



# **CALIFORNIA DIGITAL LEARNING INTEGRATION AND STANDARDS GUIDANCE**



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## Foreword

We are pleased to present the California Digital Learning Integration and Standards Guidance, a collaboratively developed framework for helping our teachers move standards-aligned instruction seamlessly between the in-person and virtual spaces, a resource that we believe will prove critically important in our volatile and ever-changing world.

The intent of this guidance is to help teachers deepen their technological skills and sharpen their instructional focus so they may better engage learners and make the best use of valuable class time.

This guidance is the result of Senate Bill 98, which directed and funded its development. We thank the California Legislature and Governor Newsom for their foresight in outlining that the guidance address key areas of focus, including

- critical areas of instructional focus based on standards in English language arts, English language development, and mathematics;
- resources for formative and diagnostic assessment; and
- guidance on embedding social-emotional supports for pupils.

As a result of intentional stakeholder engagement, this guidance includes input from teachers, administrators, parents, and students affected by the COVID-19 pandemic and eager to share their experiences. We thank them as well for sharing their stories and suggestions which helped shape this project.

We gratefully acknowledge the coordinating teams from the Sacramento County Office of Education, the California Department of Education, the State Board of Education, the International Society for Technology in Education, EdSurge Solutions Studio, and Computer-Using Educators for keeping this project on track and in focus.

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Finally, we thank the members of the State Board for unanimously approving this guidance at their September 2024 meeting.

It is our hope that this guidance is a useful support for leveraging technology in teaching and learning in a variety of ways even as we return from distance learning to classroom-based instruction and, as such, improve learning for California's students who so deserve instructional methods that mirror our state's present and future as America's technology leader.

Sincerely,

DAVID W. GORDON  
Sacramento County Superintendent of Schools

LINDA DARLING HAMMOND  
President of the State Board of Education

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State Superintendent of Public Instruction



# Introduction

Years of substantial investment in technology infrastructure for schools, including equipping students and teachers with internet connectivity and devices, have set the conditions for transformative innovation of learning. When used effectively in online (synchronously or asynchronously), hybrid, or face-to-face environments, digital tools can accelerate sound pedagogical practices and facilitate student growth as lifelong, empowered learners. Benefits of strategic technology use to support learning include<sup>1</sup>

- promoting active student engagement in the learning process;
- nurturing opportunities for ongoing collaboration with peers, educators, families, and a global community of experts;
- building on prior knowledge to deeply reinforce essential skills, such as executive functioning, critical thinking and reasoning, creativity, communication, cross-cultural understanding, and decision-making;
- providing means of authentically connecting students' learning to the world beyond their physical learning environment; and
- fostering student agency to set personal learning goals and plans and continuously monitor and evaluate their own progress.

In addition to the benefits for students, technology can serve as an important tool for educators to cultivate supportive relationships with students and families, redesign instruction using competency-based learning models, equitably differentiate instruction, support individual learner needs, and build student knowledge of effective digital learning practices through connections with peers, experts, and professional learning networks.

Many leaders and educators from across California have already recognized that the post-pandemic moment provides a unique opportunity for the education system to shift towards a reimagined learning model in which technology is not perceived as a supplementary resource but a core tool to ensure student success.



<sup>1</sup> <https://tech.ed.gov/netp/>



To support schools in the effective implementation of technology to support learning, the *California Digital Learning Integration and Standards Guidance* provides strategies to build educator and system capacity. The guide is based on foundational, research-based digital learning practices, including engaging in personal interaction, building classroom communities, promoting collaboration, incorporating authentic assessment, designing active learning activities, and cultivating student-centered opportunities to build agency.

The guide connects decades of research on digital learning (See Appendix A) to inform specific topics outlined in Senate Bill 98 (SB 98).<sup>2</sup> SB 98 identifies the topics for the development of a draft distance learning curriculum and instructional guidance for mathematics, English language arts, and English language development that includes a framework for addressing critical standards and other topics related to distance learning. Furthermore, two nationally-recognized sets of standards, the International Society for Technology in Education (ISTE) Standards for Educators and the National Standards for Quality Online Teaching, were used as a framework to align recommendations for effective technology use. And finally, input from the California Distance Learning Advisory Committee, parents/caregivers, and students was used to inform the recommended strategies for educators.

The guide is organized into three sections, Sections A, B, and C. Section A presents six distinct areas of need. Addressing each area of need is essential to ensuring digital learning opportunities are effective and equitable. Sections B and C of the guide provide standards guidance for Mathematics and English Language Arts/English Language Development by identifying and addressing critical areas of instructional focus.

