



Wildix Configuration Guide: SIP Paging Server

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Revision Information

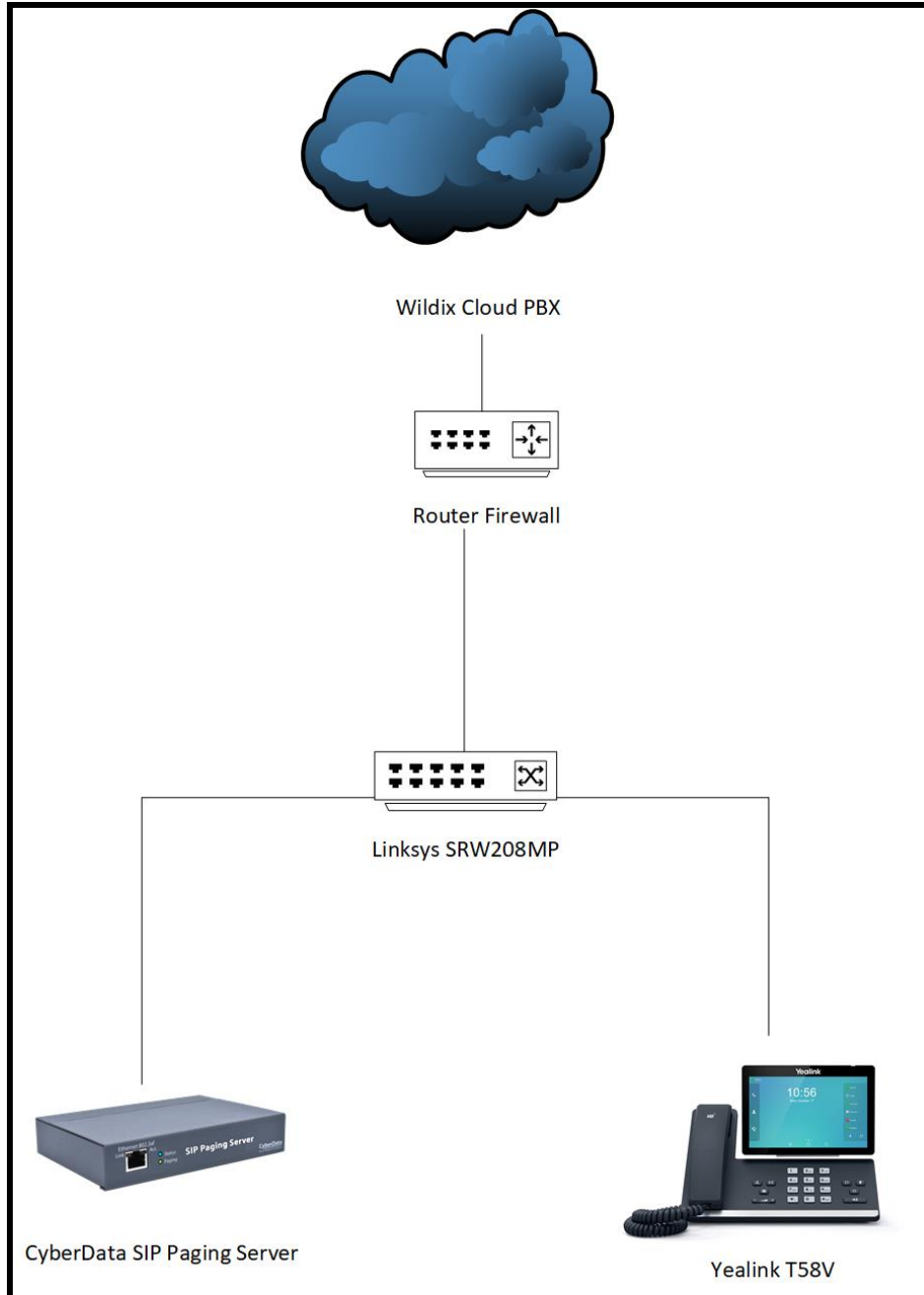
- 10/7/2021 – Initial Release

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1.0 Setup Diagram

Figure 1-1: Interoperability Test Infrastructure



2.0 Test Setup Equipment

This section describes the products used for interoperability testing with Wildix.

