Supporting students with disabilities to study online: Online technologies

ECU is proud of our diverse and inclusive learning and working environment and is committed to ensuring continued accessibility and inclusion for all members of our community. As ECU moves to delivering more units and courses online, it is important to ensure that students with disabilities are well supported during this time of change. This tip sheet will give you an overview of the accessibility of emerging online technologies and how to best utilise these for your students, especially during short term disruptions to on-campus teaching due to COVID19. **Please be aware that this information is changing quickly and will be updated based on feedback provided by staff and students as needed.**

For any questions regarding accessibility, please contact the Equity Projects Officers at equity@ecu.edu.au or (08) 6304 6170 who will refer you to an appropriate service.

Learning and Assessment Plans (LAPs)

Learning and Assessment Plans (LAPs) are agreements between ECU and a student which outlines the type and level of support to be provided in relation to a permanent and/or temporary disability and/or medical condition. Many students will already have a LAP with ECU, however with the shift from face-to-face to online learning (temporary or otherwise), there may be a greater number of students who require some form of additional support. For example, students who previously relied on lip reading, those for whom English is not their first language, students with learning difficulties and students with increased anxiety during times of change may require further flexibility and accommodations to transition to online learning. Student can explore obtaining a LAP
by contacting the Equity, Diversity and Disability Service at studentequity@ecu.edu.au
or (08) 6304 6960.

Accessible online delivery methods

For any questions regarding online accessibility and the best options for your student cohort, please contact the Equity Projects Officers at equity@ecu.edu.au.

Captioning, interpreters and other support

Captioning

Captions are text versions of the spoken word presented within multimedia. Captions allow the content of web audio and video to be accessible to those who are deaf, have hearing impairments or who do not have access to audio. This can be done automatically, manually in real time or manually after the event. Automatic captioning should be made available wherever possible as there will be students who would benefit from this additional support as learning moves online for a period time. These students may or may not be already known to you or the University.

Automatic captioning can be inaccurate and therefore may not be appropriate for someone who relies heavily on captioning; however, this option can be useful for other students to use in addition to following along with audio. At the beginning of MS Team meetings, lectures/tutors should inform all students that they can select to have automatic captioning on during a live meeting or for a recording and how to do so (see instructions - Real time captioning). For lectures, Panopto is recommended for automatic captioning on recording and lecturers can enable this following the Panopto automatic captioning instructions (PDF 130KB). These should be edited for accuracy prior to the publishing.

If automatic captioning is not possible or is inappropriate based on a particular student's needs, please contact equity@ecu.edu.au to discuss manual captioning options.

Auslan interpreting

Interpreting options should be provided where a student requires it. An Auslan interpreter's role is to communicate what is being spoken through Auslan to people who are deaf or have a hearing impairment. Most students who require interpreting will already have a LAP and will be linked in with relevant support services. If a student newly requires this support, they will need to obtain a LAP through the Equity, Diversity and Disability Service at

studentequity@ecu.edu.au or (08) 6304 6960. For those lecturer/tutors who have a student who require interpreting, MS Teams allows for students to 'pin/spotlight' both the lecturer/tutor and the interpreter to ensure that the student can interreact with the content in real time. To explore how to best address this within your context, please contact equity@ecu.edu.au.

Note takers

Note takers can be provided as a reasonable adjustment provision in a student's LAP. The role of a note-taker is to provide accurate, legible and well-organised notes that reflect all aspects of classroom content. Students who previously had access to a note taking service, will continue to have this support with note takers continuing to access lectures and tutorials online. For students that now require this additional support but have not previously had a LAP, they will need to obtain one through the Equity, Diversity and Disability Service at studentequity@ecu.edu.au or (08) 6304 6960.

Screen readers

A screen reader, commonly used by people who are blind or have low vision, is an assistive technology that reads out loud the content on the computer screen. The most common screen readers used are JAWS and NVDA for Microsoft Windows and VoiceOver for Mac. Screen readers function most effectively where digital documents (Word, Powerpoint etc) have been constructed around accessibility principles and have used in-built accessibility checking tools before being uploaded to the LMS.

Keyboard access

Navigating pages using just keyboard shortcuts allows users who are blind or have low vision or who have reduced mobility to access functions with the keyboard rather than a mouse. Keyboard access works hand-in-hand with screen reader tools and work best where links in documents are clearly described and structured (using Headings) and can be activated using Tab and Enter keys on the user's keyboard.

Online learning technologies

The Centre for Learning and Teaching (CLT) is currently offering training opportunities for staff to learn how to use emerging online platforms and technologies via the Staff Development Calendar or by emailing elearningtraining@ecu.edu.au.

