



SIP Call/Alert Buttons Operations Guide

Part #011049, 011491

Document Part #932062A for Firmware Version 22.0

CyberData Corporation 3 Justin Court Monterey, CA 93940 (831) 373-2601 SIP Call/Alert Buttons Operations Guide 932062A Part # 011049, 011491

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Technical Support

The IP Endpoint Company The fastest way to get technical support for your VoIP product is to submit a VoIP Technical Support form at the following website: https://support.cyberdata.net/

> Phone: (831) 373-2601, Ext. 333 Fax: (831) 373-4193 Company and product information is at **www.cyberdata.net**.

Revision Information

Revision 932062A, which corresponds to firmware version 22.0, was released on November 19, 2024.

Pictorial Alert Icons

GENERAL ALERT	General Alert This pictorial alert indicates a potentially hazardous situation. This alert will be followed by a hazard level heading and more specific information about the hazard.
	Ground This pictorial alert indicates the Earth grounding connection point.

Hazard Levels

Danger: Indicates an imminently hazardous situation which, if not avoided, will result in death or serious injury. This is limited to the most extreme situations.

Warning: Indicates a potentially hazardous situation which, if not avoided, could result in death or serious injury.

Caution: Indicates a potentially hazardous situation which, if not avoided, could result in minor or moderate injury. It may also alert users against unsafe practices.

Notice: Indicates a statement of company policy (that is, a safety policy or protection of property).

The safety guidelines for the equipment in this manual do not purport to address all the safety issues of the equipment. It is the responsibility of the user to establish appropriate safety, ergonomic, and health practices and determine the applicability of regulatory limitations prior to use. Potential safety hazards are identified in this manual through the use of words Danger, Warning, and Caution, the specific hazard type, and pictorial alert icons.

Important Safety Instructions

- 1. Read these instructions.
- 2. Keep these instructions.
- 3. Heed all warnings.
- 4. Follow all instructions.
- 5. Do not use this apparatus near water.
- 6. Clean only with dry cloth.
- 7. Do not block any ventilation openings. Install in accordance with the manufacturer's instructions.
- 8. Do not install near any heat sources such as radiators, heat registers, stoves, or other apparatus (including amplifiers) that produce heat.
- 9. Do not defeat the safety purpose of the polarized or grounding-type plug. A polarized plug has two blades with one wider than the other. A grounding type plug has two blades and a third grounding prong. The wide blade or the third prong are provided for your safety. If the provided plug does not fit into your outlet, consult an electrician for replacement of the obsolete outlet.
- 10. Protect the power cord from being walked on or pinched particularly at plugs, convenience receptacles, and the point where they exit from the apparatus.
- 11. Only use attachments/accessories specified by the manufacturer.
- 12. Refer all servicing to qualified service personnel. Servicing is required when the apparatus has been damaged in any way, such as power-supply cord or plug is damaged, liquid has been spilled or objects have fallen into the apparatus, the apparatus has been exposed to rain or moisture, does not operate normally, or has been dropped.
- 13. Prior to installation, consult local building and electrical code requirements.

14. WARNING: The SIP Call/Alert Button enclosure is not rated for any AC voltages!

GENERAL ALERT	Warning <i>Electrical Hazard:</i> This product should be installed by a licensed electrician according to all local electrical and building codes.
GENERAL ALERT	Warning <i>Electrical Hazard:</i> To prevent injury, this apparatus must be securely attached to the floor/wall in accordance with the installation instructions.
GENERAL ALERT	Warning The PoE connector is intended for intra-building connections only and does not route to the outside plant.

Abbreviations and Terms

Abbreviation or Term	Definition
A-law	A standard companding algorithm, used in European digital communications systems to optimize, i.e., modify, the dynamic range of an analog signal for digitizing.
AVP	Audio Video Profile
Cat 5	TIA/EIA-568-B Category 5
DHCP	Dynamic Host Configuration Protocol
LAN	Local Area Network
LED	Light Emitting Diode
Mbps	Megabits per Second.
NTP	Network Time Protocol
PBX	Private Branch Exchange
PoE	Power over Ethernet (as per IEEE 802.3af standard)
RTFM	Reset Test Function Management
SIP	Session Initiated Protocol
SRTP	Secure Real Time Protocol
u-law	A companding algorithm, primarily used in the digital telecommunication
UC	Unified Communications
VoIP	Voice over Internet Protocol

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1 Installing the SIP Call/Alert Button

1.1 Remote Switch Connection

Wiring pins 7 and 8 of the terminal block to a switch will initiate a SIP call when the switch is closed. The call will go to the extension specified as the dial out extension on the **SIP** page.

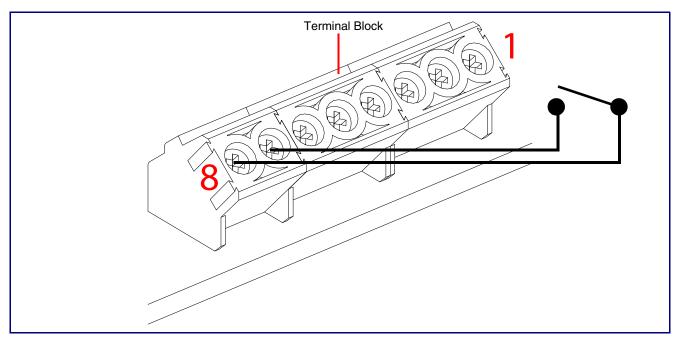


Figure 1-1. Remote Switch Connection

1.1.1 Using the On-Board Relay

GENERAL ALERT	Warning <i>Electrical Hazard:</i> This product should be installed by a licensed electrician according to all local electrical and building codes.						
GENERAL ALERT	Warning <i>Electrical Hazard:</i> The relay contacts are dry and provided for a normally open and momentarily closed configuration. Neither the alternate power input nor PoE power can be used to drive a door strike.						
GENERAL ALERT	Warning <i>Electrical Hazard:</i> The relay does not support AC powered door strikes. Any use of this relay beyond its normal operating range can cause damage to the product and is not covered under our warranty policy.						
The device has a built-in relay that can be activated by a web configurable DTMF string that can be							

The device has a built-in relay that can be activated by a web configurable DTMF string that can be received from a VoIP phone supporting out of band (RFC2833) DTMF as well as a number of other triggering events. See the **Device Page** on the web interface for relay settings.

