Remote Access Bridge (RAB)



Secure Remote Access and Backup for Avi-on Bluetooth[®] Lighting Systems

The Avi-on Remote Access Bridge (RAB) provides secure 24/7 access to Avi-on Bluetooth Lighting Control Systems from anywhere in the world, enabling management of multiple Avi-on deployments, and monitoring of system status for security when sites are unattended. The Avi-on RAB also enables popular voice assistants to control Avi-on devices.

Applications

- Office Lighting
- Warehouse Lighting
- Area Lighting
- Retail Lighting
- Outdoor Lighting
- Signage
- Residential Lighting
- Architectural Lighting

Remote Access Bridge Features

Anywhere Operation

Avi-on's Remote Access Bridge enables monitoring and management of the connected Avi-on Bluetooth Lighting Control system from anywhere via the Internet. The RAB bridges between the Bluetooth network and and the Avi-on Cloud Service via the building Wi-Fi network, connecting to Wi-Fi similar to a computer or mobile phone.

Benefits

- Operation of Avi-on Pro Bluetooth Lighting Controls from anywhere
- Voice assistant integration
- Local device time maintenance and synchronization
- Web browser control via myaccount.avi-on.com
- 120/240VAC, 50/60Hz operation
- Secure connection to Wi-Fi router with no special ports or dedicated IT equipment
- Direct plug-in, no cords or bulky transformer
- · Internal antenna for easy deployment
- LED indicators for Bluetooth and Wi-Fi connectivity

Avi-on App/Web Remote Access Features

Wireless On/Off, Dimming, and Color Changing Countdown Timers Device Grouping Programmable Scenes Flexible Scheduling of Devices, Groups & Scenes





Remote System Monitoring

With a RAB bridging between the Avi-on Cloud and Avi-on Bluetooth Lighting Controls, the status of all devices is reported to the cloud in real time, allowing full remote monitoring of all system components.

Time Synchronization

The Remote Access Bridge automatically synchronizes the Avi-on Bluetooth Lighting Network time with Internet time to ensure consistent scheduling through power outages, even when the system is unattended.

Secure Remote Access

The Remote Access Bridge is specially designed for enterprise environments to prevent unauthorized remote access by hackers. The RAB may only be registered to a single Avi-on account by using a mobile device in close proximity to the lighting controls network and is only capable of connecting to the Avion cloud, making it far more secure than even a typical commercial grade Wi-Fi router.

Security Features

- Access password protected with secure email password reset.
- All traffic is HTTPs encrypted. Passwords use SHA256 or better.
- Remote Access Bridge passwords are unique and not available to users or factory.
- No use of special or dedicated access LAN ports.
- No VPN required, works with standard corporate firewall.
- No way to connect to Bridge from outside with methods that can load malicious firmware (e.g. SSH, Telnet). Restricted access even inside local network, even if you have a password.
- Components may only be registered to a single Avion account using a Mobile in close proximity to the Bluetooth network.

Voice Assistant Integration

The RAB provides the ability to integrate with voice assistants, such as Amazon's Alexa, with Avi-on lighting controls via the Avi-on Cloud. With a voice assistant, lights may be turned off, dimmed, brightened and change color with simple voice commands. Configuration changes in the app, like device name changes and lighting groups, are automatically updated for use by the voice assistant.

Stand-alone System Synchronization

With a RAB bridging between the Internet and Avi-on lighting controls, all Avi-on configurations are synchronized with Avi-on Cloud servers even when no mobile device is running the Avi-on App, enabling upto-the-minute monitoring and management.

Avi-on App Capabilities

Most Avi-on App features may be exercised via the RAB when remote from the Bluetooth network. Device on/ off, dimming, countdown timers, scheduling and many other features operate as if connected directly via Bluetooth.

Power Failure Memory

RAB/RAB Commercial Version will return to its previous state when power is restored





Parts and Ordering

Select a part number from the table listed below.

Product Name	Plug Type	Supply Voltage	Part Number
Remote Access Bridge	Type A Plug	120/240 VAC, 50/60 Hz	2001RAB-01
Remote Access Bridge (Commercial Version)	Type A Plug	120/240 VAC, 50/60 Hz	2001RAB-01-C

To order please contact Avi-on sales at **(844) 704-8383** or **prosales@avi-on.com** for information on becoming an Avi-on partner and order details.

Detailed Specifications

Electrical

Input Voltage Specifications	Min	Мах	Unit
Supply Voltage	11	18	V
Mains Frequency	-	±200	mA
Operating Current	17	200	mA

System Communications	Min	Мах	Unit
Bluetooth Signal Frequency	2402	2480	MHz
Bluetooth Wireless Range	-	50*	Feet
Wi-Fi Signal Frequency	2412	2472	MHz
Wi-Fi Wireless Range	10*	50*	Feet

Environmental Specifications	Min	Max	Unit
Ambient Operating Temperature	0	40	°C
Storage Temperature	-30	45	°C

* Actual results may vary, depending on local environment

Case Dimensions (Excluding Type A Plug)

Part	Length (mm)	Width (mm)	Height (mm)
All	55	40	35

Certifications

Regulatory	Description
USA	FCC: 2AFZI-2001RAB
UL	I.T.E. E486012
Canada	IC: 20544-2001RAB
BQB	DID: D031800 Qualified Design ID: 85750





Product Dimensions

The Avi-on Remote Access Bridge is designed in a small form factor (55mm x 40mm x 35mm) and functions in any standard type A outlet running 110/240 VAC, 50/60Hz.

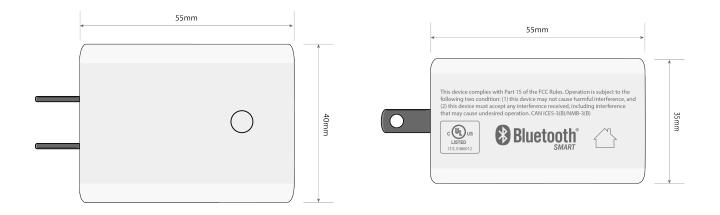


Figure 1. Avi-on Remote Access Bridge (RAB)



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