

- 5 GHz 11ac (3x3) for smooth, optimized HD IPTV services everywhere
- 2.4 GHz 11n (2x2) for superior performance and coverage
- Extreme routing performance for FTTx applications
- VDSL2 vectoring for maximized service coverage
- Combo WAN-in-a-box for optimized CAPEX in FTTH/VDSL2 deployments
- 3G dongle support
- Intelligent CoC saves energy with rich green features



VMG3925-B10A

Dual-Band Wireless AC/N VDSL2 Combo WAN

Gigabit Gateway with USB

Benefits

G.vector to optimize performance and CAPEX

The VMG3925-B10A supports Vectoring technology that eliminates cross-talk or interference among different VDSL lines. With the mechanism, Vectoring significantly increases the bit rates to compete with cable/fiber technology as well as to enlarge the service coverage without changing the current infrastructure—a way to save cost significantly comparing to fiber-to-the-home (FTTH) deployments and CAPEX can also be optimized by the improved data rates and coverage without upgrading the equipment.

Combo WAN for simplified ISP logistics and optimized CAPEX

With the VMG3925-B10A, there's no need for service providers to invest on and replace new CPEs at customer sites when customers migrate from ADSL2+ or VDSL2 to PON or LTE; all they need to do is to unplug the DSL line, and then plug the Ethernet cable to the Ethernet WAN port as the existing CPE. VMG3925-B10A will be used to terminate the IP connections via the WAN interface. In most cases, users can still connect with the original CPE to avoid replacing the unit due to the difference of physical connections.

802.11ac technology for extreme performance and coverage

The VMG3925-B10A features 802.11ac technology to provide the ultimate solution for both speed and coverage. With 802.11ac wireless data rates of up to 1.3 Gbps, the VMG3925-B10A provides stable, reliable wireless connections for high-speed data and multimedia usages. The 802.11ac technology empowered the device to eliminate dead zones and extend coverage while retaining backward compatibility with any Wi-Fi certified device.

Quality of Service (QoS) support

With QoS features, service providers can freely design their QoS policies and prioritize the mission-critical services such as IPTV based on their service plan offerings. This increases network efficiency and productivity that enable service providers to offer a real multi-play solution meeting the needs of residential users.

TR-069 remote management

The VMG3925-B10A incorporates the TR-069 standard management specifications for service providers to manage and configure client devices remotely without any end user intervention. This feature offers a true “plug-and-play” experience while reducing deployment complexity to help saving the operating and maintenance costs for service providers.

Specifications

System Specifications

Wireless

- IEEE 802.11ac 5 GHz with up to 1.3 Gbps data rate
- IEEE 802.11n 2.4 GHz with up to 300 Mbps data rate
- Wireless Protected Setup (WPS)

VDSL and ADSL

- WEP data encryption (64/128 bit)
- WPA/WPA2, WPA-PSK/WPA2-PSK
- Wi-Fi scheduling
- Multiple SSID (up to 4)
- VDSL/ADSL2+ compliance
- VDSL2 (G.993.2), band plan Annex A, Annex B (over POTS)
- Support profile 8a, 8b, 8c, 8d, 12a, 12b, 17a

- VDSL1 (G.993.1)
- ADSL2+ (G.992.5) support Annex A, I, M
- ADSL2 (G.992.3) support Annex A, I, L, M
- ADSL (G.992.1) Annex A
- ANSI T1.413 issue 2
- G.INP (G.998.4)
- G.vector (G.993.5)

VLAN/QoS

- Support flexible traffic classification

- 6-bit DiffServ Code Point (DSCP, RFC 2474)
- 802.1P 3-bit Class of Service (CoS)
- 802.1Q 12-bit VLAN ID