Table 2-1: Setup Equipment

EQUIPMENT	MODEL or PART NUMBER	FIRMWARE VERSION
CYBERDATA SIP PAGING SERVER	011146	20.0.0
YEALINK	T58A	58.83.3.6
LINKSYS SWITCH	SRW208MP	---

3.0 Before You Start

This configuration guide documents the integration process of a CyberData SIP Paging Server.

Network Advisories

Wildix uses a Fully Qualified Domain Name (FQDN) for the SIP server address. The CyberData SIP Paging Server needs to perform a DNS A query to resolve the IP address of Wildix's SIP Server FQDN. It is necessary to ensure the configured DNS server(s) have an A record for the SIP Server address.

In addition, be sure to verify the following ports are available for the button to use:

- UDP 5060 (SIP)
- UDP 10500 (RTP)

The paging server will need to traverse the public internet in order to operate with Wildix in the cloud.

The paging server's paging extension uses SIP port 5060 to receive SIP messages. The paging extension will send SIP messages to port 5060, the port used by Wildix's SIP Server.

SIP ports 5060 and RTP port 10500 are the default values on all noted firmware levels.

Alternatively, SIP ports for the paging extension are configurable on the **SIP** page of the web interface.

The CyberData Discovery Utility can be used to locate CyberData devices on your network. You may download it from the following web address:

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

Note: DHCP addressing mode is enabled on default on all noted firmware levels.

Product Documentation and Utilities

Before you start, download the Operation and Quick Start guides from the button's product webpage:

CyberData SIP Call Button ([011146](#))

https://files.cyberdata.net/assets/011146/011146_931803A_SIP_Paging_Server_Operations_Guide.pdf