This relay can be used to trigger low current devices like LED strobes and security camera input signals as long as the load is not an inductive type and the relay is limited to a maximum of 1 Amp @ 30 VDC. Inductive loads can cause excessive "hum" and can interfere with or damage the unit's electronics.

We highly recommend that inductive load and high current devices use our Network Dual Door Strike Relay (CD# 011375) (see Section 1.2.2, "Network Dual Door Strike Relay Wiring Diagram with External Power Source").

This relay interface also has a general purpose input port that can be used to monitor an external switch and generate an event.

For more information on the sensor options, see the **Sensor Page** on the web interface.

1.2 Wiring the Circuit

1.2.1 Devices Less than 1A at 30 VDC

If the power for the device is less than 1A at 30 VDC and is not an inductive load, then see Figure 1-2 for the wiring diagram.

When configuring with an inductive load, please use an intermediary relay with a High PIV Ultrafast Switching Diode. We recommend using the Network Dual Door Strike Relay (CD# 011375) (see Section 1.2.2, "Network Dual Door Strike Relay Wiring Diagram with External Power Source").

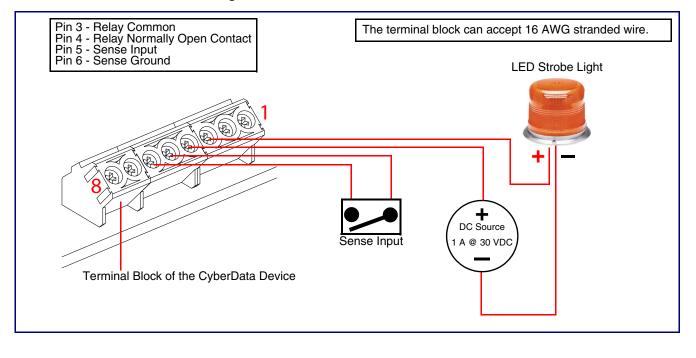


Figure 1-2. Devices Less than 1A at 30 VDC

1.2.2 Network Dual Door Strike Relay Wiring Diagram with External Power Source

For wiring an electronic door strike to work over a network, we recommend the use of our external Network Dual Door Strike Relay (CD# 011375).

This product provides an easier method of connecting standard door strikes as well as AC and higher voltage devices. See Figure 1-3 and Figure 1-4 for the wiring diagrams.

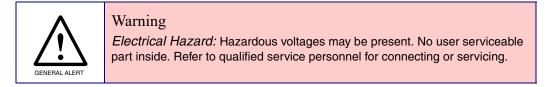
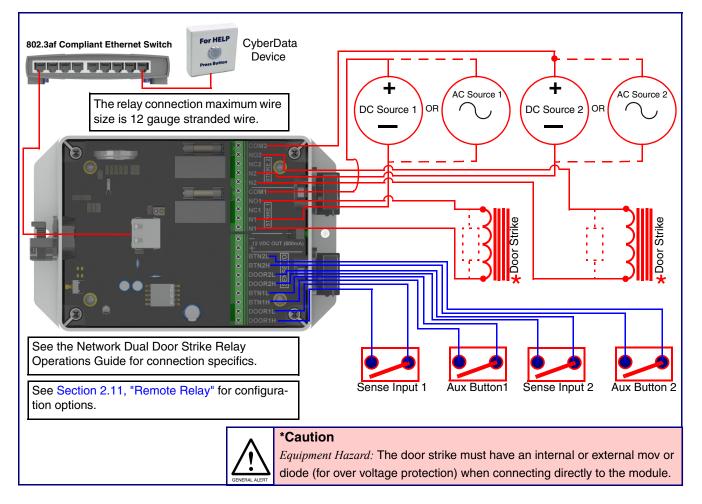


Figure 1-3. Network Dual Door Strike Relay Wiring Diagram with External Power Source



1.2.3 Network Dual Door Strike Relay Wiring Diagram Using PoE+

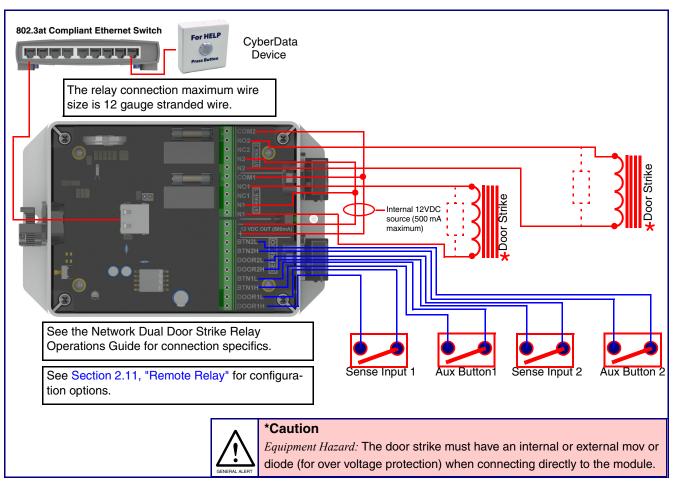


Figure 1-4. Network Dual Door Strike Relay Wiring Diagram Using PoE+

If you have questions about connecting door strikes or setting up the web configurable options, please contact our support department at the following website:

https://support.cyberdata.net/

1.3 Activity and Link LEDs

1.3.1 Verifying the Network Connectivity and Data Rate

When you plug in the Ethernet cable or power supply to the Intercom, the following occurs:

- The square, GREEN Network Link/Activity LED blinks when there is network activity (see Figure 1-5).
- The square, **AMBER 100 Mb Link** LED above the Ethernet port indicates that the network 100 Mb connection has been established (see Figure 1-5).

