

## 2506 Polycom Ring Detector

### Wiring & Configuration



#### Order Codes

**2506** Polycom Ring Detector

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## About the Algo 2506 Polycom Ring Detector

Polycom VVX phones can be configured to provide ring audio to the headset jack instead of the speaker. The Algo 2506 module detects the low-level audio from the headset jack and provides an isolated signal to activate an 8128 SIP Strobe Light, 8180 SIP Audio Alerter, 8186 SIP Horn Speaker, or 8188 SIP Ceiling Speaker directly instead of using SIP.

Only one Algo alerting device (8128, 8180, 8186, or 8188) can be connected directly to the 2506 Polycom Ring Detector at a time. However, any of the four devices can relay a signal to additional devices via the relay output connections on the back or via multicast.

### What is Included

- 2506 Polycom Ring Detector
- Coiled Handset Cord
- Wires

### What is not Included

- 8128 SIP Strobe Light
- 8180 SIP Audio Alerter
- 8186 SIP Horn Speaker
- 8188 SIP Ceiling Speaker

## Getting Started - Quick Configure & Test



*This guide provides important safety information which should be read thoroughly before permanent setup.*

1. If using an 8180/8186/8188, first configure the device via the web interface, as per the instructions in this guide. Next, test that the configuration is correct by shorting a pair of wires to the input on the back of the device. (The 8128 does not require any web configuration.)
2. Connect one end of a wire pair (maximum length of 20 feet) to the "+" and "-" screw input terminals on the 2506 and the other end to the relay terminals on the Algo alerting device. The pin polarity and placement varies between devices. Refer to the guide for more information.
3. Connect the Algo alerting device to the network via an Ethernet cable at the back of the device. Ensure that a PoE port is used for power.
4. Plug one end of the coiled handset cord into the RJ jack on the 2506 and the other end into the HEADSET jack on the Polycom phone.
5. Set the ring signal on the phone to be sent to the headset jack.
6. **Set the VVX Polycom phone ringing volume to maximum.**  
(Ensure that the headset is set up before the ring volume is configured.)
7. When an incoming call is received by the Polycom VVX phone, an audio/visual alert will be triggered.

## 8180/8186/8188 Web Interface Configuration

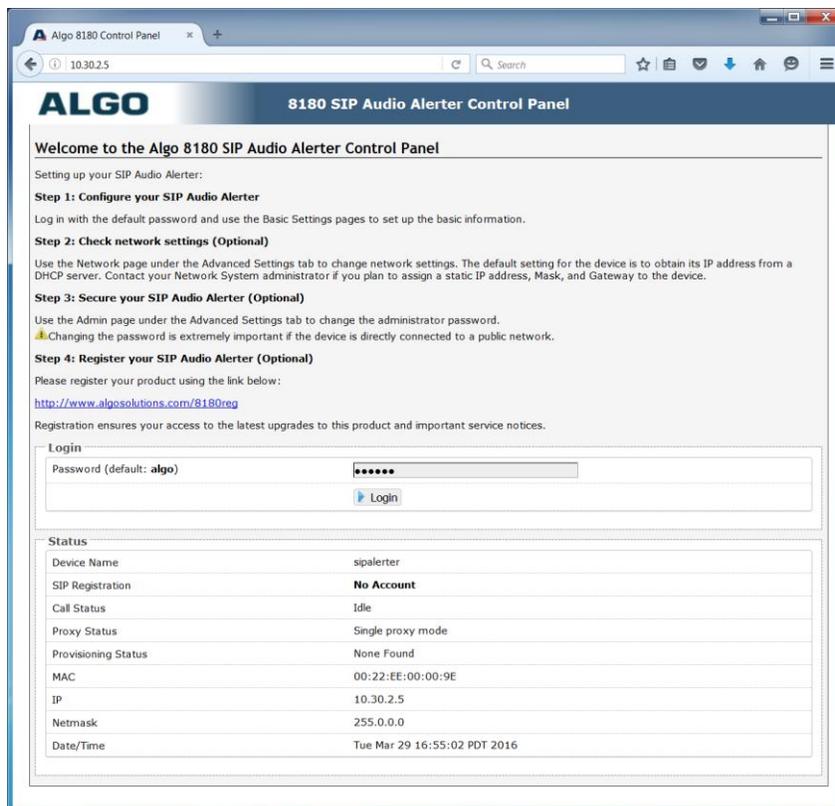


The Algo 8180, 8186, and 8188 web interface should be configured before any wiring connections are made to avoid damaging the 2506. The 8128 does not require any web configuration to operate with the 2506.

