polarity panel antenna.

Model SX5-2040A is a connectorized unit purposed build for external quad polarity antennas where specific antenna patterns or gain adjustments are needed.

## Advanced Interference Management

Proxim ClearConnect<sup>™</sup> combines multiple dynamic technologies and delivers the best interference management solution.

## Secure Management Options

Management options include TLS 1.3 web GUI, SSH 2.0 CLI, and SNMP v3 for ProximVision Advanced or other network management solutions.

## Rugged Reliability

Stratum X5 uses an IP67-rated metal enclosure to ensure years of reliable service in harsh environments, including high winds, high salt, and temperature extremes.

## Specifications

### PRODUCT MODELS

|              |                                                                                               |               |
|--------------|-----------------------------------------------------------------------------------------------|---------------|
| SX5-2040A-WD | Stratum X5, 6 GHz All-purpose unit (BSU single or SU), 1+ Gbps, RP-SMA - WD PoE               | PN: 906-00009 |
| SX5-2042A-WD | Stratum X5, 6 GHz All-purpose unit (BSU single or SU), 1+ Gbps, 19° quad pol antenna - WD PoE | PN: 906-00010 |

### LICENSES

|                      |                                                                            |               |
|----------------------|----------------------------------------------------------------------------|---------------|
| SX5-204xA-AES256-UPG | Stratum X5, 6 GHz All-purpose unit AES 256 license upgrade                 | PN: 997-00064 |
| SX5-204xA-64SU-UPG   | Stratum X5, 6 GHz All-purpose unit, support for 1 to 64 SU license upgrade | PN: 997-00066 |

### INTERFACES

|                                |                                                                                                       |
|--------------------------------|-------------------------------------------------------------------------------------------------------|
| WIRED ETHERNET                 | One auto MDI-X RJ45 2.5 Gbps Ethernet with PoE in<br>One auto MDI-X RJ45 1 Gbps Ethernet with PoE out |
| EXTENSION<br>WIRELESS PROTOCOL | One SFP+ cage for 10Gbps fiber module (SR or LR)<br>WORP® (Wireless Outdoor Router Protocol)          |

### RADIO & TX SPECS

|                  |                                                                                                                                |
|------------------|--------------------------------------------------------------------------------------------------------------------------------|
| MIMO             | 2x2:2 and 4x4:4                                                                                                                |
| MODULATION       | OFDM BPSK-QAM1024                                                                                                              |
| FREQUENCY        | SX5-2040A: 5.925 - 7.125 GHz (Subject to Country Regulations)<br>SX5-2042A: 5.925 - 6.425 GHz (Subject to Country Regulations) |
| CHANNEL SIZE     | 20, 40 and 80 MHz (160 MHz via future upgrade)                                                                                 |
| TX POWER         | Up to 24 dBm (dual chain) or 27 dBm (quad chain)                                                                               |
| TX POWER CONTROL | 0 - 21 dB, in 1 dB steps. Automatic TPC with configurable EIRP limit                                                           |

|                                        | 20 MHz                                                           | 40 MHz    | 80 MHz    |
|----------------------------------------|------------------------------------------------------------------|-----------|-----------|
| TX POWER                               | MCS0:                                                            | MCS0:     | MCS0:     |
| 2 RF                                   | 24                                                               | 24        | 24        |
| 4 RF                                   | 27                                                               | 27        | 27        |
|                                        | MCS13:                                                           | MCS13:    | MCS13:    |
| 2 RF                                   | 17                                                               | 17        | 17        |
| 4 RF                                   | 20                                                               | 20        | 20        |
| RX SENSITIVITY (Per=10 <sup>-6</sup> ) | MCS0:                                                            | MCS0:     | MCS0:     |
|                                        | -95                                                              | -90       | -90       |
|                                        | MCS13:                                                           | MCS13:    | MCS13:    |
|                                        | -63                                                              | -56       | -56       |
| Throughput - Dual Stream               | 298 Mbps                                                         | 565 Mbps  | 1095 Mbps |
| Throughput - Quad Stream               | 573 Mbps                                                         | 1074 Mbps | 1787 Mbps |
| OTHER                                  | Dynamic Channel Selection (DCS) based on interference detection, |           |           |
|                                        | Automatic Transmit Power Control (ATPC) with EIRP limit support  |           |           |