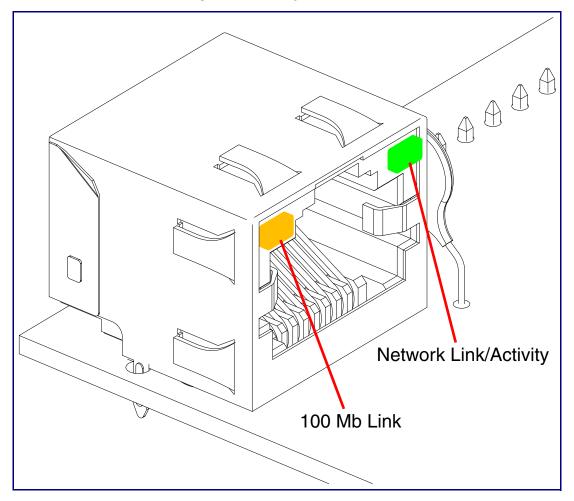


Figure 1-5. Activity and Link LED

1.4 Call Button and the Call Button LED

1.4.1 Calling with the The Call Button

- You may initiate a call by pressing the Call Button.
- An active call is indicated by the Call Button LED blinking at one second intervals.
- The device automatically answers an incoming call.
- You can press the Call Button to terminate an active call.

1.4.2 Call Button LED Function

- Upon initial power or reset, the Call Button LED will illuminate.
- On boot, the Call Button LED will flash ten times a second while setting up the network and downloading autoprovisioning files.
- The device autoprovisions by default, and the initial process may take several minutes as the device searches for and downloads updates. The Call Button LED will blink during this process. During the initial provisioning, or after the factory defaults have been reset, the device may download firmware twice. The device will blink, remain solid for 10 to 20 seconds, and then resume blinking. This process will take longer if there are many audio files downloading.
- When the software has finished initialization, the Call Button LED will blink twice.
- When a call is established (not just ringing), the Call Button LED will blink.
- On the Device Page (see Section 2.3, "Device"), there is an option called Button Lit When Idle. This option sets the normal state for the indicator LED. The Call Button LED will still blink during initialization and calls.
- The Call Button LED flashes briefly at the beginning of RTFM mode.

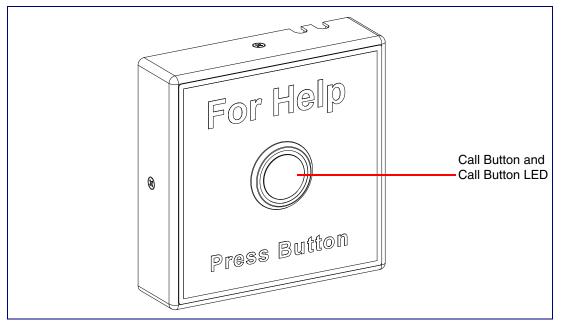


Figure 1-6. Call Button and Call Button LED

2 Configure the Device

2.1 Log In Page

- 1. Open your browser to the device IP address.
- **Note** If the network does not have access to a DHCP server, the device will default to an IP address of 192.168.1.23.
- Note Make sure that the PC is on the same IP network as the SIP Call/Alert Button.
- **Note** You may also download CyberData's VoIP Discovery Utility program which allows you to easily find and configure the default web address of the CyberData VoIP products.

CyberData's VoIP Discovery Utility program is available at the following website address:

https://www.cyberdata.net/pages/discovery

- **Note** The device ships in DHCP mode. To get to the **Home** page, use the discovery utility to scan for the device on the network and open your browser from there.
- 2. On the Log In Page (Figure 2-1), use the following default Web Access Username and Web Access Password to access the Home Page (Figure 2-3):

Web Access Username: admin

Web Access Password: admin

Figure 2-1. Log In Page



2.1.1 Restoring Defaults

The RTFM button is located on the back of the device.

To restore the device to its factory default settings (Table 2-1), hold the RTFM button for approximately seven seconds.

The device will default to DHCP to obtain an IP address, or will use 192.168.1.23 if a DHCP server is not present.

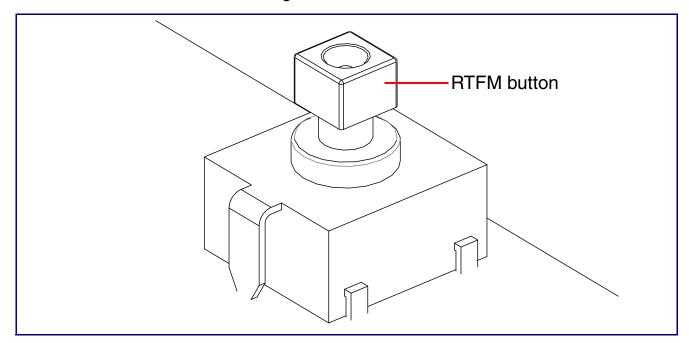


Figure 2-2. RTFM Button

Table 2-1.	Factory	Default	Settinas
	1 40101 9	Donaun	oottingo

Parameter	Factory Default Setting	
IP Addressing	DHCP	
IP Address ^a	192.168.1.23	
Web Access Username	admin	
Web Access Password	admin	
Subnet Mask ^a	255.255.255.0	
Default Gateway ^a	192.168.1.1	

a. Default if there is not a DHCP server present.

