Configure cordless IP phones with RingCentral
Configuring cordless IP phones

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Cordless phone overview

Although RingCentral doesn’t offer a cordless phone solution, you can choose from two cordless phone options:

- **Use a standard analog cordless phone with a RingCentral Analog Telephone Adapter (ATA).**
  RingCentral offers preconfigured ATAs—simply plug in a cordless phone and you’re ready to go. You can review a list of well-reviewed analog cordless phones [here](#). Cordless phones plugged into the same ATA will share the same line or lines.

- **Buy a third-party IP cordless phone.** IP cordless phones support (SIP) and interface with RingCentral, eliminating the need to purchase an ATA. You can give cordless phones to each user, though cordless IP phones generally cost more than cordless analog phones. You’ll need to purchase a base station that supports the number of handsets you need.

RingCentral approves and recommends cordless IP phones from SNOM and Polycom. Aastra and Panasonic, among others, also manufacture SIP devices, but these have not been tested for use with RingCentral.

Use the following instructions to retrieve information from your RingCentral account and set up your phones. All cordless IP phones follow this basic configuration. You can also find specific steps in this document for configuring the SNOM and Polycom phones. (Note: SNOM units tend to be easier to configure, and more competitively-priced.)

Set up your cordless IP phone

1. **Connect your devices:**
   a. Make sure your bandwidth and network configuration supports the number of lines you plan to use. Visit our [Quality of Service (QoS) page](#) for more information.
   b. Follow the manufacturer’s instructions to:
      i. Attach the power supply to the base station (or use Power over Ethernet (PoE) to provide power, if applicable).
      ii. Connect the base station to a high-speed Internet connection with an Ethernet cable.
      iii. Place charging stations where needed. Plug in the AC adapter and charge the phones.
      iv. Pair the handsets with the base station (supported models are described below).

2. **Set up your RingCentral account:**
   a. If you don’t already have a RingCentral account, sign up [here](#). Add the number of lines and select **No Device** as your phone.
   b. If you already have an account, use your existing lines or add new lines from the RingCentral service site using [Add DigitalLines](#) as shown in figure 2b. Select **Use Existing Device** when prompted to choose a phone.
3. Record configuration information from RingCentral:

   a. After purchasing your lines, log in as an administrator and go to **My Settings > DigitalLines**. You’ll find a list of the lines you purchased.

   b. Locate each line you wish to use with your cordless phone. Make sure the E911 column displays the word **Edit**. Otherwise, click **Failed** and provide the e911 data.

   c. Click **Setup Instructions** for each line you’ll be provisioning on your cordless phone. Copy each of the five fields shown in Figure 3c.
Configure the Snom M3/M9 Cordless System.

SNOM offers two handset models, the M3 and the M9. Both cordless handsets provide key business features in an attractive package. Learn more about these devices [here](#).

The M3 supports up to eight handsets, and up to three simultaneous calls with a single base. Use repeaters to increase your coverage area. Power the charger and base station with a standard power adapter. Purchase a starter pack, including a base station with one handset for about $200, and additional handsets for about $120.
Access the configuration page.

Connect the base station to your network to access the base station configuration page. The base station will obtain an address using Dynamic Host Configuration Protocol (DHCP) on most networks automatically. For the M3, look up the phone's IP address by pressing the volume up key on the handset. For the M9, look it up by pressing →, then ↑ on the navigation key, then OK.

Open a web browser and enter the IP address you just obtained into the address field, for example, http://192.168.2.100, and provide your login information. Use the default login settings (username: admin, password: ‘admin’ on M3, ‘password’ on M9) if you haven't configured them yet.

You can change the password assigned to the base station by clicking Advanced. Scroll down to the section HTTP and change the username and password. Click Save Changes at the bottom of the page.

Configure SIP settings.

Click Identity 1 on the left to configure the first phone.

1. Display Name – Choose a name for this handset.
2. Account – Enter the User Name value from your RingCentral account.
3. Password – Enter the Password value from your RingCentral account.
4. Account Name – Enter any alphanumeric name.
5. Registrar – Enter the SIP Domain value from your RingCentral account, omitting :5060.
6. Outbound Proxy – Enter the Outbound Proxy value from your RingCentral account, omitting :5090.
7. Select Save. After a short delay, you should be able to use your handset.
8. Repeat steps 1-7 for additional handsets for identities 2-8.
9. For M9, change Identity Active to On.
10. For M9, set Authentication Name to the value from Authorization ID.
**M9 Extra Instructions: Assign handset to identify**

Press →, then ↑, then OK, then ↑↑ to access the handset page. Write down the handset ID. Repeat for each handset.