## Section A

- Chapter 1
  - Ensuring Equity and Access
  - Preparing and Supporting Teachers for Digital Teaching
  - Designing Meaningful Online and Blended Learning Experiences

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<sup>2</sup> [https://leginfo.legislature.ca.gov/faces/billTextClient.xhtml?bill\\_id=201920200SB98](https://leginfo.legislature.ca.gov/faces/billTextClient.xhtml?bill_id=201920200SB98)

- Chapter 2
  - Assessing Students in Authentic Ways
- Chapter 3
  - Infusing Social and Emotional Learning
  - Cultivating Educator and Student Well-being

## Section B

- Chapters 4–9
  - Standards Guidance for Mathematics

## Section C

- Chapters 10–16
  - Standards Guidance for English Language Arts, Literacy, and English Language Development

This guide incorporates vignettes and interviews featuring California educators throughout the chapters. These vignettes and interviews provide examples of topic-specific, recommended strategies and resources for educators as they teach within and design digital learning environments. The following provides a summary of the key concepts presented in each chapter.

**Chapter 1** explores how to best ensure equity and access for all students, especially those who are affected by structural and institutional injustices during health and economic crises (PACE, 2020), including students with disabilities, students who are English learners, foster youth, and students experiencing homelessness (Repetto, Spitler, & Cox, 2018). Chapter 1 also includes a subsection on Preparing and Supporting Teachers for Digital Teaching, as pedagogical approaches and strategies for online and hybrid environments are vastly different than those used in a traditional setting (Archambault & Kennedy, 2018). Therefore, effectively incorporating technology into learning experiences requires strategic professional learning (Kolb & Carter, 2020) that is ongoing, practice-based, culturally relevant, content-specific, and context-specific. Designing Meaningful Online and Blended Learning Experiences is the final topic addressed in Chapter 1. This area provides practical guidance for educators who are designing online and hybrid learning experiences, including key considerations for aggregating time for synchronous and asynchronous learning.

**Chapter 2** focuses on the importance of assessments in a digital environment. Specifically, the chapter focuses on suggestions for implementing formative, summative, interim, and diagnostic assessments in online and blended learning environments. These assessments are essential in order to determine effectiveness

of pedagogical strategies, understand individual students' needs and supports, and inform and individualize instruction to accelerate learning.

**Chapter 3** focuses on fostering healthy, equitable, and inclusive digital communities, including Infusing Social and Emotional Learning (SEL) and Cultivating Educator and Student Well-being. By emphasizing SEL and well-being, schools can create virtual learning environments that are safe and inclusive that support equitable student outcomes.

**Chapters 4 through 9** provide standards guidance for mathematics by addressing critical areas of instructional focus. The standards guidance is intended to support teachers as they implement mathematics instruction in online, blended, or in-person learning environments. The standards guidance is organized around the “big ideas” in the *2023 Mathematics Framework for California Public Schools, Kindergarten Through Grade Twelve (Mathematics Framework)*, which seeks to support teachers in moving to the teaching of meaningful mathematics and enabling students to develop an interconnected understanding of different concepts. Chapter 4 outlines additional suggestions for digital learning practices relevant to this content area, while Chapter 5 provides an introduction to the standards guidance and highlights the importance of the content and the ways it is connected to other content and practices. Chapters 6 through 9 organize guidance for standards by grade level.

**Chapters 10 through 16** provide standards guidance in English Language Arts (ELA), Literacy, and English Language Development (ELD) by addressing critical areas of instructional focus. The standards guidance will support teachers as they implement ELA, literacy, and ELD instruction in online, blended, and in-person learning environments. The organization of the standards highlights their relationships and reflects an integrated model of literacy instruction. The standards are clustered within and across strands and organized primarily by the five crosscutting themes in the *ELA/ELD Framework for California Public Schools: Kindergarten Through Grade Twelve*,<sup>3</sup> which include meaning making, language development, effective expression, content knowledge, and foundational skills. Chapter 10 outlines additional suggestions for digital learning practices relevant to these content areas, while Chapter 11 provides an introduction to the standards guidance. Chapters 12 through 16 organize guidance for standards by grade level.

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**3** <https://www.cde.ca.gov/ci/rl/cf/elaeldfrmwrksbeadopted.asp>

California schools have the opportunity to re-envision the education system and take steps to build more equitable learning environments for educators and students using technology. Leveraging the strategies and recommendations featured in this guide, educators can learn about how to change the trajectory of the future of teaching and learning, develop a curriculum map for online instruction, and collaborate with colleagues to build a collection of lessons and activities designed with their students in mind. Through intentional planning and high-quality instruction, educators are at the precipice of a new beginning and have the power to chart a new course for digital teaching and learning to be more student-centered, inclusive, and equitable.