



DOCSIS 3.1 Modem

Model: **UBC1325CA00**

The **UBC1325CA00 DOCSIS 3.1 Data Modem** provides a 2.5G Ethernet port to meet the ever-increasing bandwidth demands of the modern home.

Key Features & Benefits:

High Speed* - The UBC1325CA00 modem delivers increased bandwidth for subscriber's multimedia and high-bandwidth applications.

▶ **DOCSIS 3.1:**

- **Downstream:** 108 to 1002MHz, 2x 192MHz OFDM channels provide capacity up to 5Gbps
- **Upstream:** 5 to 42/85MHz (switchable), 2x 96MHz OFDMA channels provide capacity up to 2Gbps

▶ **DOCSIS 3.0:** 32 downstream and 8 upstream channels provide speeds of up to 1372Mbps downstream and 246Mbps upstream.

▶ **IEEE 802.3bz:** Supports LAN speeds up to 2.5G.

Full Band Capture - For channel lineup flexibility. "No block" tuner restrictions such as all DOCSIS bonding in certain frequency windows.

Diagnostic Capability - Integrated high performance spectrum analyzer helps reduce troubleshooting costs.

* Actual speeds will vary based on factors such as network configuration and service tier.



UBC1325CA00
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UBC1325CA00 Product Specifications

Interfaces & Standards

- Cable: F-Connector, female
- LAN: One 100/1000/2500 Mbps RJ-45 port with MDI/MDIX
- DOCSIS 3.1 certified
- DOCSIS 1.0/1.1/2.0/3.0 certified
- UL/FCC Class B, ENERGY STAR® certified

Security

- DOS (denial of service) attack protection

Device Management

- Web-based graphical user interface (GUI)
- SNMP v1, v2c, v3
- Serial console (optional)
- Syslog
- SSH console
- Spectrum analyzer
- TR-069 support

Physical & Environmental

- Dimensions: 50mm, 1.9 inches (W), 143mm, 5.6 inches (D), 195mm, 7.7 inches (H)
- Weight: 400 g (14.1 oz), unit only
- Power: 12 V 1.5A (output), external PSU (power supply unit)
- Operating Temperature: 0°C ~ 45°C (32°F ~ 113°F)
- Operating Humidity: 5 ~ 95% (non-condensing)

Downstream*

- Frequency Range: 108MHz-1002MHz
- Capture Bandwidth: 1GHz
- Modulation: 64 or 256 QAM and OFDM: up to 4096 QAM
- Maximum DOCSIS 3.1 Data Rate: 2 x 192MHz OFDM channels provide capacity up to 5Gbps
- Maximum DOCSIS 3.0 Data Rate: 32 downstream channels provide speeds up to 1372Mbps
- Symbol Rate: 5361 Ksps
- RF (cable) Input Power:
 - -15 to +15dBmV (64/256 QAM) (SC-QAM)
 - -6 to +15dBmV (4096 QAM) (OFDM)
- Input Impedance: 75 Ω

Upstream*

- Frequency Range: 5MHz-45MHz/85MHz switchable
- Modulation: QPSK or 8/16/32/64/128 QAM and OFDMA: up to 4096 QAM
- Maximum DOCSIS 3.1 Data Rate: 2 x 96MHz OFDMA channels provide capacity up to 2Gbps
- Maximum DOCSIS 3.0 Data Rate: 8 upstream channels provide speeds up to 246Mbps
- Symbol Rate: 160, 320, 640, 1280, 2560, 5120 Ksps
- RF Output Power (single channel): TDMA: +17dBmV to +61dBmV, S-CDMA: +17dBmV to +56dBmV
- RF (cable) Output Power:
 - A-TDMA/S-CDMA (one channel): +65dBmV (SC-QAM)
 - OFDMA: +65dBmV

* Actual speeds may vary based on factors including network configuration and speed.

Application Example

