

Microsoft Telephony Solutions

Private Branch Exchange (PBX) Phone System (Office 365)

Phone System is Microsoft's technology for enabling call control and Private Branch Exchange (PBX) capabilities in the Office 365 cloud with Microsoft Teams and/or Skype for Business Online. Phone System works with Teams or Skype for Business Online clients and certified devices. Phone System allows you to replace your existing PBX system with a set of features directly delivered from Office 365 and tightly integrated into the company's cloud productivity experience. To connect Phone System to the Public Switched Telephone Network (PSTN), you can choose Microsoft's Calling Plan or your own telephony carrier.

Enterprise Voice Skype for Business Server (on-premises)

Enterprise Voice is Microsoft's technology for enabling call control and Private Branch Exchange (PBX) capabilities in the on-premises Skype for Business Server. This option can only be connected to the Public Switched Telephone Network using your own telephony carrier.

Connection to Public Switched Telephone Network (PSTN)

Calling Plan (Office 365)

This option connects Microsoft's Office 365 Phone System to the Public Switched Telephone Network (PSTN) to enable calls to landlines and mobile phones around the world. With Calling Plan, Microsoft is your PSTN carrier.

Connect your own telephony carrier (Office 365 and Skype for Business on-premises)

This option connects either Phone System in Office 365 or Enterprise Voice system in Skype for Business on-premises to your telephony network. This option requires a supported Session Border Controller (SBC). In some cases, this option might require additional Microsoft software deployed on-premises.

Which solution is right for you?

All-in-the-cloud, connect your own carrier, or a mix between all-in-the-cloud and third-party carriers?

The solution you choose depends on your current and future needs, such as:

- Whether you want—or are required—to retain functionality provided by your on-premises deployment.
- Which client do you want to deploy for your users.
- What your plan is for moving people to the cloud.
- Your need to interoperate with 3rd party PBXs and other telephony equipment.
- Availability of Calling Plans in your country.

For more information about Microsoft Telephony solutions, see the accompanying article: [Plan your Microsoft Telephony solution.](#)

Choose an all-in-the-cloud solution or bring your own telephony carrier to Office 365

How to begin

Microsoft supports several options as you begin your journey to Teams in the Microsoft cloud. Decide which Microsoft telephony solution (Phone System in the cloud or Enterprise Voice on-premises) is right for users in your organization, and decide how to connect to the Public Switched Telephone Network (PSTN) by answering some questions. Let's get started!



Consider these questions:

- ☐ Do you have an existing Skype for Business Server deployment?
- ☐ Are your users homed in Skype for Business on premises, in the cloud on Skype for Business Online, or both?
- ☐ Do you want to move on-premises users to the cloud?
- ☐ Is Microsoft's PSTN Calling Plan available in your region?
- ☐ Do you want or need to keep your current telephony carrier? For example, do you need to keep your current carrier because of an existing contract?
- ☐ Do you have an existing on-premises legacy PBX that you want or need to keep?
- ☐ Does your current legacy PBX offer unique features that are critical to your business?
- ☐ Do any or all of your users require features not currently offered in Phone System?

Choose your solution:

Option 1

Phone System with Calling Plan

All in the cloud for Teams or Skype for Business Online users

- Microsoft Phone System with added Domestic or International Calling Plans that enables calling to phones around the world (depending on the level of service being licensed).
- Because PSTN Calling Plan operates out of Office 365, this option does not require deployment or maintenance of any on-premises deployment.
- Customers can connect a **supported** SBC via Direct Routing for interoperability with 3rd party PBX, analog devices, and other 3rd party telephony equipment supported by the SBC.

Infrastructure requirements	
Requires uninterrupted connection to Office 365	Yes
Available worldwide*	No
Requires deploying and maintaining a supported Session Border Controller (SBC)	No
Requires contract with 3 rd party carrier	No
Requires deploying and maintaining Skype for Business Server or Cloud Connector Edition	No

*List of countries where Calling Plans available aka.ms/callingplans

Works for
Microsoft Teams users
Skype for Business Online users

Is this the right solution for you?
 Yes, if the following are true:

- Calling Plan is available in your region.
- You do not need to retain your current PSTN carrier.
- You want to use Microsoft-managed access to the Public Switched Telephone Network(PSTN).
- You do not want to manage Session Border Controllers on your own.
- Teams and/or Skype for Business Online has all the features that your organization requires.