4.0 Configuration Procedure: Extension Creation


1. Log into Wildix.

Figure 4-1: Log into Wildix



W

Welcome
to Wildix Collaboration

Login

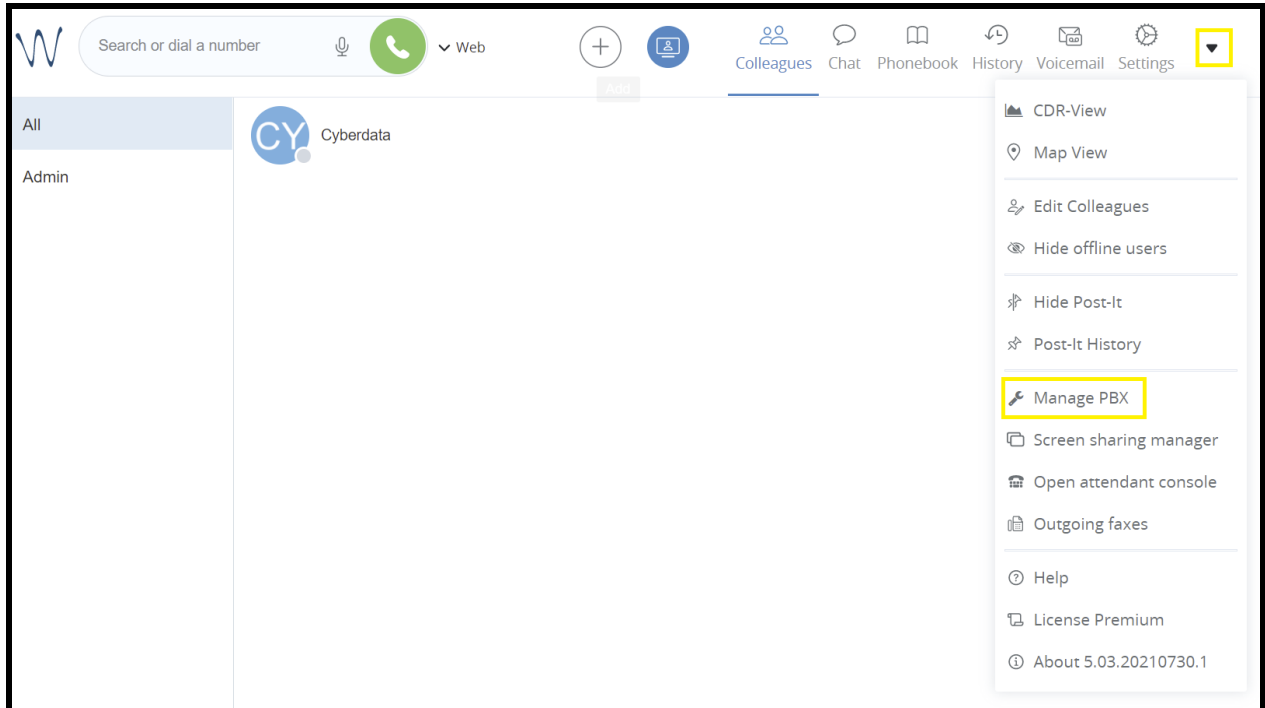
Password 

Remember me

Login with  

- From the landing page select the **Other** down arrow button and pick **Manage PBX..**

Figure 4-2: Manage PBX page



3. On the **Manage PBX** page press the + button to add a new extension. .

Figure 4-3: Manage PBX

	Full Name	Login	Extension	Fax	Office	Email	Mobile	Dialplan	Fax dial...	Group	Department	License type
admin	admin	admin						internalc...	internalc...	Admin		
Rob			201		+1614552123			users	users	New		Premium
Todd			202		+1614552122			users	users	Old		Premium
ZD Paul			203		+16144841530			users	users	Admin		Premium
Cyberdata			300					users	users	Admin		Premium
Yealink Phone			204					users	users	Default		Essential
CyberData Nightringer			301					users	users	Default		Essential

Buttons: + (highlighted), Edit, -, Set passwords, Edit preferences, Send Welcome Message

4. A pop-up to create the extension will appear.

Figure 4-4: Extension creation

Add [Close]

User [v]

Full Name []

Login []

Extension []

Fax []

Office []

Email []

Mobile []

Dialplan users (Internal dialplan) [v]

Fax dialplan users (Internal dialplan) [v]

Language En-us [v]

Group Default [v]

Department []

License type Essential [v]

Ok Cancel

5. Make sure the drop-down menu has **User** selected.
6. Set the full name to the location of the paging server.
7. Set the **Extension Number** desired for the device.

Note: Other values can be set, but for the purposes of this guide all other fields are left blank.

Figure 4-5: Filled Extension Popup

	User
Full Name	CyberData SIP Paging Server
Login	
Extension	300
Fax	
Office	
Email	
Mobile	
Dialplan	users (Internal dialplan)
Fax dialplan	users (Internal dialplan)
Language	En-us
Group	Admin
Department	
License type	Premium

8. Press **Ok** to save the extension.
9. After creating the extension, select it out of the list.

Figure 4-6: Extension Created

	Full Name	Login	Extension	Fax	Office	Email	Mobile	Dialplan	Fax dial...	Group	Department	License type
	admin	admin						internalc...	internalc...	Admin		
	Rob		201		+16145552123			users	users	New		Premium
	Todd		202		+16145552122			users	users	Old		Premium
ZD	Paul		203		+16144841530			users	users	Admin		Premium
	CyberData SIP Paging Server		300					users	users	Admin		Premium
	Yealink Phone		204					users	users	Default		Essential
	CyberData Nighthringer		301					users	users	Default		Essential