2.2 Home Page

The **Home** page provides device specific information such as Serial Number, Mac Address, and Firmware version. This page is designed as an initial landing page to provide general information on the status of the device.

Cyber The IP Endpoir	Data tr Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20 : f7:05:2a:97	Available Storage Device Status: Idl		Test Save Cancel	Reboot Logout
* * *		Device Configuration	Ne	twork Status		SIP Registration	
2 ● 2	Serial Number Mac Address Firmware Version Partition 2 Partition 3 Booting Partition	049204479 00:2017:05:2a:97 v22.0.3 v22.0.3001 v22.0.3 partition 3	IP Address Protocol IP Address Subnet Mask Default Gateway DNS Server 1 DNS Server 2	DHCP 10.10.0.14 255.00.0 10.0.0.1 10.0.1.56	SIP Mode: Primary Server: Backup Server 1: Backup Server 2:	Enabled Not registered Not registered Not registered	
*		Sensor Status	Syster	n Configuration			
** C	Relay Status: Door Status: Intrusion:	Locked Closed Inactive	SIP Mode: Event Mode:	Enabled Disabled			
±. ≜	RGB Strobe:	Installed					
			CyberDat	a • Support			

Figure 2-3. Home Page

2.3 Device

The **Device** page allows for adjustment of settings that pertain to the physical device such as relay settings and time zone.

CyberData Product: Call Button The IP Endpoint Company Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485 Device Status: Idle	MB Test Save Cancel Reboot Logout
Relay Settings Time Settings		Misc Settings	
Relay Settings Control Relay with DTMF Code: DTMF Pulse Code: DTMF Pulse Code: DTMF Pulse Code: DTMF Activation Code: Asia DTMF Desctivation Code: DTMF Activation Code: Basia DTMF OPENSION: Basia	nds NTP Server: NTP Timecone: Current Time: Stored Mc Stored Message Recording:	north-america.pool.ntp.org America/Los_Angeles (-8) Tue, 19 Nov 2024 16:5648	Misc Settings Device Name: Device Name: Call Button Button Hold Timeout: 2000 Button LED Lit when Idle: N V Button LED Brightness: 255 Prevent Call Termination: OFF V
	CyberData	Support	

Figure 2-4. Device Page

2.4 Network

The **Network** tab provides access to network-related settings. Assigning the device a static IP address or VLAN is done on this page.

Cy The IP	berData Product: Call Button Endpoint Company Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485 Device Status: Idle	MB Test Save Cancel Reboot Logout
ر 🔉 🗞 🔌	Network Status		rk Settings	VLAN Settings
	IP Address 10.100.14 Subnet Mask 255.0.00 Debuilt Gateway 10.0.0.1 DNS Server 1 10.0.156 DNS Server 2	Hostname: IP Address: Subnet Masic Default Gateway: DNS Server 1: DNS Server 2:	DHCP v SipDevice052897 10.10.10.10 10.00.1 10.00.1 10.00.1 60 seconds	VLAN Priority: 0 0
		Cyberbata	Support	

Figure 2-5. Network Page

2.5 SIP (Session Initiation Protocol)

This page sets the options for phone calls. Configure up to 3 servers, with 2 acting as backup, and a server for the nightringer. The nightringer is a second sip extension that only rings, never connects to a call. Many customers use the nightringer in a hunt group.

Use this page to configure the options for security, transport, codec, and others.

Note For specific server configurations, go to the following website address:

https://www.cyberdata.net/pages/connecting-to-ip-pbx-servers

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97		e Storage: 148! Status: Idle	5МВ	Test Save Cancel	Reboot Logout
	SIP Settings	SIP S	erver Settings		Di	al Out Settings	
SIP Operation: SIP Registration: Remote SIP Port: Local SIP Port: Local SIP Port: Local SIP Port: Local SIP Port: Local SIP Port: Call SIP Port: Local SIP Port: Local SIP Port: Call SIP Port: Local SIP Port: Call SIP Port: C	1.2 OFF V 0 0 ery: OFF V 10000 milliseconds (ms) Aelay: 10 9 0 00FF V 0 00FF V 0 00FF V 0 00FF V 0	Primary SIP Server: Primary SIP Javiti ID: Primary SIP Javiti ID: Primary SIP Javiti ID: Registration Interval: Backup SIP Parer ID: Backup SIP Javiti ID:	10.10.178 602 558NmZujem 10.000 8600 seconds Backup SIP Auth ID Backup SIP Auth Password 360 seconds Host or IP address Backup SIP Auth Password 360 seconds Backup SIP Auth Password 360 seconds		Dialout Extension: Extension ID: Send Multicast Audio: Multicast Address: Multicast Address: Repeat Message:	603 id204 DISABLED V 224.5.5 5050 1 1	

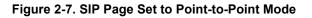
Figure 2-6. SIP Page

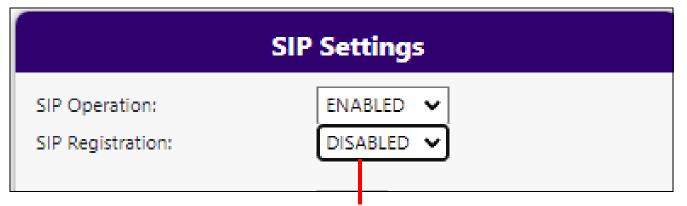
2.5.1 Dial Out Extension Strings and DTMF Tones (using rfc2833)

Outgoing calls support delayed DTMF (rfc2833) with the first comma pausing 2 seconds and subsequent commas pausing 1 second.

2.5.2 Point-to-Point Configuration

Dialing point-to-point allows the device to call and a single endpoint. All CyberData endpoints and many phones can use this option. To do this, enable **SIP Operation**, do not enable **SIP Registration**, and use the endpoint's IP address as the Dial Out extension. Delayed DTMF is supported. See Figure 2-7.