Option 2

Phone System with own carrier via Direct Routing

Phone System in the cloud; connectivity to on-premises telephony network for Teams users

- Connect your own supported SBC to Microsoft Phone System directly without need of additional on-premises software.
- Use virtually any telephony carrier with Microsoft Phone System.
- Can be configured and managed by customers or by your carrier or partner (ask if your carrier or partner provides this option).
- Configure interoperability between your telephony equipment—such as a third-party PBX and analog devices—and Microsoft Phone System.

Infrastructure requirements	
Requires uninterrupted connection to Office 365	Yes
Available worldwide	Yes
Requires deploying and maintaining a supported Session Border Controller (SBC)	Yes
Requires contract with 3 rd party carrier*	Yes
Requires deploying and maintaining Skype for Business Server or Cloud Connector Edition	No

*Unless deployed as an option to provide connection to 3rd party PBX, analog devices, or other telephony equipment for users who are on Phone System with Calling Plans.

Works for
Microsoft Teams users

Is this the right solution for you?
 Yes, if the following are true:

- You want to use Teams with Phone System.
- You need to retain your current PSTN carrier.
- You want to mix routing, some calls are going via Calling Plans, some via your carrier
- You need to interoperate with 3rd party PBXs and/or equipment such us overhead pagers, analog devices
- Teams has all the features that your organization requires.

Option 3

Phone System with own carrier via Skype for Business Server OR Cloud Connector Edition

Phone System in the cloud; connectivity to on-premises telephony network for Skype for Business Online users

- Connect your own supported SBC to Microsoft Phone System via Skype for Business Server or Skype for Business Cloud Connector Edition deployed on-premises.
- Use virtually any telephony carrier with Microsoft Phone System.
- If you already have Skype for Business Server on-premises you can leverage it; if you do not, you can deploy a lighter version – Cloud Connector Edition.

Infrastructure requirements	
Requires uninterrupted connection to Office 365	Yes
Available worldwide	Yes
Requires deploying and maintaining a supported Session Border Controller (SBC)	Yes
Requires contract with 3 rd party carrier	Yes
Requires deploying and maintaining Skype for Business Server or Cloud Connector Edition	Yes

Works for
Skype for Business Online users

Is this the right solution for you?
 Yes, if the following are true:

- You want to use Skype for Business Online for your users.
- PSTN Calling Plan is not available in your region.
- You need to retain your current PSTN carrier.

Recommendation: When business conditions change-- for example, you no longer need to retain your PSTN carrier-- consider moving to Microsoft Teams using options 1 or 2 to:

- Minimize maintenance costs
- Have access to the latest features released by Microsoft

Option 4

Enterprise Voice in Skype for Business Server with own carrier

Enterprise Voice on-premises; connectivity to on-premises telephony network for Skype for Business on-premises users

- Connect your own supported SBC to Enterprise Voice System in Skype for Business on-premises Server.
- Use if you need local survivability.
- Use virtually any telephony carrier with Microsoft Phone System.
- Most complex option to deploy and maintain.

Infrastructure requirements	
Requires uninterrupted connection to Office 365	No
Available worldwide	Yes
Requires deploying and maintaining a supported Session Border Controller (SBC)	Yes
Requires contract with 3 rd party carrier	Yes
Requires deploying and maintaining Skype for Business Server	Yes

Works for
Skype for Business on-premises users

Is this the right solution for you?
 Yes, if the following are true:

- All your users need to stay on-premises.
- You need to retain your current PSTN carrier.

Recommendation: When business conditions change-- for example, you no longer need to retain your PSTN carrier-- consider moving to Microsoft Teams using options 1 or 2 to:

- Minimize maintenance costs
- Have access to the latest features released by Microsoft

Notes:

- All four options can co-exist with each other in case you need to design a solution for complex environment or managing multi-step migration.
- Option 3 can only be deployed with either Skype for Business Server OR Cloud Connector Edition. Co-existence of Skype for Business Server and Cloud Connector Edition is not supported in a single company.