## ANTENNA

SX5-2040A

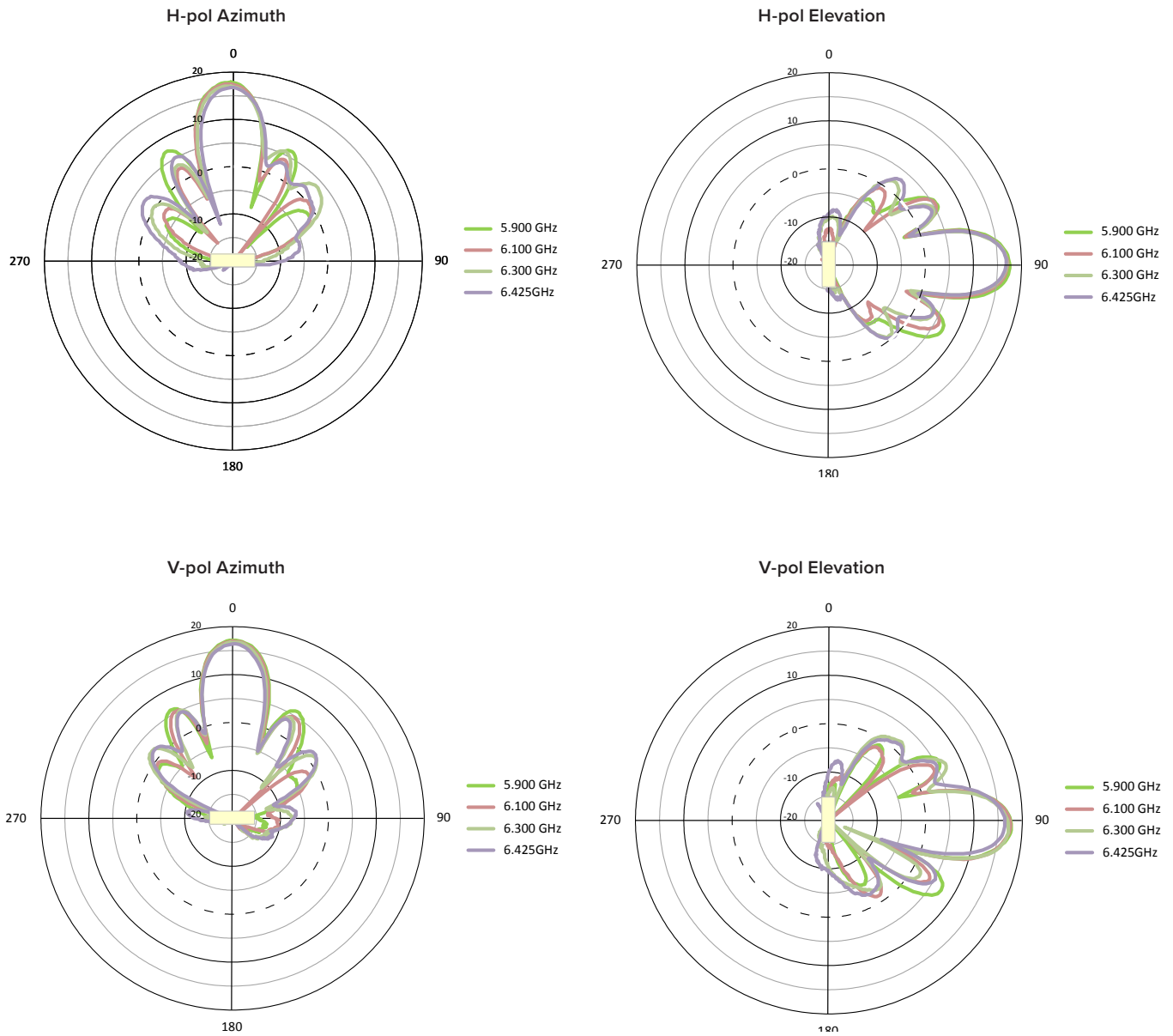
Four RP-SMA Connectors

SX5-2042A

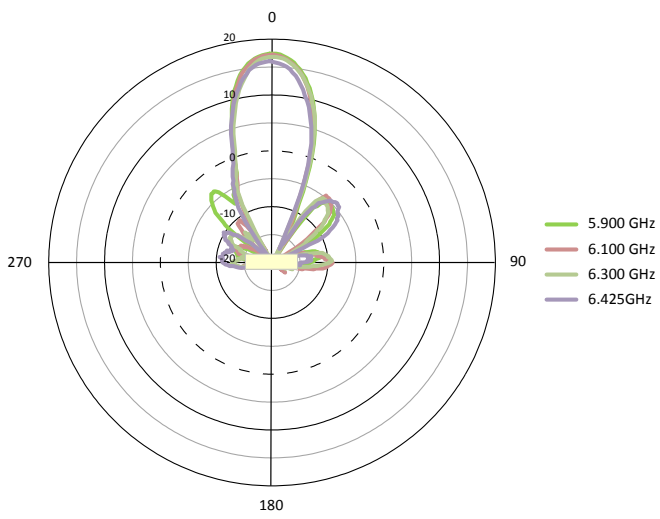
Integrated 4x4 MIMO 18 dBi Quad Polarized 19 degree Panel Antenna