Router/Bridge Features

- IEEE 802.1d transparent bridge
- PPP over Ethernet (RFC 2516)
- MAC encapsulation routing/IPoE
- Network Address Translation (NAT)/Network Address Port Translation (NAPT)
- NAT server (Port forwarding)
- DHCP client/server/relay
- DNS proxy/dynamic DNS
- Static route/policy routing
- IGMP v1, v2
- IP protocol v6 (IPv6)

Security

- Firewall
- Generic packet filter
- DoS attack prevention
- Parental control

USB

- File sharing

- 3G backup

Management

- Web GUI (HTTP/HTTPS)
- Command Line Interface (CLI)
- Firmware upgrade via HTTP/FTP/TR-069
- DSL forum TR-069/TR-098/TR-111/TR-064
- 802.1ag Connectivity Fault Management (CFM)

Hardware Specifications

- WAN
 - one RJ11 interface for VDSL(over POTS)
 - one RJ45 connector for Giga Ethernet WAN port
- LAN: Four 10/100/1000 MDI/MDIX RJ45 ports
- Wireless
 - Two internal 3dBi 2.4GHz antennas
 - Three internal 3dBi 5GHz antennas
- Buttons
 - One reset
 - One WPS on/off
 - One WLAN on/off
- One USB host port
- Status LED: Power, DSL, Ethernet, WAN, WLAN 2.4G,

WLAN 5G, WPS, Internet, USB

Power Specifications

- External power supply: 110~240VAC/12V DC 1.5A Adaptor
- Power consumption at peak: 18 W

Physical Specifications

- Dimension: 215(H) x 142(W) x 42(D) mm
- Weight: TBD

Environment Specifications

- Operation Temperature: 0°C ~ 45°C
- Operation Humidity: 10% ~ 95%
- Storage Temperature: -30°C ~ 60°C
- Storage Humidity: 10% ~ 95%

Regulations

- RoHS, WEEE, HSF

Application Diagram



Certifications

Federal Communications Commission (FCC) Interference Statement

The device complies with Part 15 of FCC rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference.
- (2) This device must accept any interference received, including interference that may cause undesired operations.

This device has been tested and found to comply with the limits for a Class B digital device pursuant to Part 15 of the FCC Rules. These limits are designed to provide reasonable protection against harmful interference in a residential installation. This device generates, uses, and can radiate radio frequency energy, and if not installed and used in accordance with the instructions, may cause harmful interference to radio communications. However, there is no guarantee that interference will not occur in a particular installation.

If this device does cause harmful interference to radio/television reception, which can be determined by turning the device off and on, the user is encouraged to try to correct the interference by one or more of the following measures:

- Reorient or relocate the receiving antenna.
- Increase the separation between the equipment and the receiver.

- Connect the equipment into an outlet on a circuit different from that to which the receiver is connected.
- Consult the dealer or an experienced radio/TV technician for help.

Radiation Exposure Statement

- This device and its antenna(s) must not be co-located or operating in conjunction with any other antenna or transmitter.
- For operation within 5.15 ~ 5.25GHz frequency range, it is restricted to indoor environment.
- IEEE 802.11b, 802.11g or 802.11n (20MHz) operation of this product in the U.S.A. is firmware-limited to channel 1 through 11. IEEE 802.11n (40MHz) operation of this product in the U.S.A. is firmware-limited to channel 3 through 9.
- This equipment complies with FCC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator and your body.

Notices

Changes or modifications not expressly approved by the party responsible for compliance could void the user's authority to operate the equipment.



The device complies with the essential requirements of the R&TTE Directive 1995/5/EC.

Radiation Exposure Statement

This equipment complies with EU radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator and your body.

National Communications Commission (NCC)

Article 12

Without permission, any company, firm or user shall not alter the frequency, increase the power, or change the characteristics and functions of the original design of the certified lower power frequency electric machinery.

Article 14

The application of low power frequency electric machineries shall not affect the navigation safety nor interfere a legal communication, if an interference is found, the service will be suspended until improvement is made and the interference no longer exists.

