Understanding and Addressing Disruptions to Learning During the COVID-19 Pandemic

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IN THIS BRIEF

- California’s educational context during the COVID-19 pandemic;
- Research on learning loss/summer slide and how it relates to learning disruptions during COVID-19;
- Strategies for local educational agencies to support students through learning disruptions, particularly for the most vulnerable; and
- Ideas for actions that governing boards can take to address disrupted learning.

Introduction

In early 2020, schools across the United States shifted to distance learning in response to the COVID-19 pandemic. Although students in some districts have returned to the classroom for hybrid or full-time in-person learning, many others continue to engage in remote instruction during the 2020–21 school year. Given these disruptions to traditional classroom-based instruction, education leaders have warned that the impact on student learning is a significant threat to achievement and equity.

The COVID-19 pandemic has impacted some groups of students and their families disproportionately, including English learners, low-income students, students with disabilities, homeless students, foster youth, and historically marginalized racial and ethnic groups. Additionally, the dependence on technology for distance learning has greater impacts on students in rural areas and other locations where internet access is less reliable or even nonexistent.

While the COVID-19 pandemic presents unique challenges, California schools have been forced to adapt to significant disruptions in the past, albeit rarely at a statewide level. Forest fires, earthquakes, and other natural disasters have resulted in schools and districts temporarily shutting their doors. While the causes of these interruptions to learning vary, all school shutdowns have major impacts on students and their families.

Board members and county education leaders can establish more effective and equitable policies if they understand the effects of learning disruptions, are aware of the way that some students are disproportionately affected, and understand potential strategies to mitigate the impact. This is especially important because recent state and federal legislation require that districts address learning recovery, with a focus on students disproportionately impacted by the COVID-19 pandemic.

Learning Loss and Learning Disruptions

Lost instructional time has serious ramifications for learning in both reading and math. The term “learning loss” typically refers to declining student achievement in periods when students are out of school. Prior to the pandemic, learning loss was commonly associated with “summer slide,” a term that refers to evidence that students often forget content between the end of one school year and the beginning of the next due to the break in instruction.

Although students’ math knowledge is more susceptible to the summer slide phenomenon than reading knowledge is, gaps in reading achievement have also been shown to widen along income lines during absences from school.

While this research has implications for the COVID-19 context, there are some notable distinctions. Unlike summer slide, the concern during the pandemic is less about “forgotten” knowledge than whether students are learning as much as they would during a typical year. First, while students are still receiving daily instruction, many are also in class for shorter periods each day than during prior years. Furthermore, the conditions for learning have changed. There are many challenges to online and hybrid instruction, and this might impact how students engage with and master grade-level content. The mode of instruction and duration of disruptions raise questions about the impact on students’ educational trajectories over time and how educators will address these concerns equitably.
Due to these differences in contexts and their implications, this brief refers to “learning loss” when discussing summer slide research and “learning disruptions” when describing the impact of changes to instructional access during the 2019–20 and 2020–21 school years. “Learning recovery” will be used to describe strategies for addressing the impacts of such disruptions.

EARLY DATA ON THE DISPARATE IMPACT OF LEARNING DISRUPTIONS

Early reports from across the country have shown the troubling impacts of learning disruptions on different student groups.

- Nationally, the impact of disrupted learning has been particularly pronounced in math. On average, students in grades 3-8 came into the 2020–21 school year with 67 percent of the expected math learning gains from a typical year. Schools that predominantly serve students of color began the school year with only 59 percent of a typical year’s expected math learning gains.5

- Chronically absent students—i.e., those absent 10 percent or more of instructional days—have missed a substantial amount of instruction and risk falling behind their peers academically. By November 2020, 11 California districts engaged in an initiative to increase attendance reported an 89 percent increase in chronic absenteeism compared to the same point in 2019. Consistent with concerns that barriers to distance learning disproportionately harm students of color, the increase in chronic absenteeism was greatest for Black and Latino students.6