## ANTENNA PATTERNS

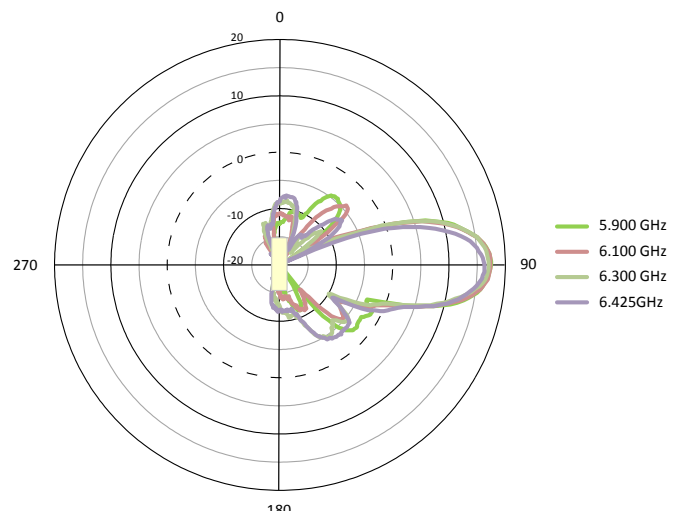
SX5-2042A



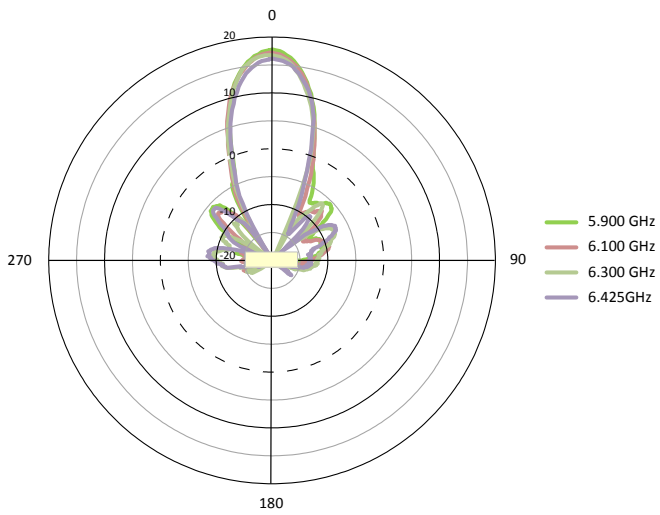
**+45-pol Azimuth**



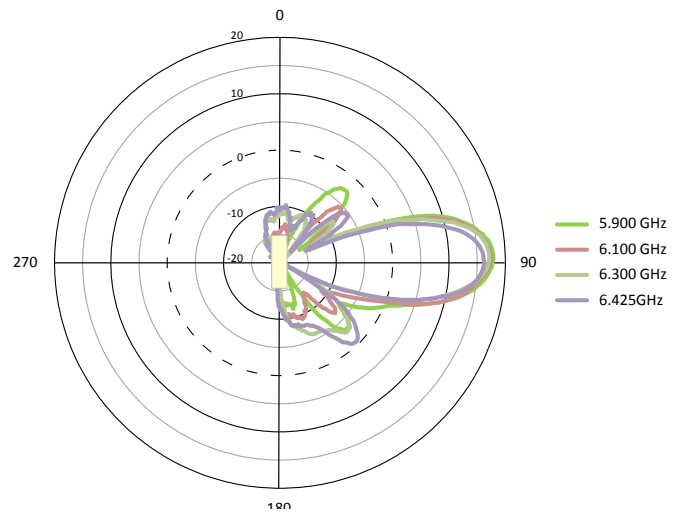
**+45-pol Elevation**



**-45-pol Azimuth**



**-45-pol Elevation**



## MANAGEMENT

|                        |                                                                 |
|------------------------|-----------------------------------------------------------------|
| REMOTE                 | Telnet and SSH 2.0, Web GUI and TLS 1.3, TFTP, SNMP v1/v2c/v3   |
| OTHER                  | Syslog, SNTP and local time, Spectrum analyzer                  |
| Multi-Language Support | Web Interface available in English, French, Spanish and Chinese |

