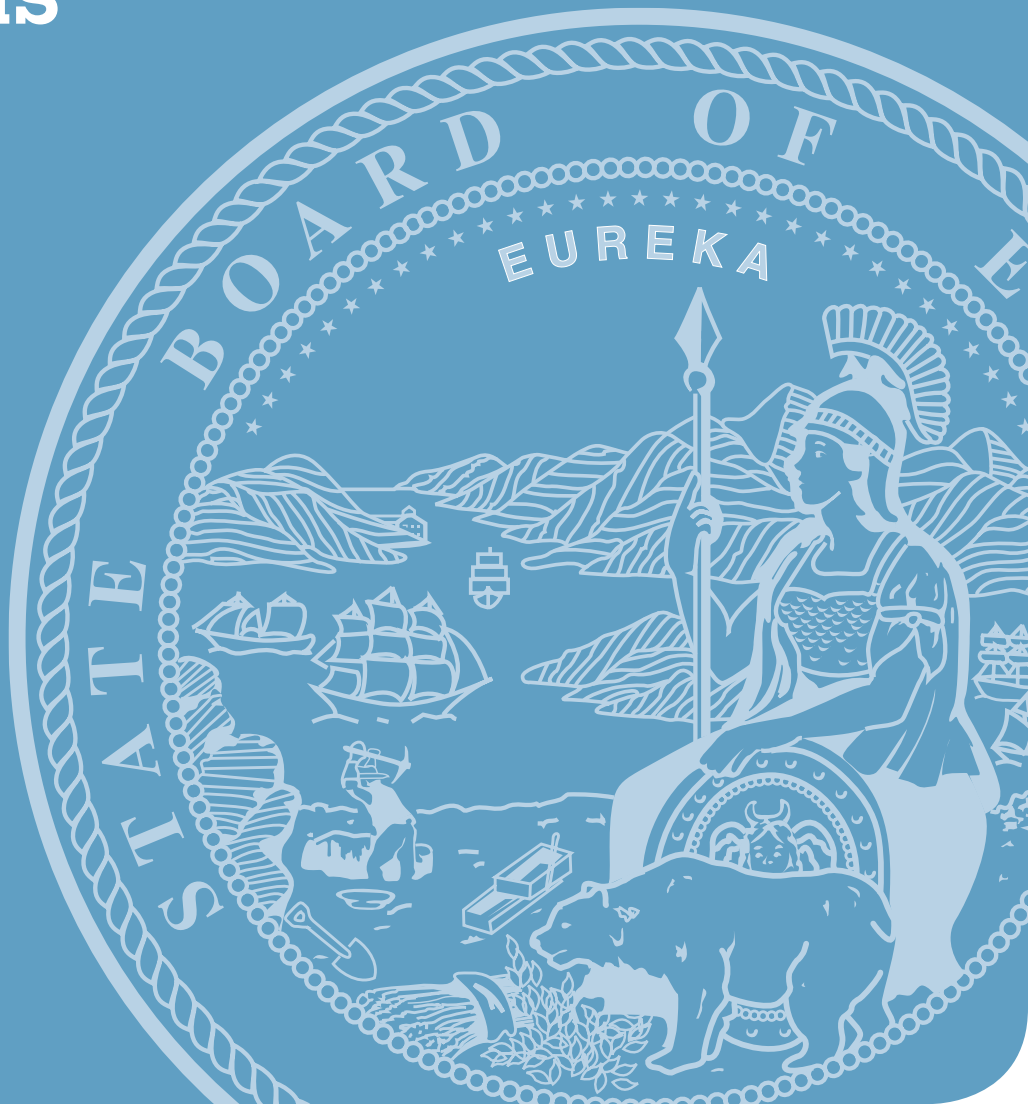
Next Generation Science Standards at a Glance



Next Generation Science Standards at a Glance

Table 1. The Three Dimensions of the CA NGSS

Science and Engineering Practices	Disciplinary Core Ideas	Crosscutting Concepts
SEP-1. Asking questions and defining problems	**Physical Science**	CCC-1. Patterns
SEP-2. Developing and using models	PS1: Matter and its interactions	CCC-2. Cause and effect: Mechanism and explanation
SEP-3. Planning and carrying out investigations	PS2: Motion and stability: Forces and interactions	CCC-3. Scale, proportion, and quantity
SEP-4. Analyzing and interpreting data	PS3: Energy	CCC-4. Systems and system models
SEP-5. Using mathematics and computational thinking	PS4: Waves and their applications in technologies for information transfer	CCC-5. Energy and matter: Flows, cycles, and conservation
SEP-6. Constructing explanations (for science) and designing solutions (for engineering)	**Life Science**	CCC-6. Structure and function
SEP-7. Engaging in argument from evidence	LS1: From molecules to organisms: Structures and processes	CCC-7. Stability and Change
SEP-8. Obtaining, evaluating, and communicating information	LS2: Ecosystems: Interactions energy, and dynamics	
	LS3: Heredity: Inheritance and variation of traits	
	LS4: Biological evolution: Unity and diversity	
	Earth and Space Science	
	ESS1: Earth's place in the universe	
	ESS2: Earth's systems	
	ESS3: Earth and human activity	
	Engineering, Technology, and Applications of Science	
	ETS1: Engineering Design	
	ETS2: Links among engineering, technology, science, and society	

Common CA NGSS Acronyms

CCC: Crosscutting Concept
DCI: Disciplinary Core Idea
ETS: Engineering, Technology, and Applications of Science
PE: Performance Expectation
SEP: Science and Engineering Practices

CCSS Connections

CCSS: Common Core State Standards
CC: Counting and Cardinality
EE: Expressions and Equations
F: Functions
G: Geometry
MD: Measurement and Data
NBT: Number and Operations in Base Ten
NF: Number and Operations–Fractions
NS: The Number System
OA: Operations and Algebraic Thinking
RI: Reading Informational Text
RL: Reading Literature
RP: Ratios and Proportional Relationships
RST: Reading in Science and Technical Subjects
SL: Speaking and Listening
SP: Statistics and Probability
W: Writing
WHST: Writing in History/Social Studies, Science, and Technical Subjects