Industry Canada (IC)

CAN ICES-3 (B)/NMB-3(B)

This device complies with RSS-247 of the Industry Canada Rules. Operation is subject to the following two conditions:

- (1) This device may not cause harmful interference, and
- (2) this device must accept any interference received, including interference that may cause undesired operation.

Ce dispositif est conforme à la norme CNR-192 d'Industrie Canada applicable aux appareils radio exempts de licence. Son fonctionnement est sujet aux deux conditions suivantes:

- (1) le dispositif ne doit pas produire de brouillage préjudiciable, et
- (2) ce dispositif doit accepter tout brouillage reçu, y compris un brouillage susceptible de provoquer un fonctionnement indésirable.

IMPORTANT NOTE:

Radiation Exposure Statement:

This equipment complies with IC radiation exposure limits set forth for an uncontrolled environment. This equipment should be installed and operated with minimum distance 20cm between the radiator and your body.

Déclaration d'exposition aux radiations:

Cet équipement est conforme aux limites d'exposition aux rayonnements IC établies pour un environnement non contrôlé. Cet équipement doit être installé et utilisé avec un minimum de 20cm de distance entre la source de rayonnement et votre corps.

Safety Warnings

- . Do NOT use this product near water, for example, in a wet basement or near a swimming pool.
- . Do NOT expose your device to dampness, dust or corrosive liquids.
- . Do NOT store things on the device.
- . **Caution!** Use of controls or adjustments or performance of procedures other than those specified herein may result in hazardous radiation exposure.
- . Do NOT install, use, or service this device during a thunderstorm. There is a remote risk of electric shock from lightning.
- . Connect ONLY suitable accessories to the device.
- . Do NOT open the device or unit. Opening or removing covers can expose you to dangerous high voltage points or other risks. ONLY qualified service personnel should service or disassemble this device. Please contact your vendor for further information.
- . Make sure to connect the cables to the correct ports.
- . Place connecting cables carefully so that no one will step on them or stumble over them.
- . Always disconnect all cables from this device before servicing or disassembling.
- . Use ONLY an appropriate power adaptor or cord for your device.
- . Connect the power adaptor or cord to the right supply voltage (for example, 110V AC in North

America or 230V AC in Europe).

- . Do NOT allow anything to rest on the power adaptor or cord and do NOT place the product where anyone can walk on the power adaptor or cord.
 - . Do NOT use the device if the power adaptor or cord is damaged as it might cause electrocution.
 - . If the power adaptor or cord is damaged, remove it from the device and the power source.
 - . Do NOT attempt to repair the power adaptor or cord. Contact your local vendor to order a new one.
 - . Do not use the device outside, and make sure all the connections are indoors. There is a remote risk of electric shock from lightning.
 - . Do NOT obstruct the device ventilation slots, as insufficient airflow may harm your device.
 - . Use only No. 26 AWG (American Wire Gauge) or larger telecommunication line cord.
 - . Antenna Warning! This device meets ETSI and FCC certification requirements when using the included antenna(s). Only use the included antenna(s).
 - . If you wall mount your device, make sure that no electrical lines, gas or water pipes will be damaged.
 - . -Do not use this product near water for example, near a bathtub, washbowl, kitchen sink or laundry tub, in a wet basement or near a swimming pool.
 - Avoid using a telephone (other than a cordless type) during an electrical storm. There may be a remote risk of electric shock from lightning.
 - Do not use the telephone to report a gas leak in the vicinity of the leak.
 - Use only the power cord and batteries indicated in this manual. Do not dispose of batteries in a fire. They may explode. Check with local codes for possible special disposal instructions.
 - the screen of the coaxial cable is intended to be connected to earth in the building installation
- Your product is marked with this symbol, which is known as the WEEE mark. WEEE stands for Waste Electronics and Electrical Equipment. It means that used electrical and electronic products should not be mixed with general waste. Used electrical and electronic equipment should be treated



separately