Device is set to NOT register with a SIP server

2.6 SSL

The **SSL** tab allows for the adjustment of certificates used by the device. The certificates used for the web server, SIP Client, and Autoprovisioning can be changed here. It is also possible to add additional CA certificates on this page. CA Certificates allow the device to authenticate servers that it contacts.

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485MB Device Status: Idle	Test	Save Cancel Reboot Logout
	Web Server Certificate subject= contryName = US stato/ProvinceName = California localityName = Oberdata organizationName = Oberdata commovinceName = 00207952007 notafefores-Joi 11 18:13:102 2023 Off motifierd-Joi 18:13:102 2023 Off notafefores-Joi 11 Bis:13:02 2023 Off motifierd-Joi 18:13:102 203 off notafefores-Joi 13 Bis:102 2023 Off motifierd-Joing Motifierd 19:13:102 2023 Off motifierd-Joing motifierd-Joing Bis:1002 2023 Off Motifierd-Decomment Bis:1002 2023 Off Mot	SIP Client Ce subject contryliam stateOrProvinceliame localitylene organizationtam notderon=Jul 11 18:131:00 notafter=Jul 13 18:131:00 notafter=Jul 13 18:131:00 notafter=Jul 13 18:131:00 notafter=Jul 13 18:131:00 notafter=Jul 13 18:131:00 notafter=Jul 13:131:00 notafter=Jul	= US = California = Nonterey = Opberdata = 0020F7052a97 2023 off 2023 off sess off tificate	Autoprovisioning Cli subject= countryName stateOr/ProvinceName organizationName netBefore=Jul 8 18:11:02 20 incAffer=Jul 8 18:11:02 20 inchoose Files No file chu Import Autoprovisioni Restore Autoprovisioni Password (optional):	= us = (alifornia = doterey = cyberdata = eazerraza as off sen ng Certificate
		List of Trust Noad CA Certificate: Choose Files No file cho mload CyberData CA Generate Cyberda	sen Import CA Certificate		
	CyberData_CA.pem DigiCert_Assured_ID_Root_CA.crt		Info	Remove	
	DigiCert_Assured_ID_Root_G3.crt DigiCert_Assured_ID_Root_G3.crt DigiCert_Global_Root_G4.crt		Info	Remove	
	6 DigiCert_Global_Root_G2.crt 7 DigiCert_Global_Root_G3.crt		Info		
	8 DigiCert_High_Assurance_EV_Root_CA	ucrt CyberData • Supj	Info	Remove	

Figure 2-8. SSL Page (1 of 2)

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485MB Device Status: Idle	Test	Save Cancel Reboot Logo
# 0;	9 DigiCert_Trusted_Root_G4	crt	Info	Remove	
5)	10 GeoTrust_Global_CA.crt		Info	Remove	
	11 GeoTrust_Primary_Certifica	tion_Authority.crt	Info	Remove	
	12 GeoTrust_Primary_Certifica	ation_AuthorityG2.crt	Info	Remove	
	13 GeoTrust_Primary_Certifica	ation_AuthorityG3.crt	Info	Remove	
	14 GeoTrust_Universal_CA.crt		Info	Remove	
€	15 GeoTrust_Universal_CA_2.c	rt	Info	Remove	
	16 Go_Daddy_Class_2_CA.per	n	Info	Remove	
	17 Go_Daddy_Root_Certificat	e_AuthorityG2.pem	Info	Remove	
	18 VeriSign_Class_3_Public_Pr	imary_Certification_AuthorityG4.crt	Info	Remove	
	19 VeriSign_Class_3_Public_Pr	imary_Certification_AuthorityG5.crt	Info	Remove	
	20 VeriSign_Universal_Root_C	ertification_Authority.crt	Info	Remove	
	21 Verisign_Class_1_Public_Pr	imary_Certification_Authority.crt	Info	Remove	
	22 Verisign_Class_1_Public_Pr	imary_Certification_AuthorityG3.crt	Info	Remove	
	23 Verisign_Class_2_Public_Pr	imary_Certification_AuthorityG2.crt	Info	Remove	
	24 Verisign_Class_2_Public_Pr	imary_Certification_AuthorityG3.crt	Info	Remove	
	25 Verisign_Class_3_Public_Pr	imary_Certification_Authority.crt	Info	Remove	
	26 Verisign_Class_3_Public_Pr	imary_Certification_AuthorityG3.crt	Info	Remove	
	27 thawte_Primary_Root_CA.c	irt	Info	Remove	
	28 thawte_Primary_Root_CA_	G2.crt	Info	Remove	
	29 thawte_Primary_Root_CA_	G3.crt	Info	Remove	
la seconda de la companya		CyberData • Sup	inort		

Figure 2-9. SSL Page (2 of 2)

2.7 Sensor

The door sensor (pins 5 and 6) on the header can be used to monitor a door's open or closed state. There is an option on the **Sensor** page to trigger on an open or short condition on these pins. The door sensor alarm will be activated when the **Door Open Timeout** parameter has been met.

The intrusion sensor is an optical sensor installed on the device board and will be activated when the device is removed from the case.

Each sensor can trigger up to three different actions:

- Flash the LED until the sensor is deactivated (roughly 10 times/second)
- Activate the relay until the sensor is deactivated
- Call an extension and play a pre-recorded audio file
- **Note** Calling a preset extension can be set up as a point-to-point call, but currently can't send delayed DTMF tones.

