**Technical Requirements**

Firewall/Proxy pre-requisites

* For Teams to function correctly, you must open TCP ports 80 and 443 from the clients to the internet, and UDP ports 3478 through 3481 from the clients to the internet
  + The four UDP ports are used for media such as audio and video, to ensure they flow correctly.
  + In the event of a proxy server being deployed, we recommend that you bypass the proxy server for all Teams services. Although using a proxy might work, it’s very likely that quality will be reduced due to media’s being forced to use TCP instead of UDP
* If your organization requires that you specify the exact IP address ranges and domains to which these ports should be opened, you can restrict the target IP ranges and domains for these ports. For a list of exact ports, protocols, and IP ranges, see [Office 365 URLs and IP address ranges](https://docs.microsoft.com/office365/enterprise/urls-and-ip-address-ranges)
* You can also consider using an external internet connection for the device which will be used for the meeting

Bandwidth pre-requisites

* For Group Video calling, consider an average of 500kbps/1Mbps (up/down)
* For best results in HD, consider an average of 1Mbps/2Mbps (up/down) (540p videos on 1080p screen)