10. After selecting the extension, press **Set Passwords**.

11. Click on the **Generate** button to create a password.

Figure 4-7: Set Passwords Popup

12. Click the show button and copy the auto-generated password which will be required in the next section.

5.0 Configuration Procedure: Setting up the Paging Extension

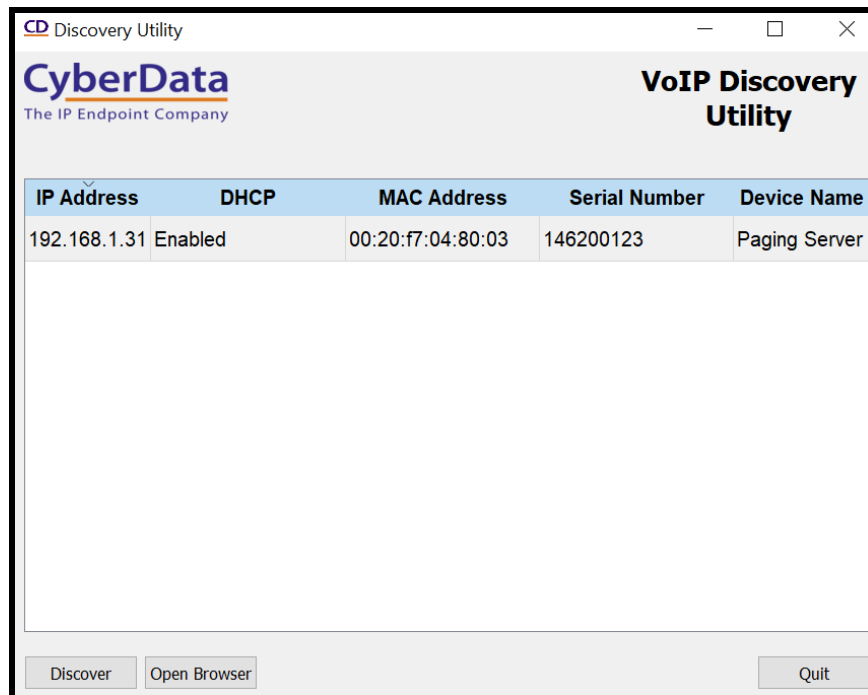
If you are configuring through the web interface, use the following steps to login to the web interface of your CyberData device.

Table 5-1: Setting Name correlation

CyberData Setting	Wildix Provisioning Pop-up
Primary SIP Server	SIP Domain
Primary SIP User ID	Extension Number
Primary SIP Auth ID	Extension Number
Primary SIP Auth Password	Password

1. Click **Launch Browser** from the CyberData Discovery Utility or point your browser to the CyberData device’s IP address to access the Home Page of the web interface.