- As of February 2021, California’s white students were more likely to be receiving in-person instruction. Ninety percent of Black students, 85 percent of Latino students, and 81 percent of Asian American students attend school districts that were still primarily in distance learning, while 64 percent of white students in the same period were still in distance learning. Even after students return to their campuses, the academic and socioemotional impact of these differences will need to be addressed.7

Implications of Learning Loss Research

Existing summer slide research suggests that students do not generally retain all of the knowledge they had at the end of one school year into the beginning of the next, but the extent to which this happens is more significant for some students than for others. Low-income students, who have less access to out-of-school enrichment experiences, typically face greater learning loss than their higher-income peers.8

Achievement gaps between Black and white students typically widen during the summer, also due to disparate opportunities.9 The gaps that are created when school is not in session often continue to widen during subsequent school years. By high school, more than half of the difference in reading achievement between low-income and middle-income high school freshmen can be attributed to inequities resulting in “summer slide.”10 Some research even suggests that summer learning loss also impacts the United States economy through future lost earnings.11

Many experts fear that the disruptions to schooling since spring 2020 have significant, long-term equity implications. Students face uneven access to distance learning due to an array of social, economic, and technological factors, and they have also had inequitable access to in-person instruction. An uneven 2020–21 school year may compound the opportunity and achievement gaps that researchers typically observe during summer breaks, resulting in more significant disparities between students than would occur in a typical year. As a result, the state and federal government have allocated funding to help districts provide supports to address learning recovery (see page 3).

Strategies to Support Learning Recovery

There are a variety of strategies that local educational agencies (LEAs) can take to mitigate the negative impacts of learning disruptions.

**Identifying Student Needs**

When schools and districts identify student needs, they are better poised to address them. Formative assessments—such as reviewing students’ oral or written work, or collecting “exit tickets” (short end-of-lesson assessments)—can help educators identify students’ individual needs and personalize their instruction effectively. During distance and hybrid learning, many teachers have less instructional time than in years past, so efficient and focused instruction are more important than ever. Given the fact that teachers have fewer opportunities to observe students and ascertain their understanding in person, formative assessment can provide educators with a balanced picture of what students know and what they need to know, relative to what can be gleaned from responses on summative assessments. Students’ understanding may vary dramatically and formative assessment can be a useful strategy for teachers to get a classroom-wide picture of students’ knowledge, particularly during this time when students are experiencing radically different levels of access to content. As educators prepare students to receive grade-level instruction in the 2021–22 school year, it is especially important that they understand the areas where students may have gaps in understanding due to distance learning.

**Acceleration, Rather than Remediation**

In planning for the remainder of the 2020–21 school year and the fall, understanding the difference between remediation and acceleration can inform the strategies districts adopt to address the impact of learning disruptions.
Remediation has been a common instructional technique used with students who have not demonstrated mastery of grade-level concepts or skills. With remediation, students are provided with content from prior years. While students often learn new content through remediation, it takes time away from learning grade-level lessons, and the age-inappropriate content can result in lower engagement. As a result, remediation can produce the unfortunate unintended consequence of widening the knowledge gaps it seeks to narrow. Students of color are disproportionately likely to receive ineffective remediation that does not advance their learning effectively, and experts recommend that districts do not focus on remediation as a strategy if they seek to offer equitable supports to students.

Acceleration represents a different, more promising approach to helping students succeed while allowing them to participate in grade-level content. With acceleration, teachers preview content for students; use new, grade-level content to teach prior-grade skills; and introduce relevant concepts from prior lessons to help prepare students to master upcoming standards. Unlike remediation, which can make students feel like they are unable to do grade-level work, acceleration centers equity and strong instruction.

The Resources section includes a guide produced by The New Teacher Project that describes supports for schools seeking to integrate acceleration into their instructional strategies.