Figure 2-1). Sensor Page
------------	----------------

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485MB Device Status: Idle	Test Save Cancel Reboot Logout
* * •		Door Sensor Settings	Intrusion Sensor Settings	
	Sensor Type: Open Timeout: Flash Button LED: Activate Relay: Call Extension: Dial Out Extension: Dial Out Extension: Dial Out D: Play Recorded Audio: Message Playbacks:	Door Sensor Settings	Intrusion Sensor Settings Fiash Button LED: Activate Relay: Gall Extension: Dial Out Ib: Play Recorded Audio: Message Playbacks: 0	
		CyberData	• Support	

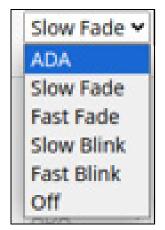
2.8 Strobe

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485MB Device Status: Idle	Test	Save	Cancel	Reboot	Logout
* 03								
Q		SIP RGB Strobe	Settings					
с.,		SIP Operation En						
		Activate Strobe during Scene Brightness Color Red	Green Blue					
8		ADA 💙 255 Color - 255	255 255 Preview					
a		SIP Registration E	nabled					
		Sensor RGB Strob	e Settings					
*		Activate Strobe on Door S						
0 ±		Scene Brightness Color Red	Green Blue					
1 1 1		ADA 💙 255 Color - 255	255 255 Preview					
		Activate Strobe on Intrusion	Sensor: OFF 🗸					
		Scene Brightness Color Red						
		ADA 255 Color - 255	255 255 Preview					
		CyberData • Suppo	t					

Figure 2-11. Strobe Page

For each option, there are 5 scenes available:

Figure 2-12. 5 Scenes Available



Use the red, green, and blue values to create custom colors.

The ADA scene flashes white at maximum brightness (255). Other scenes can adjust the brightness, from 0 to 255.

Color -	255
White	
Yellow	
Orange	
Red	
Pink	
Purple	
Blue	
Teal	
Green	
Lime	

Figure 2-13. 10 Colors

2.9 Audiofiles

The **Audiofiles** page is used to add custom audio to the board. User-uploaded audio will take precedence over the audio files shipped with the device.

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97		Available Storage: 1485MB Device Status: Idle	Test	Save Cancel R
*						
03 10		Audio F	Files			
C	0:	Currently set to:	default	Choose File No file chosen	Save Delete	
• •	1:	Currently set to:	tenpulse.wav	Choose File No file chosen	Save Delete	
8	2:	Currently set to:	default	Choose File No file chosen	Save Delete	
	3:	Currently set to:	default	Choose File No file chosen	Save Delete	
	4:	Currently set to:	default	Choose File No file chosen	Save Delete	
*	5:	Currently set to:	default	Choose File No file chosen	Save Delete	
2 1	6:	Currently set to:	default	Choose File No file chosen	Save Delete	
A	7:	Currently set to:	default	Choose File No file chosen	Save Delete	
	8:	Currently set to:	default	Choose File No file chosen	Save Delete	
	9:	Currently set to:	default	Choose File No file chosen	Save Delete	
	Door Ajar:	Currently set to:	default	Choose File No file chosen	Save Delete	
	Intrusion Sensor Triggered:	Currently set to:	default	Choose File No file chosen	Save Delete	

Figure 2-14. Audiofiles Page (1 of 2)

Figure 2-15. Audiofiles Page (2 of 2)

Menu Audio Files								
Invalid Entry:		Currently set to:	default	Choose File No file chosen	Save	Delete		
Press:)	Currently set to:	default	Choose File No file chosen	Save	Delete		
Enter Recording Security Code:		Currently set to:	default	Choose File No file chosen	Save	Delete		
Invalid Code:	Ĵ	Currently set to:	default	Choose File No file chosen	Save	Delete		
Or:		Currently set to:	default	Choose File No file chosen	Save	Delete		
Record Message Prompt:		Currently set to:	default	Choose File No file chosen	Save	Delete		
Save Record Message Prompt:		Currently set to:	default	Choose File No file chosen	Save	Delete		
Message Saved Succesfully:)	Currently set to:	default	Choose File No file chosen	Save	Delete		
Message Not Saved Succesfully:		Currently set to:	default	Choose File No file chosen	Save	Delete		
You Recorded:		Currently set to:	default	Choose File No file chosen	Save	Delete		
To Record SIP Button Message:		Currently set to:	default	Choose File No file chosen	Save	Delete		
To Record Multicast Button Message:		Currently set to:	default	Choose File No file chosen	Save	Delete		
		Stored N	lessages					
SIP Button Message:	Currently set to:	default	Choose File	No file chosen	Save	Delete		
Multicast Button Message:	Currently set to:	default	Choose File	No file chosen	Save	Delete		
		Recorded	Messages					
Choose Fil	e No file chosen	U	pload Message	Delete All Messages				

2.10 Events

The **Events** page specifies a remote server that can be used to receive HTTP POST events when actions take place on the device.

Cyl The IP I	DerData Product: Call Button Endpoint Company Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Stor Device Status		Test Save	Cancel	Reboot	Logout
* 8 3		Event Server		Events				
		eneration: DISABLED P Address: 10.0.250 ort: 8080	Application Started Events: Reboot Events: Heartbeat Events: Call Started Events: Call Terminated Events: Relay Activated Events: Remote Relay Events: Button Events: Sensor Events:	Events DISABLED * DISABLED *				
		CyberData	• Support					

Figure 2-16. Events Page

2.10.1 Example Packets for Events

The server and port are used to point to the listening server and the 'Remote Event Server URL' is the destination URL (typically the script running on the remote server that's used to parse and process the POST events).

Note The XML is URL-encoded before transmission so the following examples are not completely accurate.