Connect the Algo audio device to the network via an Ethernet cable at the back of the device. Ensure that a PoE port is used for power.

After boot up, the device will beep and the intercom will have obtained an IP address. If there is no DHCP server the device will default to the static IP address **192.168.1.111**.

Directions to obtain the IP address of the SIP device can be found in [8180 SIP Audio Alerter User Guide](#), [8186 SIP Horn Speaker User Guide](#), or [8188 SIP Ceiling Speaker User Guide](#). The IP address may also be discovered by downloading the Algo locator tool to find Algo devices on your network: [www.algosolutions.com/locator](http://www.algosolutions.com/locator)



1. Enter the IP address (eg 192.168.1.111) into a browser such as Google Chrome, Firefox, or Internet Explorer (other than IE9).
2. In the web interface, enter the password to log in. The default password is **algo**.
3. Go to "Advanced Settings > Input/Output" tab.
4. Follow the appropriate instructions below, depending on the device being used.
5. Click "Save" in the bottom right corner of the page.
6. Short a pair of wires to the input on the back of the device to see if an alert is triggered. If not, verify the PoE connection and web configuration options.

## 8180 Web Configuration

The screenshot displays the 'Input/Output Settings' page in the ALGO web interface. The page is divided into two main sections: 'Output' and 'Input'. In the 'Output' section, 'Speaker Mode' is set to 'Auto', 'Relay Mode' is set to 'Both', 'Message Waiting Light' is set to 'None', 'Heartbeat Light' is set to 'Disabled', and 'Page Light' is set to 'Enabled'. In the 'Input' section, 'Speaker Terminal Function' is set to 'Relay Input' (circled in red), 'Relay Input Polarity' is set to 'Normally Open Contact', 'Ring Tone' is set to 'chime.wav (?)', 'Ring Duration' is set to 'Play Once', and 'Program Buttons' is set to 'Enabled'. A green circle highlights the 'Save' button in the bottom right corner.

- Set the "Speaker Terminal Function" to "Relay Input".
- Ensure that "Relay Input Polarity" is set to "Normally Open Contact". Other configuration options can be set as desired.

## 8180G2 Web Configuration

Status Basic Settings **Additional Features** Advanced Settings System Logout

Input/Output Emergency Alerts More Page Extensions More Ring Extensions

### Input/Output

**Terminal Block Functions**

Speaker Mode  Auto  Internal  External  Disabled  
Note that Auto mode is not available when the Relay Terminal Function is set to Input.

Relay Terminal Function  Output  Input

**Input**

Relay Input Mode  Disabled  Relay Normally Open  
 Relay Normally Open with Supervision (e.g. Algo 1203 Call Switch)  
 Relay Normally Closed  
 Relay Normally Closed with Supervision  
 Mute Switch  
 Mute Switch with Supervision  
 Algo 1202 Call Button  
 Algo 1204 Volume Control Switch  
 Algo 1204 Volume Control Switch with Supervision

**Audio Streaming**

Microphone Always On  Enabled  Disabled  
This feature will stream the microphone audio via multicast for monitoring applications. When microphone streaming is active, the device will act as multicast Master regardless of the setting in Basic Settings > Multicast. Note that streaming is only available while the device is idle (it will be interrupted if a Page call is active).

**Action When Input Triggered**

Action  Play Tone  Make SIP Voice Call  Make SIP Call with Tone  Stream Mic Audio  
"Play Tone" will play a recorded audio file to a local speaker and multicast if configured. "Stream Mic Audio" will stream microphone audio to multicast only, so it requires Multicast "Master" mode to be enabled in "Basic Settings > Multicast".