## SECURITY

|                |                                       |
|----------------|---------------------------------------|
| ENCRYPTION     | AES 128 (AES 256 via license upgrade) |
| AUTHENTICATION | Internal MAC Address Control List,    |

## QoS (via future FW upgrade)

|                                    |                                                                          |
|------------------------------------|--------------------------------------------------------------------------|
| ASYMMETRIC BANDWIDTH CONTROL       | Asymmetric UL/DL committed and maximum information rate per service flow |
| PACKET CLASSIFICATION CAPABILITIES | 802.1p priority and IPTOS                                                |
| SCHEDULING                         | Best Effort, Real Time Polling Services                                  |

## NETWORK

|                  |                                                                                         |
|------------------|-----------------------------------------------------------------------------------------|
| MODES            | Bridging, Routing                                                                       |
| IP STACK         | IPv4 and IPv6 simultaneously                                                            |
| VLAN             | 802.1Q: Management VLAN. Transparent, Access, Trunk and Mixed mode. QinQ double tagging |
| GATEWAY FEATURES | DHCP Server & relay, NAT with Std ALGs, PPPoE end point with Proxy DNS                  |

## POWER

802.3at/bt compliant

## POWER CONSUMPTION

14 to 17 W max in MIMO 2x2 mode  
22 to 25 W max in MIMO 4x4 mode

| ENVIRONMENTAL SPECS | OPERATING TEMPERATURE                          | STORAGE TEMPERATURE                          | HUMIDITY - IP RATING               | WIND LOADING         |
|---------------------|------------------------------------------------|----------------------------------------------|------------------------------------|----------------------|
|                     | -40° to 60°C                                   | -50° to 70°C                                 | 100% relative humidity             | 180 km/h (112.5 mph) |
|                     | -40° to 140° Fahrenheit                        | -58° to 158° Fahrenheit                      | IP67                               |                      |
|                     |                                                |                                              |                                    |                      |
| PHYSICAL SPECS      | DIMENSIONS (Shipping Carton - 2 Units)         | DIMENSIONS UNPACKAGED                        | WEIGHT (Shipping Carton - 2 Units) | WEIGHT (UNPACKAGED)  |
| SX5-2040A           | 388 x 346 x 428 mm<br>15.27 x 13.62 x 16.85 in | 250 x 220 x 62 mm<br>9.84 x 8.66 x 2.44 in   | 10.0 Kg<br>22.04 lbs               | 1.6 Kg<br>3.53 lbs   |
| SX5-2042A           | 415 x 415 x 485 mm<br>16.34 x 16.34 x 16.85 in | 371 x 371 x 97 mm<br>14.60 x 14.60 x 3.82 in | 13.8 kg<br>30.42 lbs               | 3.0 kg<br>6.61 lbs   |

**SAFETY STANDARDS**

IEC 62368-1:2018  
EN IEC 62368-1:2020+A11:2020  
BS EN IEC 62368-1:2020+A11:2020  
UL 62368-1:2019, CSA C22.2 No. 62368-1:19

**CERTIFICATIONS**

EMC/EMI: CFR47, FCC part 15, Subpart B (class A)  
ICES-003 issue 7:2020 (class A)  
EN 55032:2015+A1:2020, EN 55035:2017+A11:2020, EN 301 489-1, EN 301 489-17, EN 301 489-19

**PACKAGE CONTENTS**

- One Stratum SX5-2040A unit with four RP-SMA connectors or One Stratum SX5-2042A with integrated antenna
- Three (SX5-2040A) or One (SX5-2042A) RP-SMA weather proofing caps
- Two M25 weather proofing cable glands
- One power injectors and country specific power cords
- One full axis mounting kits
- One Grounding kits
- One Quick Installation Guides

**MTBF & WARRANTY**

>450 000 hours, 2-year warranty, ServPak Extended Support available.

**ABOUT PROXIM WIRELESS :**

Proxim Wireless is a global leader in advanced wireless broadband and WiFi solutions that deliver high performance and high availability communications.

Celebrating 40 years of pioneering wireless solutions, Proxim is recognized for unparalleled reliability, superior performance, and drive for innovation.