Here are example packets for every event:

```
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 197
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>APPLICATION STARTED</event>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 199
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>HEARTBEAT</event>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 196
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>BUTTON</event>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 201
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>CALL ACTIVE</event>
</cyberdata>
```

```
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 205
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>CALL TERMINATED
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 197
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>RINGING</event>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 234
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>MULTICAST START
<index>8</index>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 233
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>MULTICAST STOP</event>
<index>8</index>
</cyberdata>
POST xmlparse engine HTTP/1.1
Host: 10.0.3.79
User-Agent: CyberData/1.0.0
Content-Length: 234
Content-Type: application/x-www-form-urlencoded
<?xml version="1.0" encoding="ISO-8859-1"?>
<cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'>
<event>RELAY ACTIVATED</event>
</cyberdata>
```

POST xmlparse_engine HTTP/1.1 Host: 10.0.3.79 User-Agent: CyberData/1.0.0 Content-Length: 234 Content-Type: application/x-www-form-urlencoded <?xml version="1.0" encoding="ISO-8859-1"?> <cyberdata NAME='CyberData VoIP Device' MAC='0020f70015b6'> <event>RELAY_DEACTIVATED</event> </cyberdata>

2.11 Remote Relay

Figure 2-17. Remote Relay Page

Cy The IP		duct: Call Button nware: v22.0.3			erial: 049204479 //AC: 00:20:f7:05:			ailable Stor vice Status:		ИВ	Test	Save	Cancel	Reboot	Logout
# 03	Discovered Remote Relays														
0			Product Type	IP Address	MAC Address	Serial Number	Name	Version		Discover					
* U			DoorLock	10.10.0.51	00:20:f7:05:5e:21	375200300	LOCK375200300	v5.0.4	View	Associate					
\$															
≈ ≙ ※															
0															
±. ≜															
						CyberData • Sup	oport								

2.12 Terminus

Terminus Cloud Control[™] allows users to configure, monitor, and manage notification functions for CyberData's extensive VoIP product line, all from a single, easy-to-use platform. To learn more about Terminus Cloud Control[™], go to <u>https://www.cyberdata.net/pages/terminus</u>.

The **Terminus** page allows for configuration of settings related to Terminus Cloud Control[™].

Figure 2-18. Terminus Page

Cyb	DerData Indpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20 : f7:05:2a:97	Available Storage: 1 Device Status: Idle	485MB Test	Save Cancel Reboot	Logout
	Methodat Company		MAC: 00:20:f7:05:2a:97 Disco Multicast Address: Time to Live: Discovery Interval:		485MB Test	Save Cancel Reboot	
			64-04-	• Support			

2.13 Autoprovisioning

Enabling autoprovisioning allows the device to download provisioning files from a server. It defaults to using DHCP, with options configured in dhcpd.conf on the DHCP server. The file name is <mac address>.xml and if not found, 00000cd.xml.

If a server is named, DHCP is bypassed, and the device will look for a file on the named server.

If a file is named, it will be downloaded instead of <mac address>.xml.

If a server is named, **Use tftp** searches for the file on a tftp server instead of http. If the server is secured (with a password), use **Verify Server Certificate** (username/password) to access it. When using DHCP, these options are configured in dhcpd.conf.

Autoprov autoupdate, Autoprov at time, and Autoprov when idle options are available with either DHCP or a named server.

The template is an xml file with all options set to default values.

Figure 2-19. Autoprovisioning Page

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20 :f 7:05:2a:97	Available Storage: 1484MB Device Status: Idle	Test Save Cancel Reboot Logout
	Firmware: v22.0.3 Autoprov: Autoprov Server: Autoprov Filename: Use thp: Verify Server Certificate: Username: Password: Autoprov autoupdate: Autoprov at time: Autoprov at time: Autoprov at time:			Test Save Cance Reboot Logout
		CyberData •	Support	

2.14 Firmware

Note CyberData strongly recommends that you do not upgrade the firmware when the device is likely to be in use.

To upgrade the firmware of your device:

- 1. Download the latest firmware from the following CyberData web site, and locate your device: https://www.cyberdata.net/collections/sip
- 2. Unzip the firmware version file. This file may contain the following:
- Firmware file
- Release notes
- Autoprovisioning template



Figure 2-20. Firmware Page

CyberData The IP Endpoint Company	Product: Call Button Firmware: v22.0.3	Serial: 049204479 MAC: 00:20:f7:05:2a:97	Available Storage: 1485MB Device Status: Idle	Test Save Cancel Reboot Logout
* 0		Firmura 6		
0 L		Firmware So Firmware Versio Choose File No file ch	on: v22.0.3	
•		Upload Pr		
© 		Upload Post F	Processing	
		Status Me		
** 3 *				
4				
		CyberData • Supp	port	

2.15 Admin

The administrator uses the Users List to create new accounts, assigning user names and passwords, and granting access to specific web pages.