Tone/Pre-recorded Announcement

Tone Duration  Play Once  Play While Held

**Output**

Output Light  Enabled  Disabled  
Disable the light on the speaker entirely (keep the light off even when the speaker is active).

Output Light Colour  Blue  Red

Heartbeat Light  Enabled  Disabled  
Flash the light every 30 seconds to indicate that the device is powered and running.

- Set the "Relay Terminal Function" to "Input".
- Set the "Relay Input Mode" to "Relay Normally Open".
- Ensure that "Action" is set to "Play Tone". Other configuration options can be set as desired.

## 8186/8188 Web Configuration

The screenshot displays the web configuration interface for the ALGO 8186/8188 device. The navigation tabs at the top include Status, Basic Settings, Additional Features (selected), Advanced Settings, System, and Logout. The main menu shows Input/Output, Emergency Alerts, More Page Extensions, and More Ring Extensions. The 'Input/Output' section is expanded to show the following configuration options:

- General**
  - Relay Input Mode:  Disabled,  Relay Normally Open,  Relay Normally Open with Supervision (e.g. Algo 1203 Call Switch),  Relay Normally Closed,  Relay Normally Closed with Supervision,  Speaker Volume/Mute,  Algo 1202 Call Button
- Audio Streaming**
  - Microphone Always On:  Enabled,  Disabled  
This feature will stream the microphone audio via multicast for monitoring applications. When microphone streaming is active, the device will act as multicast Master regardless of the setting in Basic Settings > Multicast. Note that streaming is only available while the device is idle (it will be interrupted if a Page call is active).
- Action When Input Triggered**
  - Action:  Play Tone,  Make SIP Voice Call,  Make SIP Call with Tone,  Stream Mic Audio  
'Play Tone' will play a recorded audio file to a local speaker and multicast if configured. 'Stream Mic Audio' will stream microphone audio to multicast only, so it requires Multicast 'Master' mode to be enabled in 'Basic Settings > Multicast'.
  - Tone/Pre-recorded Announcement: chime.wav
  - Tone Duration:  Play Once,  Play While Held
- Output**
  - Output Light:  Enabled,  Disabled  
Disable the blue light on the speaker entirely (keep the light off even when the speaker is active)
  - Heartbeat Light:  Enabled,  Disabled  
Flash the blue light every 30 seconds to indicate that the speaker is powered and running.
  - Output Relay:  Enabled,  Disabled  
Disable the relay output on the speaker

A green circle highlights the 'Save' button at the bottom right of the configuration page.

- Set the "Relay Input Mode" to "Relay Normally Open".
- Ensure that "Action" is set to "Play Tone". Other configuration options can be set as desired.

## Wiring Connections



*The 8180/8186/8188 web interface should be configured before any wiring connections are made to avoid damaging the 2506. The 8128 does not require any web configuration to operate with the 2506.*

The 2506 can be connected to an Algo alerting device via the following setup:

1. Use a screwdriver to connect a wire pair into the "+" and "-" terminals via the screw input connector on the 2506. It is recommended to keep wiring distances to maximum of 20 feet (indoor only) due to low audio levels.
2. As per the table below, connect the wires from the 2506 to the relay input (speaker output on 8180) on the device of choice:

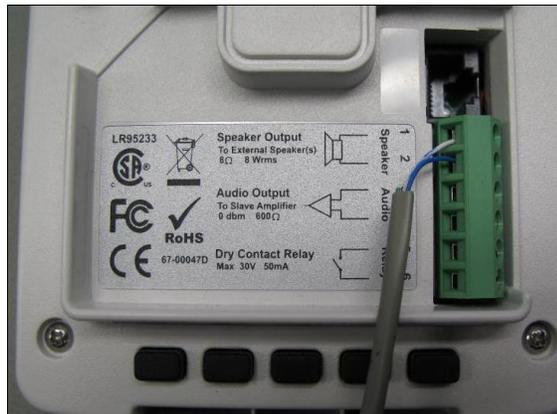


*Note: The pin polarity/placement varies between devices. Ensure correct polarity is used with each device.*



