



Tech Talk
eLearning for K-12: Challenges and Solutions

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Abstract

Lack of teaching knowledge, inequity of technology and materials, and misbehavior during eLearning are three challenges that are faced during remote online learning. These three challenges and suggested solutions are explored, as well as how to take a whole-child approach integrating social and emotional learning and mindfulness.

Due to the coronavirus pandemic, the 2020-2021 school year experienced hardships like none other. In a matter of days, school administrators were faced with making some of the most challenging decisions ever regarding closing schools and pivoting to teaching and learning remotely. Distance learning became the norm and eLearning quickly became the most efficient way to deliver content with a myriad of edtech options and the challenges that followed (Boyland, 2020; Richards, 2020; Sean, 2020). The rapid transition from face-to-face instruction to remote online learning left teachers and parents alike scrambling. While teachers were charged with the task of teaching online, parents were challenged with the task of helping to educate their children at home. Many parents adapted to these changes and new expectations with trepidation. Three challenges of eLearning became immediately obvious. Among the challenges that affected eLearning were lack of teaching knowledge, equity of technology and materials, and student misbehavior during remote learning sessions.

Challenge: Lack of Teaching Knowledge

The shift to teaching remotely has been challenging to teachers and parents. Successful teaching and learning in a face-to-face setting do not always equate to success in online or remote teaching and learning. Most teachers have not had the training with equipment, software platforms, or pedagogies associated with effective online teaching and learning (English, 2020; Farmer & West, 2019). This problem is compounded with the lack of knowledge and experience that parents/guardians have with technologies and pedagogies to support the learning of their children. Many parents feel ill-equipped to teach from home, especially when they are trying to work from home themselves (English, 2020). And while parents may do well in parenting, many lack teaching skills needed to help make online learning a success for their children, and many feel overwhelmed by the prospect.

Solutions: Lack of Teaching Knowledge

It is important that teachers and parents collaborate to provide the best possible experience for the learner. Communication is a good first step. By assessing the parents' needs through conversation, teachers can advise parents on how to help their child navigate eLearning (Johnson, 2020). Technologies allow for various types of communication such as emails, texts, virtual meetings, and even [Remind.com](#), which allows for two-way text communication without knowledge of personal cell phone numbers. Communication allows parents and teachers to help one another by guiding and providing feedback about the students' eLearning experiences.

A positive online learning environment is essential for success. Co-creating this space allows for input from the teacher, parent, and student. Finding a location where distractions are minimal is essential as is providing a structure and routine to the learning time, whether learning is synchronous or asynchronous. Also, making sure that students know how to navigate the internet safely and know how to use the learning management system the school is using will ensure a smoother and more successful experience.

A few things to keep in mind when helping students with eLearning are to build in [brain breaks](#) for students and encourage physical activity to boost cognition. Be aware of high levels of stress and be ready to [help students](#) when they need it. [Stay connected with the teachers](#) as they are the best resource (ASC International School, 2020; Elgersma, 2020; Zalets & Loehrke, 2020).

Techniques to motivate children to do their assignments and to learn the content often require special skills. Teachers can help parents by breaking down the progression of learning into manageable tasks and provide them with resources to better understand the concepts (Johnson, 2020), for example, the use of videos that teach content, like [Khan Academy](#). Parents need to see the big picture for learning goals, a framework to help them know the direction their children will need to take and what to aim for. Sharing "I can" statements with parents and students will help them understand the learning targets (Johnson, 2020).

There are resources available to parents to assist with eLearning. The teacher is the best source for the knowledge and skills students are expected to master and potentially for effective methodologies. Other sources for parental help are: *Distance Learning Resource Center*

([Education Reimagined](#)), *Virtual and Hybrid Learning Resources* ([K-12 Blueprint](#)), *Parent Support for Online Learning* ([Facebook groups](#)), remote learning tips for parents ([YouTube](#)), resources for content ([Khan Academy](#)), and blogs like *Working Parent's Guide to Online Learning During the Pandemic* ([Kids Academy](#)), *5 Things Parents Can Do to Support Students Learning Online* ([Edmentum](#)), *Virtual Learning Tips for Parents* ([iD Tech](#)), *Remote Learning Resources* ([Trying Together](#)), and *Keeping Kids Motivated for Online Learning* ([Common Sense Media](#)).

