

Solutions to support rapid implementation of online experiences for overseas students

The experiences we recommend for your students and lecturers are:

Teams Meetings – a video or audio conference call, with live instant message, voice chat and content sharing.

<https://docs.microsoft.com/en-us/microsoftteams/deploy-meetings-microsoft-teams-landing-page>

- Users can join from the Teams app, or via the web, and guest users can be invited (they must have an email address, but it doesn't need to be an institution one).
- Teams meetings can be flexibly moved between instant message, audio, personal video via webcam, content sharing (e.g. desktop or presentation), and meeting room video.
- Different users can have different access techniques – e.g. if a student has poor local bandwidth, they can join audio only, or can join via telephone
- Meetings can be recorded to be published in Stream with a single click
- Teams meetings are for up to 250 participants

Teams live events – a video broadcast experience for up to 10,000 attendees, with live Q&A, and which can allow anonymous users

<https://docs.microsoft.com/en-us/microsoftteams/teams-live-events/what-are-teams-live-events>

Stream – a video broadcast solution, which is also used to store and publish Teams meetings

<https://docs.microsoft.com/en-us/microsoftteams/cloud-recording>

- Accessible by web or app
- Teams meeting recordings are available through Stream
- Videos can be uploaded directly into Stream via app or web
- The app version allows for offline download and viewing
- Videos are automatically stored and secured in your tenant – download is only viewable with the app for approved users; access rights are automatically limited to attendees of meetings or can be extended to global use
- Access is restricted to users within your institution, with a valid account

Office 365 – mail, collaboration and document sharing platform

- Outlook and email services are available via app or web
- OneDrive for Business and SharePoint are available for file storage and sharing
- Word, PowerPoint and Excel are available via app or web
- OneNote, and OneNote Class Notebook, are available via app or web

Teams information for technical teams

Networking and Performance Best Practices

Many global tenants have users who work in, study from, or travel to, China. These users face several issues:

- High network congestion/packet loss on the offshore links and GFW.
- High packet latency due to complex routing within China carriers.
- Last mile ISP performance which can increase congestion/packet loss as well as packet latency.

Office 365 global tenant performance optimization for China users

We have produced guidance for all organisations using Office 365 global tenants with users in China. It is written for organisations that have an organisational corporate presence in China, typically where enterprises have implemented private networks that carry corporate network traffic between China office locations and offshore locations around the world. If you are in this situation, then please consult this guidance:

<https://docs.microsoft.com/en-us/Office365/Enterprise/office-365-networking-china>

In general, there are several best practices that network administrators and end-users can do to address these general performance issues:

Customer Networking

It is crucial that all tenants first follow our public network guidance

- <https://docs.microsoft.com/en-us/office365/enterprise/network-planning-and-performance>

It is also possible to cap bandwidth for individual users, through bandwidth policy, which can allow you to restrict video fidelity, and prioritise audio.

- <https://docs.microsoft.com/en-us/microsoftteams/meeting-policies-in-teams#media-bit-rate-kbs>

Finally, Teams administrators can setup and monitor the Call Quality Dashboard

- <https://docs.microsoft.com/en-us/MicrosoftTeams/difference-between-call-analytics-and-call-quality-dashboard>

Access from your own campus in China:

If students will be working from a campus within mainland China, tenant network admins should configure their networks in China to route all [Global O365 URLs & IPs](#) across the border and egress at the nearest peering point outside China.

Microsoft Teams – online learning for international students

End User Recommendations (for students and staff within China)

There are a few things end-users should almost always do when accessing global Office 365 Tenants from within China:

- 1) If users experience network performance issues, they should report this to their IT department for troubleshooting, who can then escalate to Microsoft support if trouble with Office 365 services is suspected. Not all issues are caused by cross-border network performance.
- 2) Utilize rich Office 365 clients and apps as they support caching (e.g. Outlook, Teams, OneDrive, etc.), and avoid web-based clients. The caching & offline behaviour of the Office clients can dramatically reduce the risk and impact of congestion & latency.
- 3) Joining Teams meetings and calls - for students:
 - a. Use mobile clients as they are best suited to manage any poor network performance.
If the user goes to <https://aka.ms/TeamsDownload> they will automatically be offered the correct application for that device
 - b. As a backup, users can switch to PSTN (phone) to join audio calls when needed, or where available.
In China, there are two national numbers ([link](#)). Each Teams meeting invite you send contains details for joining via phone, and links for local numbers
- 4) In Teams there are two different methods to share screen content, each has differences in how they can impact performance.
 - a. Sharing your screen leverages real-time media protocol (RTP), which is highly performant
 - b. Sharing PowerPoint directly, or other applications, requires the remote parties to open the same file that you're presenting over HTTPS protocol. This can impact performance if network connectivity to SharePoint is unstable, or slow.
 - c. If your participants are likely to have poor Internet access, the best solution is always to share your screen, rather than sharing an application in the Teams app.