Figure 5-1: CyberData Discovery Utility

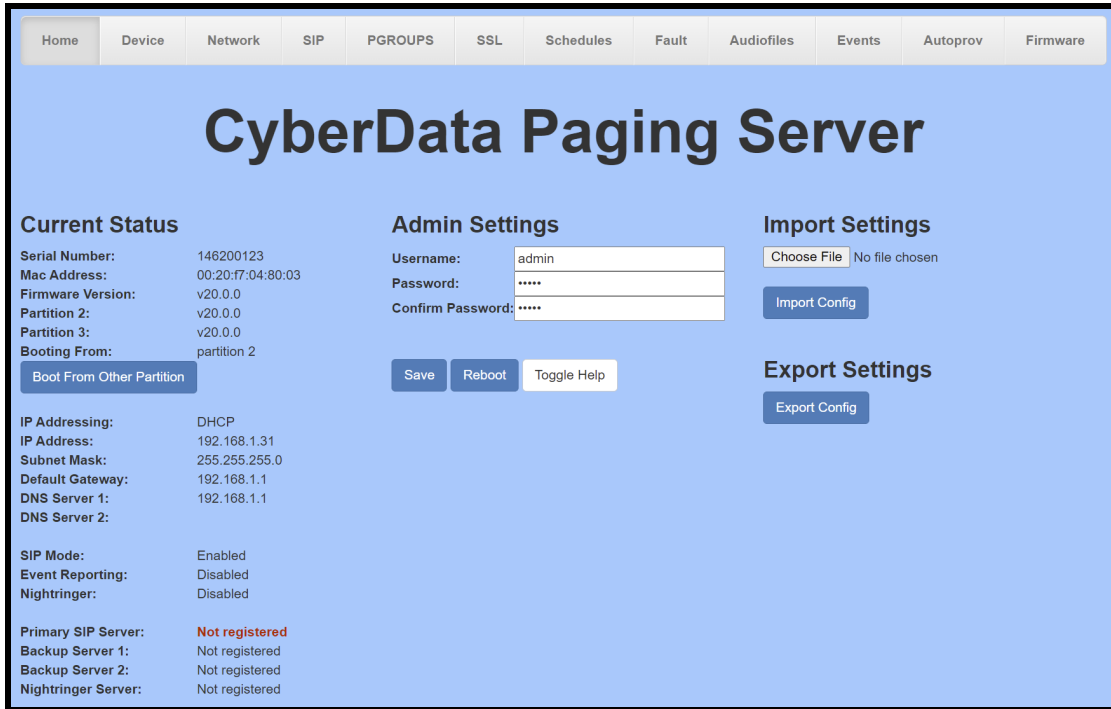


2. Enter the default credentials when prompted and click the **Log In** button.

Username: admin

Password: admin

Figure 5-2: Home Tab



3. Navigate to the SIP tab.

Figure 5-4: SIP Tab

The screenshot displays the configuration interface for the SIP Tab, divided into several sections:

- SIP Settings:** Includes checkboxes for 'Enable SIP operation' and 'Register with a SIP Server' (both checked). Fields for 'Primary SIP Server' (wildixstudent9.wildix.com), 'Primary SIP User ID' (300), 'Primary SIP Auth ID' (300), 'Primary SIP Auth Password' (masked), 'Re-registration Interval (in seconds)' (360), and 'Keep Alive Period' (10000). Backup settings for Server 1 and Server 2 are also present.
- Nightringer Settings:** Fields for 'SIP Server', 'SIP User ID', 'SIP Auth ID', 'SIP Auth Password', 'Re-registration Interval (in seconds)' (360), 'Relay rings to multicast' (unchecked), 'Multicast Address' (224.1.2.32), and 'Multicast Port' (2020).
- Call Disconnection:** 'Terminate Call after delay' set to 0.
- Audio Codec Selection:** 'Codec' set to 'Auto Select'.
- RTP Settings:** 'RTP Port (even)' set to 10500, 'Asymmetric RTP' (unchecked), 'Jitter Buffer' set to 50, and 'RTP Encryption (SRTP)' set to 'Disabled'.
- Other Settings:** 'SIP Transport Protocol' (UDP), 'TLS Version' (1.2 only), 'Verify Server Certificate' (unchecked), 'Outbound Proxy' (empty), 'Outbound Proxy Port' (0), 'Use Cisco SRST' (unchecked), 'Disable rport Discovery' (unchecked), 'Unregister on Boot' (unchecked).

Buttons for 'Save', 'Reboot', and 'Toggle Help' are located at the bottom right of the configuration area.

4. Set the **Primary SIP Server** to the FQDN of the Wildix Server.
5. Set the **Primary SIP User ID** to the extension number.
6. Set the **Primary SIP Auth ID** to the extension number.
7. Set the **Primary SIP Auth Password** to the auto-generated password from the previous section.
8. Set the **Keep Alive Period** to 0.
9. Save.
10. Reboot.

Once the unit reboots it should be registered with Wildix.

Figure 5-5: Home page – Registered

The screenshot shows the 'Home' page of the CyberData Paging Server configuration interface. The page has a blue header with the title 'CyberData Paging Server' and a navigation menu with tabs: Home, Device, Network, SIP, PGROUPS, SSL, Schedules, Fault, Audiofiles, Events, Autopro, and Firmware. The main content area is divided into three columns: 'Current Status', 'Admin Settings', and 'Import Settings'. The 'Current Status' section shows various system parameters like Serial Number, Mac Address, and IP Addressing. The 'Admin Settings' section includes fields for Username (admin), Password, and Confirm Password, along with 'Save', 'Reboot', and 'Toggle Help' buttons. The 'Import Settings' section has a 'Choose File' button and an 'Import Config' button. Below these is an 'Export Settings' section with an 'Export Config' button. At the bottom of the 'Current Status' section, the 'Primary SIP Server' is listed as 'Registered', while 'Backup Server 1' and 'Backup Server 2' are 'Not registered', and 'Nightringer Server' is 'Not registered'.