Challenge: Equity of Technology and Materials

eLearning platforms offer a variety of features, some rather complex. Teachers can provide instruction in real time (synchronous) via live stream or group meetings using various software programs, or they can use recorded (asynchronous) lessons and strategies. In addition to online learning platforms, learning management systems (LMS) provide a repository for student work and can assist teachers in keeping track of learning outcomes. While eLearning platforms and learning management systems can be great resources for eLearning, difficulties arise when there is a lack of needed technology and training to make these platforms viable. For example, some families lack access to a computer and to broadband and even some teachers lack the needed technology in their home to present instructional content. Not having the proper equipment and wifi access needed makes online teaching and eLearning impossible (English, 2020; Vander Ark, 2021).

In addition to a lack of accessible technologies, challenges arise when content is presented in new ways which can limit or prohibit student accessibility. For example, lessons presented in a video platform may cause students with hearing challenges to struggle with processing auditory information; students who need visual support may struggle with text-heavy documents; and English language learners may struggle without the support they are accustomed to in traditional education (Morin, nd).

Solutions: Equity of Technology and Materials

Solving the issue of lack of technology and materials is not easy to overcome. Pre-pandemic, some districts went one-to-one and provided a Chromebook to each student. During the pandemic, schools began to scramble to provide the needed technology and materials to students so they could learn remotely online. Even devices relegated to charging carts for classroom use were deployed to teachers and families. A suburban school district in New Jersey partnered with an internet company to offer low-cost internet access to families. A rural Alabama school district provided students internet access by installing a town wireless network in 2011, using a federal E-rate grant and has since provided MiFi devices to insure uninterrupted internet service. A district in rural Virginia deployed wireless mobile units (WOW - Wireless On Wheels) around the county that are solar powered, have a radius of about 150 feet and cost about \$3,000 each. They are placed in church parking lots, fire departments, and even at a Dairy Queen all for download and upload of assignments; it is not, however, useful for videoconferencing or telecasting (Anderson, 2019; English, 2020; Samuels, 2020; Vander Ark, 2021). A solution, according to Justin Reicher (2021) in his article *Schooling in the Fifth Season*, is for the federal

government to provide access to broadband nationwide, just as electricity was in the early part of the twentieth century.

Challenge: Misbehavior During eLearning

While managing behavior in a traditional classroom is challenging, imagine managing behavior of students through a computer screen. Misbehaviors can be many but tend towards cheating, aggressiveness, and cyberbullying, going AWOL, and slacking/multitasking (Heim & Strauss, 2020; Jones, 2020; Mooiman, 2020). Most of the literature on cheating points to the occurrences happening during online courses in higher education with some literature reporting on K-12 schools (Dey, 2021; Jones, 2020; Mooiman, 2020). Cheating/academic misconduct includes texting answers, plagiarism, and turning in work not completed by the student.

eLearning has increased online aggressive behaviors and the accessibility of cyberbullies to victimize. Hate speech is up 70% and online toxicity is up 40% between students on online platforms. 37% of students ages 12-17 report having experienced cyberbullying and 30% say it has happened more than once. 60% say they have witnessed cyberbullying (Boyland, 2020). When students do not physically have a teacher present, they tend to think that what they are doing or not doing cannot be seen. The feeling of being anonymous behind a computer screen, hidden from sight, presents an opportunity to make poor choices. Students say it is hard to stay focused when the camera is not on. As a result of perceived anonymity during online learning, students are more likely to abandon accountability that typically aids in keeping their behavior in check (Moore, 2020; Richards, 2020). According to Josh Loso, an intermediate school principal and online K-12 administrator in Spartanburg, South Carolina, one major obstacle that both teachers and students faced in the 2020-2021 school year was the absence of a physical presence of the teacher. Students participating in online learning often felt as though teachers could not, or did not, monitor their progress. Similarly, barriers to immediate feedback and communication made it hard for instant notification to students and parents of the lack of student participation. According to Dr. Lori Vinson, former Technology Integration Specialist and online K-12 administrator and current teacher educator, students not only felt like teachers could not or did not monitor their progress, but students also felt they could hide behind their computer screens and pretend they were completing their assignments when in reality they were spending time doing other things unrelated to their schoolwork. This feeling of anonymity led to students thinking they were hiding what they were doing or not doing from their teachers and parents.

Other issues that occur during remote learning include students recording themselves then using the video for their synchronous online classes and [Zoombombing](#) or zoom raiding. These unwanted interruptions from internet intruders have become problematic (Craig, 2020). Even dress code violations are an issue as some students wear their pajamas during synchronous online learning (Jones, 2020).