Lectures

	Automatic captioning	Manual and live captioning	Screen reader & keyboard access	Further resources
Panopto	Automatic captioning can be generated using Automatic Speech Recognition (ASR). Follow Panopto automatic captioning instructions (PDF 130KB) to utilise this. These typically require editing before they're suitable for publication.	Manual captioning after the event can be added by a staff member however this is a time-consuming process. Follow Panopto manual captioning instructions (PDF 160KB) to utilise. A third-party manual captioner can be used. This may take a few days. **This is ECU's current process. To enquire about accessing this service contact equity@ecu.edu.au**	Panopto supports JAWS, NVDA (Windows) as well as VoiceOver (Mac) screen reader software. Panopto supports keyboard access. All of the functionalities and links in the web interface are accessible by using the tab key.	Panopto information for ECU Staff Panopto automatic captioning instructions (PDF 130KB) Panopto manual captioning instructions (PDF 160KB) Training for staff available through Staff Development Calendar
PowerPoint (PPT)	PPT can automatically caption audio as a presentation is displayed on-screen. For best results use a headset microphone connected to the device running PPT.	Staff members can create a text-based caption file and manually upload this to accompany a PPT presentation. Real time manual captioning is available and is visible during PPT recordings. **To explore the best option regarding captions, contact equity@ecu.edu.au**	PPT supports JAWS, and NVDA (windows) and VoiceOver (Mac) screen reader software. PPT supports keyboard access.	PowerPoint captioning instructions (automatic and manual) PPT captioning for videos in PPT PPT keyboard shortcuts For assistance updating older PPT versions call ICT on 6304 6000.

Tutorials, seminars and workshops

	Captioning	Screen reader & keyboard access	Further resources
MS Teams	MS Teams allows students to self-select closed captioning on live meetings (this is not captured in the meeting recording). Lectures/tutors should inform all students of this at the beginning of each meeting (see instructions - real time captioning) After a MS Team Meeting has been recorded staff can access the transcript via Panopto. Staff can either edit the transcript directly on Panopto or download the transcript, edit and re-upload it.	JAWS and NVDA (windows) and VoiceOver (Mac) are compatible screen readers however issues have been reported by users. Navigation requirements vary throughout the application reducing ease of use for keyboard access.	MS Teams accessibility information Real time captioning Panopto captioning MS Teams training available for staff

Online assessment tools

Some common online assessment tools (e.g. assignments, quizzes, interactive activities and forums) may present barriers for some students due to the design of questions, the software utilised or the delivery platform. Here are some ideas for creating accessible and inclusive assessments that will benefit all students:

- **Required accommodations:** Be aware that variations (adjustments, extensions, deferrals) to assessment items may need to be implemented for some students/groups while online
- **Learning outcomes:** Ensure that the assessment item evaluates the learning outcomes (rather than physical attributes of the learner) and that learning outcomes are clearly stated
- **Student feedback:** Ask students for feedback about the assessment and allow for an open dialogue with students regarding accessibility while studying online
- **Choice:** Give students choice of assessment approaches, file types and other variations where possible

- **Flexibility:** Make submission times flexible and allow for variations in time taken to complete an assessment item where needed

It is also important that staff are aware of the limitations of some key online tools to best determine when to use them, when to avoid them and when you may need to provide alternative options for some students.

Tool	Considerations
Online testing and quizzes	Some online testing tools are not compatible with screen readers. It is best to provide an example test ahead of time to allow students who use screen readers to determine ahead of time if it is accessible for them. Students may have previously received accommodations for extended time during testing. Staff may need to adapt the timing allocation for individual students to ensure they still have access to this additional time.
Questions	Some accessible question formats include: - True or False questions - Sequence drop-down - Matching drop-down - Ranking drop down - Short answer - Numeric - Multiple response - Fill in the blank questions - Pick one answer - Pick many answers Some inaccessible question formats include: - Drag and drop - Ranking drag and drop - Sequence drag and drop - Matching drag and drop - Word bank - Hotspot questions - Questions based on visual content of images or diagrams

Online interactive and group activities	Interactive and group online activities can be difficult to fully engage with for some students including those who are blind or have low vision, who have hearing impairments, with learning difficulties and those for whom English is not their first language. These should always be an optional activity and not used as a compulsory aspect of any assessment. Staff should consult with individual students as to how they can best engage with and participate in interactive and group online activities to ensure they are able to fully participate in all aspects of online learning.

Support for staff

For any questions regarding online accessibility, please contact the Equity Projects Officers at equity@ecu.edu.au or (08) 6304 6170 who will refer you to an appropriate service. For strategies to ensure design of online content is accessible, check out the '**Supporting students with disabilities to student online: Accessible online design**' resources.