Section	Parameter	Value
Current Status	Serial Number:	146200123
	Mac Address:	00:20:f7:04:80:03
	Firmware Version:	v20.0.0
	Partition 2:	v20.0.0
	Partition 3:	v20.0.0
	Booting From:	partition 2
	Boot From Other Partition	
	IP Addressing:	DHCP
	IP Address:	192.168.1.31
	Subnet Mask:	255.255.255.0
Default Gateway:	192.168.1.1	
DNS Server 1:	192.168.1.1	
DNS Server 2:		
SIP Mode:	Enabled	
Event Reporting:	Disabled	
Nightringer:	Disabled	
Primary SIP Server:	Registered	
Backup Server 1:	Not registered	
Backup Server 2:	Not registered	
Nightringer Server:	Not registered	

6.0 Configuration Procedure: Setting up the Nightringer Extension

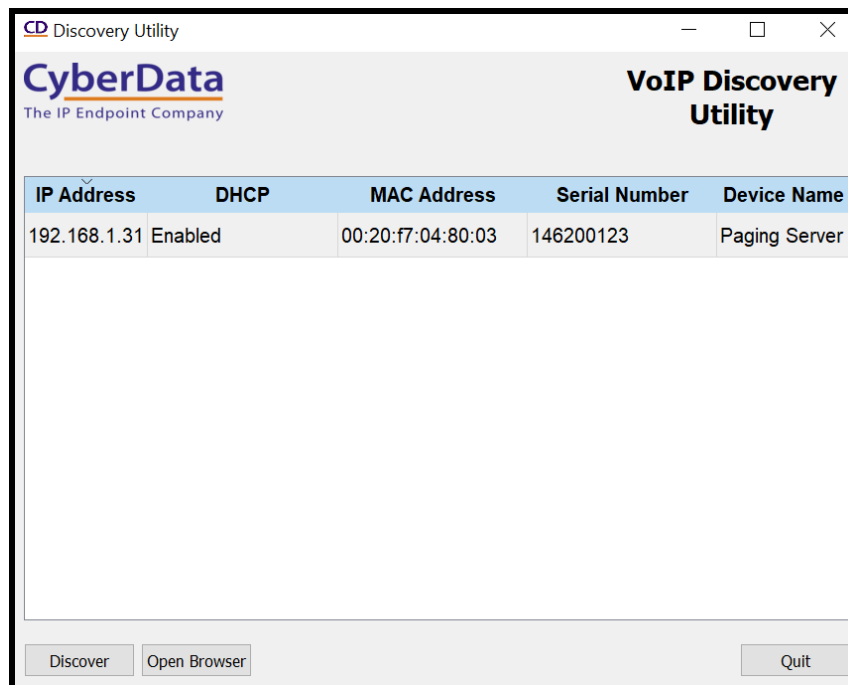
If you are configuring through the web interface, use the following steps to login to the web interface of your CyberData device.

Table 6-1: Setting Name correlation

CyberData Setting	Wildix Provisioning Pop-up
Primary SIP Server	SIP Domain
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Primary SIP Auth ID	Extension Number
Primary SIP Auth Password	Password

1. Click **Launch Browser** from the CyberData Discovery Utility or point your browser to the CyberData device’s IP address to access the Home Page of the web interface.

Figure 6-1: CyberData Discovery Utility



2. Enter the default credentials when prompted and click the **Log In** button.

Username: admin

Password: admin

Figure 6-2: Home Tab

The screenshot shows the 'Home' tab of the CyberData Paging Server configuration interface. At the top, there is a navigation menu with tabs for Home, Device, Network, SIP, PGROUPS, SSL, Schedules, Fault, Audiofiles, Events, Autoprovisioning, and Firmware. The main content area has a light blue background and is titled 'CyberData Paging Server'. It is divided into four main sections: Current Status, Admin Settings, Import Settings, and Export Settings. The 'Current Status' section lists various system parameters like Serial Number, Mac Address, and IP Addressing. The 'Admin Settings' section includes fields for Username, Password, and Confirm Password, along with Save, Reboot, and Toggle Help buttons. The 'Import Settings' section has a 'Choose File' button and an 'Import Config' button. The 'Export Settings' section has an 'Export Config' button.