Targeted Support in Academic Subjects Vulnerable to Learning Loss

Studies conducted before COVID-19 indicate that when students experience learning loss, the impact is more significant in math than in reading. And while research does not offer similar data on subjects like science and social studies, this does not mean that students are immune to learning loss in these subjects. Teachers may want to employ regular formative assessment to understand all gaps in student knowledge, and district leaders may want to think about ways to provide additional support in math.

While math skills for all students are generally more vulnerable to learning loss than reading skills, low-income students are likely to retain fewer reading skills over the summer when compared to their middle-class peers, who are likely to improve in reading ability over the same time period. To address this gap, districts should think about how to provide reading support for students who need it most.

To support students who have had less access to learning opportunities, experts recommend, to the extent possible, such strategies as “high-dosage” tutoring (groups of six or fewer students that meet at least four times per week) and extended learning time opportunities. Some out-of-school-time-opportunities can be provided for students for free or at a low cost, and this additional learning time may help students make academic gains more quickly. Board members and school districts should also consider building partnerships with community-based organizations that may provide more opportunities for a larger number of students.

WHAT IS FORMATIVE ASSESSMENT?

Formative assessment refers to ongoing assessments used to gauge student learning. Formative assessment are used to measure students’ current understanding so that teachers can modify instruction accordingly.

Formative assessment differs from summative assessment, which refers to end-of-course tests that are not used to inform ongoing instruction. The Smarter Balanced tests are examples of summative assessments designed to measure student achievement in relation to grade-level content standards.

The California Collaborative for Educational Excellence has created guidelines for planning formative assessment in distance learning. These guidelines can be found in the Resources section of this brief.

DEVELOPMENTS IN FEDERAL AND STATE FUNDING

Funding to support educational recovery has emerged over the course of the COVID-19 pandemic at both the state and national levels. The CARES Act, approved in March 2020 by the federal government, offered multiple funding streams for schools, with the most significant allocation going to Title I schools. Governors were also provided federal funding to use for K-12 schools.

Most recently, the federal American Rescue Plan signed into law in March 2021 provides billions of dollars to K-12 schools to support reopening and the provision of key services. The funds will largely be disbursed to districts based on the number and proportion of students they educate who qualify for Title I support. Ninety percent of the state’s funds will go directly to districts, and districts must allocate 20 percent of their funding to address learning disruptions by providing such services as summer school, tutoring, or counseling.

California legislators also passed Assembly Bill 86 in March 2021. The bill prioritizes certain student groups and allocates $4.6 billion toward learning recovery efforts within the state, which can be used to provide such supports as small group instruction, mental health services, or preparation for in-person instruction. Districts will be required to submit their spending plans by June 1, 2021.
Extending the School Day and Year

California is encouraging schools and extended-learning providers to partner closely as schools reopen. While state funding is supporting extended-learning providers to work with schools during the school day to fill gaps, it may also be beneficial to form partnerships that allow schools to extend the day and year, offering students more opportunities to engage with rich, meaningful academic content. Summer school and extended school days both offer opportunities for students to learn grade-level content and enter the 2021–22 school year more prepared.

Professional Learning to Support Teachers

Teachers are being presented with a series of challenges, including teaching online, modifying their assessment strategies, connecting with students at a distance, and differentiating instruction to support a wider range of student knowledge. As teachers continue to address the wide range of difficulties presented by distance learning, board members should encourage professional learning opportunities to support formative assessments, develop acceleration strategies, and strengthen the resources for students who were unable to access content fully during the pandemic. To ensure the professional learning opportunities are tailored to local needs, districts may consider surveying their teachers to understand the supports they believe will be most useful.