Microsoft Teams – online learning for international students

Teams live events for large scale event broadcast

Teams can deliver live sessions to large audiences (typically 250-10,000 people), through Teams live events. This could be used for large lectures, and for scheduled events such as a student information session (for example, you could use this to hold a weekly update for all off-campus students globally). Events can be public (anybody with the link can join) or private (restricted to authenticated users of your organisations and/or specific authenticated users)

For more background on Live events, see here

<https://docs.microsoft.com/en-us/microsoftteams/teams-live-events/what-are-teams-live-events>

To be able to create a live event, users need to have an Office 365 A3 or A5 licence and some additional permissions ([see here](#))

Live events help you produce professional broadcast style events

- <https://docs.microsoft.com/en-us/microsoftteams/teams-live-events/plan-for-teams-live-events>
- Webinar recording from Coffee in the Cloud: <https://aka.ms/teams-live-events-session>
- Slides from webinar: <https://aka.ms/teams-live-events-deck>

Information for producers and owners of Live events

- <https://support.office.com/en-us/article/Produce-a-live-event-using-Teams-591bd694-121d-405c-b26d-730315e45a22>
- <https://docs.microsoft.com/en-us/stream/live-event-overview#capabilities>

Call Quality

Call quality can be monitored to help you manage the best service for your users. There is a dashboard to monitor service quality, and to troubleshoot:

- <https://docs.microsoft.com/en-us/MicrosoftTeams/difference-between-call-analytics-and-call-quality-dashboard>
- <https://aka.ms/teams-quality>
- <https://aka.ms/teams-quality-deck>
- <https://aka.ms/media-in-teams>

Security, compliance and auditing fundamentals

To learn more about how to manage Teams security and compliance, we recommend this webinar recording:

- <https://aka.ms/teams-security-compliance>
- <https://aka.ms/teams-security-compliance-deck>

Managing Teams, enrolments – integration to SMS and LMS

If you expect to need to manage students, class groups and assignments longer term, we'd recommend linking Teams to your system of record – your Student Management System or LMS – to automatically transfer data to make it easy to set up class and tutorial groups

- Using School Data Sync (SDS) - <https://docs.microsoft.com/en-us/SchoolDataSync/>
- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#how-do-i-automatically-create-a-team-for-each-course-at-the-beginning-of-the-semester-or-quarter>
- SDS can also be use with Power Automate for a very fast implementation: <https://docs.microsoft.com/en-us/connectors/microsoftschooldatasync/>

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Moodle integration

If you are using Moodle as your Learning Management System, there is an open source integration that will both sync courses, and their enrolments.

- Setup Documentation:
<https://docs.microsoft.com/en-us/microsoftteams/platform/moodleinstructions>
- Github Repository:
<https://github.com/Microsoft/o365-moodle>
- Moodle Bot Github:
<https://github.com/microsoft/Moodle-Teams-Bot>

Canvas Integration

If you are using Canvas as your Learning Management System, community developers have open sourced a PowerShell Integration. This integration uses a simple CSV file of Canvas course_id to synchronise courses to Teams, and course enrolments to Team members and owners.

- The script, and associated documentation can be found on github
https://github.com/lagrecajj/CANVAS_SDS_SCRIPT
- This script also uses SDS, and can either be used as pure PowerShell (end to end), or with Power Automate

Transforming a meeting room or learning space to teach

In addition to individuals using Teams from their own computer or mobile device, there are also Microsoft Teams Rooms options. This allows you to transform meeting spaces ranging from small huddle areas to large conference rooms with a rich, collaborative Teams experience that's simple to use, deploy, and manage. Start meetings on time with one-touch join, then instantly project to the display in the room and share to remote participants.