Section	Parameter	Value
Current Status	Serial Number:	146200123
	Mac Address:	00:20:f7:04:80:03
	Firmware Version:	v20.0.0
	Partition 2:	v20.0.0
	Partition 3:	v20.0.0
	Booting From:	partition 2
Admin Settings	Username:	admin
	Password:	*****
	Confirm Password:	*****
	Buttons:	Save, Reboot, Toggle Help
	Import Settings	
	Buttons:	Import Config
Export Settings		
Buttons:	Export Config	
Current Status	IP Addressing:	DHCP
	IP Address:	192.168.1.31
	Subnet Mask:	255.255.255.0
	Default Gateway:	192.168.1.1
	DNS Server 1:	192.168.1.1
	DNS Server 2:	
	SIP Mode:	Enabled
	Event Reporting:	Disabled
	Nightringer:	Disabled
	Primary SIP Server:	Not registered
Backup Server 1:	Not registered	
Backup Server 2:	Not registered	
Nightringer Server:	Not registered	

3. Navigate to the SIP Tab.

Figure 6-4: SIP Tab

The screenshot displays the configuration interface for the SIP tab, divided into several sections:

- SIP Settings:** Includes checkboxes for 'Enable SIP operation' and 'Register with a SIP Server' (both checked). Other fields include 'Buffer SIP Calls' (unchecked), 'Primary SIP Server' (wildixstudent9.wildixin.com), 'Primary SIP User ID' (300), 'Primary SIP Auth ID' (300), 'Primary SIP Auth Password' (masked), 'Re-registration Interval (in seconds)' (360), and backup server configurations for two servers.
- Nightringer Settings:** Includes 'SIP Server' (wildixstudent9.wildixin.com), 'SIP User ID' (301), 'SIP Auth ID' (301), 'SIP Auth Password' (masked), 'Re-registration Interval (in seconds)' (360), 'Relay rings to multicast' (unchecked), 'Multicast Address' (224.1.2.32), and 'Multicast Port' (2020).
- Call Disconnection:** 'Terminate Call after delay' (0).
- Audio Codec Selection:** 'Codec' set to 'Auto Select'.
- RTP Settings:** 'RTP Port (even)' (10500), 'Asymmetric RTP' (unchecked), 'Jitter Buffer' (50), and 'RTP Encryption (SRTP)' (Disabled).
- Other Settings:** 'SIP Transport Protocol' (UDP), 'TLS Version' (1.2 only (recommended)), 'Verify Server Certificate' (unchecked), 'Outbound Proxy' (empty), 'Outbound Proxy Port' (0), 'Use Cisco SRST' (unchecked), 'Disable rport Discovery' (unchecked), 'Unregister on Boot' (unchecked), and 'Keep Alive Period' (10000).

Buttons for 'Save', 'Reboot', and 'Toggle Help' are located at the bottom right of the configuration area.

4. Set the **SIP Server** to the FQDN of the Wildix Server.
5. Set the **SIP User ID** to the extension number.
6. Set the **SIP Auth ID** to the extension number.
7. Set the **SIP Auth Password** to the auto-generated password from the previous section.
8. Set the **Keep Alive Period** to 0.
9. Save.
10. Reboot.

Once the unit reboots it should be registered with Wildix.

7.0 Contact CyberData Corporation

Sales

For sales-related questions, please visit our [Contact CyberData Sales](#) web page for more information.

Technical Support

For CyberData Technical Support, please submit a [Contact CyberData VoIP Technical Support](#) form on our website.

The CyberData VoIP Technical Support Contact form initiates a troubleshooting ticket which CyberData uses for quality assurance purposes.

Additionally, the Contact VoIP Tech Support form tells us which phone system you are using, the make and model of the network switch, and other essential troubleshooting information we need to efficiently assist with a resolution. Please also include as much detail as possible in the Describe Problem section of the form. Your installation is extremely important to us.

Documentation Feedback

We realize changes to the software or hardware of the Wildix PBX solution may render this document obsolete. We welcome and encourage documentation feedback to ensure continued applicability.