Teacher Collaboration and Communication

Just as teachers may benefit from time spent in professional learning, there is also research on the academic benefits to students when teachers are given time to collaborate with one another. As teachers are able to communicate about best practices and individual students, students benefit from the shared knowledge and a strong system of support. At a time when many teachers continue to work from home or with extensive mitigation practices in place, thus limiting in-person contact with their colleagues, intentional support for peer-to-peer collaboration may be even more important. To the extent possible, districts should provide forums and opportunities for teachers to collaborate on family communication, student workloads, and instructional technology and techniques even when in-person collaboration is not possible. This can be especially useful for educators working with students with disabilities, as education specialists (i.e., teachers with special education credentials) can help general education teachers support the 13 percent of California students with Individualized Education Programs (IEPs). Collaboration can work to provide more seamless instruction and social-emotional support, which can support student learning and help counteract academic losses, such as those that result from summer slide and disruptions like COVID-19.

What Can School Boards Do?

As board members increase their awareness of the strategies that mitigate the effects of learning loss, they can work closely with their LEAs to help enact them. District and county board members can bolster student learning by working to allocate resources for professional learning, as well as for supports for students likely to be significantly affected by pandemic-driven learning loss. Two useful strategies in advocating for an equitable budget may be emphasizing the disproportionate impact of learning loss on high-need students and underscoring the state’s requirement to target federal resources toward mitigating learning loss. Strategies for addressing learning loss, particularly for vulnerable student groups, must be addressed in the 2021–22 Local Control and Accountability Plan that boards adopt. Additionally, Assembly Bill 86 requires districts to develop plans for addressing learning recovery by June 1, 2021. Similarly, the federal American Rescue Plan requires districts to make a plan for a safe return to in-person instruction and continuity of services publicly available on their websites within 30 days of receiving their funding. Districts must also seek public comment on their plans before making them publicly available. Governing boards should monitor the effectiveness of these strategies using
the measures identified within their LCAPs, then revise their plans in response to that data to address persistent gaps in learning.

Board members may also consider advocating for broad support in mathematics and targeted literacy support, researching free or low-cost afterschool programs that might be a good fit for the district, and asking that districts allocate adequate time for teachers to collaborate.

Questions to Consider

- Which students are most vulnerable to the academic impact of learning disruptions? What are our plans to support them?
- How is the district identifying which students are most impacted by distance learning, including reduced instructional time?
- What partnerships can we develop to support acceleration of student learning through tutoring or programs that offer extended learning time?
- How are teachers and principals addressing learning recovery?
- Has the district developed guidance about how to address learning recovery?
- What guidance is the district offering about teaching material from the prior school year (vs. the current school year)?
- What opportunities do teachers have to collaborate, including vertical articulation (between one grade and the next)?
- Are teachers being supported to teach all subjects, rather than just literacy and math? How can we encourage focus on a well-rounded education?
- How does the district plan to provide additional supports for students that opt to remain in distance learning after in-person instruction becomes available? Are there drop-in programs or other forms of outreach that can be included in community hubs?

Resources

The COVID-19 Slide

NWEA released a report on what past data on learning loss can tell educators about the impact of COVID-19 on learning, and an update on learning during COVID-19. The reports can be found here:

- https://bit.ly/3gI2T7v
- https://bit.ly/2S7gYkT

Learning Acceleration Guide

The New Teacher Project produced a guide to help schools and districts provided accelerated learning, in lieu of potentially harmful remediation. The guide can be found here: https://bit.ly/2QXaWCJ

Diagnosing the Impact of Distance Learning and Amplified Learning Losses

This webinar from the California Collaborative for Educational Excellence (CCEE) focuses on understanding the impact of learning loss for all students, particularly those who are disproportionately affected. The webinar can be viewed here: https://bit.ly/3sRMKPj

The K-12 Playbooks

CCEE produced playbooks for distance and hybrid learning. The section on assessment includes considerations for formative assessment, and can be found here: https://bit.ly/3eE4B7t

Learning Loss and the Coronavirus

This podcast episode from the Harvard EdCast features information from a learning loss researcher, who reflects on the ways that our knowledge of learning loss can guide reopening plans. The episode can be found here: https://soundcloud.com/harvardedcast/learning-loss-and-the-coronavirus

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Endnotes

16. See Endnote 3.