ata mpany														Test Sav	ve Cancel	Reboot	Logout
Username: Password: Confirm Password: Storsge: Boot Count: Reboot Count: Uptime:	5 5 1 7 6	admin atistics 1485MB 76 56	s			Network Traffic: Get App Get Ne Get J	lication Log twork Log All Logs	4 OFF V Remo Rem	ve Applicatio ove Network move All Lo	Log	Part	ition 3 ting Partition Restore E	Default Config	v22.0.3b01 v22.0.3 partition 3 Restor	e Default Ce		
Username term ssi1	Home	Device	Network	SIP	SSL	\dd New User Sensor			t Users Ex Events	Dort Users DSR	Terminus	Autoprov	Firmware	Admin	Edit Edit	Delete Delete	
					Service	: [Application			Sort: Oidest	View Lo	g						
	Username: Password: Confirm Password: Storage: Boot Count: Reboot Count: Uptime: Username term	Admi Username: Password: Confirm Password: Storage: Boot Count: Quptime: Username Home term	Admin Setting Username: Password: Confirm Password: Statistics Storage: 1485MB Boot Count: 76 Reboot Count: 66 Uptime: up 4 minutes Username Home Device term	Admin Settings Username: admin Password: Confirm Password: Statistics Storage: 1485MB Boot Count: 76 Reboot Count: 66 Uptime: up 4 minutes Username Home Device Network term	Admin Settings Username: admin Password: am Confirm Password: am Statistics Storage: 1485MB Boot Count: 76 Reboot Count: 66 Uptme: up 4 minutes	Admin Settings Username: admin Password: Confirm Password: Statistics Storage: 1485MB Boot Count: 66 Ugtme: up 4 minutes Username Passuance Statistics	Admin Settings Username: admin Password: admin Confirm Password: admin Statistics admin Storage: 1485MB Boot Count: 66 Uptime: up 4 minutes	Admin Settings Loggi Username: ddmin Password: Confirm Password: Statistics Retrieving the log files ma Lytime: Lytime: Username Home Device Network SIP SSt Sensor Senvice: Application Senvice: Application	Admin Settings Logging Setting Username: admin Password: admin Confirm Password: admin Statistics Get Application Log Storage: 1485MB Boot Count: 66 Uptime: up 4 minutes Username Ugername Home Device Network Signage: 1485MB Boot Count: 66 Uptime: up 4 minutes Username Home Device Network SIP SSL Sensor Stril Import Log Viewer	Admin Settings Logging Settings Username: admin Password:	Admin Settings Logging Settings Username: admin Password:	MAC: 00:20:17:05:24:97 Device Status: Idle Admin Settings Logging Settings Username:	Markey Firmware: V22.0.3 MAC: 002/017/05/24:97 Device Status: Idle Admin Settings	MAC 00:2017/35:22:57 Device Status: Idle Admin Settings Logging Settings Basenda: Statistics Boto Count: Get Application Log Remove Application Log Boto Count: Contername Conternam	Parton Firmware: v22.03 MAC: 00:20ff/05:22:57 Device Status: Idle Admin Settings Idlemane Gentim Idlemane Stansord: Image: Idlemane Idlemane Idlemane Status: Idle Idlemane Idlemane Idlemane Status: Idlemane Idlemane Idlemane Idlemane Idlemane Idlemane Idlemane Idlemane Idlemane <	Partner Partner Admin Settings Logging Settings Username: admin Partner admin Storage: admin Storage: 1435MB Bott Court: 66 Upter Certifies Traine Retreving the log files may take some time due to their size. Import Config Vestore Default Config Upter Get All Logs Remove All Logs Retreving the log files may take some time due to their size. Import Config Report Config Upter Upter Configuration Settings Remove All Logs Retreving the log files may take some time due to their size. Import Config Report Config Upter Upter Configuration Settings Retreving the log files may take some time due to their size.	Market v2203 MAC 002047/3524:37 Device Stature (de Admin Settings Logging Settings Username: imm Statistics Storage: 1433/8 Boot Count: 66 Add New User Remove Application Log Retrieving the log files may take some time due to ther size. Username: Home Device Network SIP Statistics Statistics Statistics Storage: 1433/8 Boot Count: 66 Uptime Get Application Log Retrieving the log files may take some time due to ther size. Username: Home Device Network SIP Statistics Statistics Retrieving the log files may take some time due to ther size. Username: Home Device Network SIP Statistics Statistics Statistics Statistics Statistics Retrieving the log files may take some time due to ther size. Username: Home Device Network SIP Statistics Statistics Statistics Statistics Statistics Statistics Statistics Retrieving the log files may take some time due to ther size. Username: Log Viewer Statistics Statistics Statistics Statistics Statistics Statistics Statistics Statistics </td

Figure 2-21. Admin Page

2.16 Command Interface

Some functions on the device can be activated using simple POST commands to the web interface. The examples in Table 2-2 use the free unix utility, **wget commands**. However, any program that can send HTTP POST commands to the device should work.

2.16.1 Command Interface Post Commands

Note These commands require an authenticated session (a valid username and password to work).

Device Action	HTTP Post Command ^a
Reboot	wgetuser adminpassword adminauth-no-challengequiet - O /dev/nullno-check-certificate "https://10.10.1.154/command" post-data "request=reboot"
Place call to extension (example: extension 600)	wgetuser adminpassword adminauth-no-challengequiet - O /dev/nullno-check-certificate "https://10.10.1.154/command" post-data "request=call&extension=600"
Test Relay	wgetuser adminpassword adminauth-no-challengequiet - O /dev/nullno-check-certificate "https://10.10.1.154/command" post-data "request=test_relay"
Swap boot partitions	wgetuser adminpassword adminauth-no-challengequiet - O /dev/nullno-check-certificate "https://10.10.1.154/command" post-data "request=swap_boot_partition"

Table 2-2. Command Interface Post Commands

a.Type and enter all of each http POST command on one line.

Appendix A: Troubleshooting/Technical Support

A.1 Contact Information

Contact CyberData Corporation 3 Justin Court Monterey, CA 93940 USA <u>www.cyberdata.net</u> Phone: 831-373-2601 Fax: 831-373-4193

Sales Sales 831-373-2601, Extension 334

TechnicalThe fastest way to get technical support for your VoIP product is to submit a VoIP TechnicalSupportSupport form at the following website:

https://support.cyberdata.net/

The Support Form initiates a ticket which CyberData uses for tracking customer requests. Most importantly, the Support Form tells us which PBX system and software version that you are using, the make and model of the switch, and other important information. This information is essential for troubleshooting. Please also include as much detail as possible in the **Comments** section of the Support Form.

Phone: (831) 373-2601, Extension 333

A.2 Warranty and RMA Information

The most recent warranty and RMA information is available at the following website address:

https://support.cyberdata.net/

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