To assign each line to one or more handsets, in the web UI click on the identity you want to assign, then on **Handsets** at the top. Select the handset you want to assign to this line and click **save**.

**M9 Extra Instructions: Set SID and Audio Options**

For each Identity, click **Audio** in the top bar and set field **DTMF Payload Type** to 101. Click **save**.
For each Identity, click **SIP** in the top bar and set field **Server Type** to **TAHI (Broken Registrar)**. Click **save**.

### Configuring the Polycom Kirk Cordless System.

The Polycom Kirk lineup offers several handset and base station options. The least expensive base station, the Server 300, supports up to 12 handsets and accommodates most businesses. You can purchase the 300 base station for around $300, and extend the coverage area with repeaters.

Power over Ethernet (PoE) provides electricity to the base station, so you'll need a PoE-enabled switch. Or purchase a PoE injector cable to power the device; just run a quick online search for “poe injector cable.”

The Server 300 supports several handsets. Each handset uses a similar configuration, priced from $100:

- **The KIRK 2010** features a contemporary design with basic features and a black-and-white display.
- **The KIRK 4020** provides a cost-effective handset solution with mid-range features.
- **The KIRK 5020** advanced handset features a color display; the 5040 adds Bluetooth headset support.
- **The KIRK 4040** is built for dusty and wet environments.
Connect the base station to your network to access the configuration page of the server. The base station will obtain an address automatically on most networks using DHCP.

Find your base station’s IP address.

The device will broadcast its address if your network is configured for UPnP.

Otherwise, log into your router configuration page (you can usually reach this page by entering 192.168.0.1 or 192.168.1.1 in your web browser; refer to your router’s documentation for more information) and load the DHCP client list. You can generally find this list in a “Status” section of your router configuration page. Locate the Polycom Kirk device and take note of its address.

If this option doesn’t work, try using your computer’s ARP program to discover the device.

Look at the back of the base station and take note of the MAC address. Open a command prompt application on your computer and type ARP –a. Look through the resulting list and find the address that matches your base station. Find the IP address listed in that row.

If you do not have DHCP enabled, the base station will be at 192.168.0.1.

Configure the base station.

Open a web browser and go to the address you discovered above. The default username will be admin and password kws300.

You can change the username and password by selecting the Configuration, then clicking Security.

Since it can be difficult locating the base station IP address, you may want to switch to a static IP address. You can find this option under Configuration > General.
Configure SIP settings.

Click the Configuration tab, then SIP. Take the settings from your RingCentral account and apply them to the following fields:

1. Set the General > Transport field to UDP only.
2. Enter the SIP Domain value from your line settings excluding :5060 into the General > Default domain field.
3. Enter the Outbound Proxy value from your line settings excluding :5090 into General > Proxy field.
4. Click Save.

**SIP Configuration**

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<tr>
<th>Field</th>
<th>Value</th>
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<tbody>
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<td>Local port * **</td>
<td>5060</td>
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<tr>
<td>Transport * **</td>
<td>UDP only</td>
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<td>Default domain * **</td>
<td>sip.ringcentral.com</td>
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<td>Proxy **</td>
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<tr>
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<td>Max forwards *</td>
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**Authentication**

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<td>Default password</td>
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**DTMF signalling**

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<tr>
<td>Send as SIP INFO</td>
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</table>

Register the handsets.

Configure your handsets by registering the handset with the base station and configuring SIP and user settings for that device.

1. Click the Users tab, then click on New.
2. For the IPEI value, remove the battery cover and battery from the handset you wish to configure and find the SN: number. Enter this number into the IPEI field on the web page, but omit the last digit.
3. Enter the phone number of the user’s extension in the Standby text field.
4. Enter your RingCentral number in the Username / Extension field.
5. Enter the name of the user in the Displayname field.
6. Enter the Authorization ID value from your RingCentral account in the Authentication user field.
7. Enter your RingCentral password into the Authentication password field.
8. Click Save.
9. Repeat steps 1-8 to register additional handsets. Each handset requires user specific RingCentral account information.

<table>
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<tr>
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<table>
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<tr>
<td>MSF</td>
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<tr>
<td>Local number</td>
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</table>

10. Complete your configuration by rebooting your base station. Select **Administration > Reboot**.

Note: RingCentral officially supports phones and ATAs sold by RingCentral. Other devices, such as those described above, also work with RingCentral services as outlined in this document. Other 3rd party devices supporting standard SIP protocol should work with RingCentral, using configuration procedures similar to those detailed in this document. RingCentral does not test, validate, or provide technical support for devices not specifically mentioned in this document.