Solutions: Misbehavior During eLearning

Cheating can be minimized by designing assessments that require students to produce responses and presentations that utilize inquiry and critical thinking; creating a culture that discourages cheating; having students engage in peer feedback; and having students turn on their cameras during quizzes and tests as well as turning off the chat feature (Klein, 2020). Some ways to

prevent cyberbullying include establishing a [positive learning environment](#), developing strong stakeholder relationships (parents and community), promoting classroom awareness of cyberbullying, establishing an anonymous reporting of cyberbullying, and instilling hope (Hindaju & Patchin, 2020). Online safety and digital citizenship can be promoted by learning what tools are built into the platforms that are being used, for example, filters and tools that allow teacher approval before posting. Google provides a digital safety tool called [Be Internet Awesome](#) that is an interactive learning game that aligns with the International Society for Technology in Education (ISTE) standards (Boyland, 2020). Parents and teachers can help students stay on task during remote learning by sharing the editable [digital learning pledge](#) in English and Spanish (Common Sense Education, n.d.). Zoombombing can be [prevented](#) by following the steps in the link (Craig, 2020).

More Ways to Overcome eLearning Difficulties

There are other ways to help students overcome eLearning difficulties that can also prove helpful in the regular classroom. Some examples include encouraging students to become self-regulated, independent learners, teaching the whole child by incorporating social and emotional learning (SEL) into the curriculum, and facilitating mindfulness.

Encouraging students to be independent learners, not only has tremendous benefits for the student, but it is also a proven high impact, low-cost way to improve student progress (Mullings, 2019). According to Zimmerman (1990), self-regulated learners set goals, tackle problems, monitor their progress, persist during learning, and are intrinsically motivated. To truly be successful in eLearning, self-regulation is essential. Parents and teachers can help students develop into self-regulated, independent learners by facilitating goal setting and by teaching them how to track their progress and reflect on their learning (Larkins, 2021). It is also important to teach students how to manage time, effort, and emotions (The Learning Accelerator, n.d.).

Many students are experiencing uncertainty and change in their lives that are creating hardships in their school life and home life during this pandemic. They need strategies to deal with stress, anxiety, fear, anger, and loneliness. Incorporating social and emotional learning (SEL) into the curriculum can help students identify and deal with their emotions and the emotions of others. SEL is the process through which we learn to recognize and manage emotions, care about others, make good decisions, behave ethically and responsibly, develop positive relationships, and avoid negative behaviors (Elias, 1997). There is also evidence that SEL programs facilitate better academic learning and can promote success for students in both school and life in general (Goleman et al., 2004). Because students are experiencing social emotional challenges which disrupt their performance in school, the need to address these challenges is extremely important. Problems such as discipline, disaffection, lack of commitment, alienation, and dropping out of school are examples of behaviors that frequently limit success in school and often lead to failure (Zins, J. E., Bloodworth, M. R., Weissberg, R. P., & Walberg, H. J., 2004). By addressing SEL, student behaviors can be addressed and hopefully circumvented. Parents and teachers can utilize the Collaborative for Academic and Social and Emotional Learning ([CASEL framework and 5 core competencies](#)) to assist students in becoming self-aware, to self-manage, to engage in responsible decision-making, develop relationship skills, and build social awareness (CASEL, 2019).

Dr. Ilana Nankin, founder of Breathe For Change addresses social and emotional wellbeing for students in her [Breathe For Change curriculum](#). She encourages teachers to implement Social Emotional Learning support by providing mindfulness activities including movement. Meditation and activities addressing feelings are just a few of the activities that can be incorporated to help students adapt to emotional needs. Her program empowers educators as champions of well-being in their lives, classrooms, and school communities. Breathe For Change aligned the learning objectives of their SEL*F curriculum to the five core competencies of CASEL. Breathe For Change is guided by their work to ensure that educators gain tools to effectively embody and teach social-emotional learning in their lives, classrooms, and communities. According to Dr. Nankin (n.d), educational transformation must come from within school communities. Her theory of change is to train educators as wellness experts and support them in being champions of well-being in their lives, classrooms, and school communities. Her theory and curriculum correspond with the CASEL framework. Like many similar frameworks, CASEL's integrated framework promotes intrapersonal, interpersonal, and cognitive competence. The five core competencies can be taught in many ways across many settings. The interactive activities provided in the Breathe For Change curriculum can be used by eLearning teachers to incorporate SEL skills and to make connections with students with the aim to negate some of the attitude and behavior patterns and replace them with positive outcomes during eLearning.

Conclusion

eLearning has been one of the top challenges in education during the last two school years, making it difficult for many parents, teachers, and students to experience success during remote online learning. Lack of teaching knowledge, equity of technology and materials, and misbehavior of students during online classes are just three issues that are faced by teachers, parents, and students. Strategies are needed to navigate the learning space and the living space of eLearning. As the journey of eLearning continues, parents and teachers will need to work together to implement strategies such as those suggested that will effectively impart the skills, knowledge, and dispositions for students to be successful learners.

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