<https://docs.microsoft.com/en-us/microsoftteams/rooms/>

Teams Governance

Teams provides a rich set of tools to implement governance capabilities your organisation might require. To scale your Teams rollout, there are some important considerations, including:

- Team creation and naming conventions
- Classification
- Guest access
- Team retention, expiration and archiving
- Feature management

The following articles can help you get started

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu>
- <https://aka.ms/teams-governance>
- <https://aka.ms/teams-governance-deck>

Microsoft Teams – online learning for international students

Technical FAQ

The advice you have given us for accessing Teams from a consumer internet service (e.g. from home). Is there separate advice available for access from a China-based campus (i.e. a corporate network)?
Yes, you should contact your Microsoft account team, and they can provide that advice documentation to you

Can I extend the limit of Teams meetings beyond 250 participants?

No, instead use Teams live events, which can have up to 10,000 participants. Remember though that the 250 participant limit is the number of end points for the meeting, so 100 students sitting within a lecture hall would count as 1, if they are not logged into the Teams meeting.

Can I limit who a student can see and collaborate with? For example, can I prevent online students searching for staff?

Use Microsoft Teams scoped directory search. Microsoft Teams scoped directory search allows organizations to create virtual boundaries that control how users can find and communicate with other users in their organization.

- <https://docs.microsoft.com/en-us/MicrosoftTeams/teams-scoped-directory-search>

How do I control team creation? I'm worried students are going to create inappropriate teams.

Yes, you can create naming policies, and also block terms (e.g. to block the use of Staff in a Team name), and force new Teams to have a classification

<https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#how-do-i-control-team-creation-im-worried-students-are-going-to-create-inappropriate-teams>

Can I see who created a team?

Yes

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#can-i-see-who-created-a-team>

Can I control who can create teams?

Yes

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#can-i-control-who-can-create-teams>

How do I automatically create a team for each course at the beginning of the semester or quarter?

Yes. Teams can be integrated to a source of truth on your courses, students etc, such as your LMS or Student Information System, through School Data Sync and the Graph API. More information here:

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#how-do-i-automatically-create-a-team-for-each-course-at-the-beginning-of-the-semester-or-quarter>

You can also automate many tasks in Teams using PowerShell:

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#what-tasks-can-i-automate-via-powershell-or-graph>

How do I deal with teams when the semester or quarter ends?

You can specify a retention, expiry and archive policy automatically <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#how-do-i-deal-with-teams-when-the-semester-or-quarter-ends>

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Are there team templates for my faculty members to use when creating a team?

Yes, these are included within Teams automatically, and you can create new templates using the Graph API

- <https://docs.microsoft.com/en-us/MicrosoftTeams/plan-teams-governance-edu#are-there-team-templates-for-my-faculty-members-to-use-when-creating-a-team>

Can I control what Teams features my faculty and students have access to?

Yes. You can use policies to control specific messaging, meeting, calling, and live event features your users have access to. You can use tenant-wide settings to apply the same settings to all, or apply user-level policies if required.

- <https://docs.microsoft.com/en-us/MicrosoftTeams/enable-features-office-365>

Can I control what external parties my faculty and students collaborate with?

You can use guest access to invite users from outside of your tenant, which can be useful for research collaboration or guest lectures:

- Use domain whitelisting to allow or block guests based on their domain.
- Turn guest access on and off for particular Office 365 Groups and teams, to control which teams can (and can't) invite guests.
- Use the audit log to see which alerts were sent to invited guests.

<https://support.office.com/article/Guest-access-in-Office-365-Groups-bfc7a840-868f-4fd6-a390-f347bf51aff6#PickTab=Manage>

Does Teams keep an audit log of activities?

Yes – if you think you will need this, you should enable auditing when setting up Teams. Information on this, and how to access data from the audit log (e.g. team creation, channel creation, user activity) see here:

- <https://docs.microsoft.com/en-us/MicrosoftTeams/audit-log-events>

Can I provide a dedicated toll-free number for my students to join Teams conferences via phone?

Students can dial a national (toll) number to join a call from most countries, including China (it is a Beijing number). If you require them to have a free number (toll-free) to call, then it is available at additional cost - see here

- <https://docs.microsoft.com/en-us/microsoftteams/getting-service-phone-numbers>

If you have an existing toll-free number, you can transfer that to Teams

If you need help on this service, our PSTN service desk can help

- <https://docs.microsoft.com/en-us/MicrosoftTeams/manage-phone-numbers-for-your-organization/contact-pstn-service-desk>