

# Basic Troubleshooting

In blended and online learning, it is essential that teachers, students, and families be prepared to troubleshoot technology problems they might encounter. In addition to district and school leadership, teachers play an important role in developing strategies and providing necessary support that students and families need when solving technology problems. Although it is not possible to anticipate all potential technology problems, teachers can guide students and families through basic troubleshooting actions.

1. How can planning ahead support basic technology understanding and usage?
2. What types of technology troubleshooting needs are common in K-12 education?
3. How can I best provide basic troubleshooting support to students and families?



to Consider

When teaching in online environments, it is essential to prepare for technology problems. It is important to develop troubleshooting skills and educate students and their families on how to proceed in case of technical problems. While some technical problems will require additional assistance from building or district IT specialists, many technical problems can be solved by teachers and students.

Developing strategies to prevent technical problems is essential. It is helpful to provide 'How-to' printable guides and instructional videos that support device/application usage and basic troubleshooting. Keep printable guides and instructional videos centrally located for students and families. Also, keep things simple, and use software and applications that are essential to students' learning experience. Use mobile-friendly applications for accessibility, especially for students who work from their tablets and smartphones and have limited internet access. Make students and families aware of backup plans with alternative options and protocols for contacting school technical support if the technology does not work properly.

Prepare for common technical problems that might arise in blended and online learning such as: a frozen application or window, internet browser or webpages not working, student cannot log in, WiFi not working, Google Drive or OneDrive offline access not syncing, or a device or hardware component not working. As a first step in troubleshooting, identify the problem as specifically as possible. Oftentimes, school or district IT specialists will provide troubleshooting documentation, such as a flowchart with step-by-step instructions. Utilize provided documentation, along with basic troubleshooting skills, to solve problems encountered. Common troubleshooting steps or actions to try include: refresh the webpage, try a different browser, close and reopen the specific application or webpage, log out of the website or application and then log in again, check the Wi-Fi signal and turn WiFi off and then back on again, restart the device, if the device is completely frozen hold the power button down to hard reboot it, check for and perform software updates, and clear cookies and cache.

Help students solve technology problems by preparing an infographic that presents a step-by-step process or a digital form with guiding questions. If students cannot solve the problem by themselves through basic troubleshooting, they need to know how to seek help by contacting their teachers or school technology support. Teachers should remain flexible and be creative in finding alternatives if a solution to a technology problem cannot be found. Technology issues can be disruptive when teaching and learning in online environments. However, when teachers, students, and families follow basic troubleshooting actions, issues can be mitigated and the detrimental impact on learning lessened.

## KEY Elements