### 8128 SIP Strobe Light

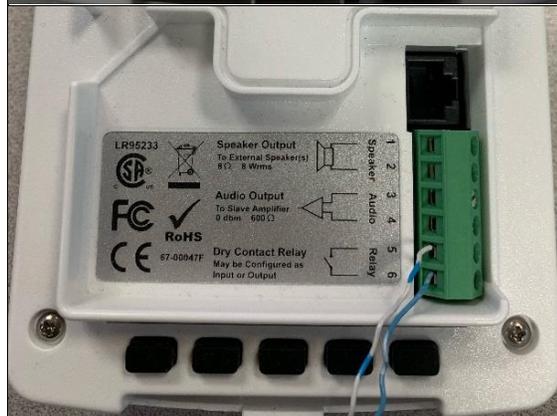
- 2506 "+" to Pin 2
- 2506 "-" to Pin 1



## 8180 SIP Audio Alerter

- 2506 "+" to Pin 1
- 2506 "-" to Pin 2

\*The speaker output on the 8180 is used as relay input.



## 8180 SIP Audio Alerter (G2)

- 2506 "+" to Pin 6
- 2506 "-" to Pin 5



## 8186 SIP Horn Speaker

- 2506 "+" to Pin 4
- 2506 "-" to Pin 3



## 8188 SIP Ceiling Speaker

- 2506 "+" to Pin 1
- 2506 "-" to Pin 2

3. Connect the device to the network via an Ethernet cable at the back of the device. Ensure that a PoE port is used for power.

4. Plug the coiled handset cord into the RJ jack of the 2506.



5. Plug the other end of the handset cord into the HEADSET jack of the Polycom VVX phone.

6. Ensure that the ring signal on the Polycom VVX phone is sent to the headset jack. On the phone interface go to:



**Settings > Basic > Preferences > Audible Ringer > select Headset**

7. Set the VVX Polycom phone ringing volume to maximum by pressing volume up (+) key on the phone, while idle or ringing. The ring level should appear on the phone's display screen.

*Note: Ensure that the headset is set up before the ring volume is configured.*

8. When an incoming call is received by the Polycom VVX phone, a visual/audio alert will be triggered.



## Triggering Multiple Devices

Multicast can be used to trigger alerts from one 8128, 8180, 8186, or 8188 device to any number of additional Algo alerting products with multicast capability (8128, 8180, 8186, 8188, etc). Neither SIP registration nor SIP licencing will be required. This can be used to provide both audible and visual alerting, or for coverage of large areas.

When using multicast, ensure that all the alerting devices are connected to the same subnet and VLAN. The alerting device that is connected directly to the 2506 should be set as a multicast master and all the additional devices as multicast slaves.

For further multicast configuration details, refer to product specific documentation ([8128 SIP Strobe Light User Guide](#), [8180 SIP Audio Alerter User Guide](#), [8186 SIP Horn Speaker User Guide](#), and [8188 SIP Ceiling Speaker User Guide](#)).

Non-SIP devices, like the Algo 1128 LED Strobe Light can also be activated using the relay output on the back of the 8180/8186/8188 to the relay input on the back of the non-SIP devices. Thus, once activated, the 8180/8186/8188 will trigger additional visual alerts on the 1128.

## Testing

Call the Polycom VVX phone to activate the 8128/8180/8186/8188. Ensure only one alerting device is connected directly to the 2506 at a time.

## Troubleshooting

### Wiring Connections

To verify that the 8128/8180/8186/8188 is powered and configured correctly, short the wire pair on the input of the alerting device and see if an audio/visual alert is triggered. If not, verify the PoE connection and web configuration options (8180/8186/8188 only).

If the 8128/8180/8186/8188 functions correctly, next verify the polarity of the wiring between the alerting device and the 2506.

If a continuous alert is triggered or the alerting device is activated when the phone isn't, the pin polarity may be reversed.

### Headset Jack

Ensure that the ring signal is sent to the headset jack on the Polycom VVX phone. On the phone interface go to:

**Settings > Basic > Preferences > Audible Ringer > select Headset**

### Phone Volume

Ensure that the phone ringer volume is set to a max. The volume should be configured after the headset is set up.