



BUILDING CAPACITY

NYS Next Generation English Language Arts and Mathematics Learning Standards

Board of Regents Update

October 7, 2019



New York State
EDUCATION DEPARTMENT

Knowledge > Skill > Opportunity

ESSA AND THE NEXT GENERATION LEARNING STANDARDS

- NY's ESSA plan aims to ensure that all students succeed and thrive in school no matter who they are, where they live, where they go to school or where they come from
- NY's ESSA plan is a set of interlocking strategies to promote educational equity by providing support to districts and schools as they work to ensure that every student succeeds

Next Generation Standards Connections

- Deliberate, inclusive and transparent approach with educators to develop our Next Generation Learning Standards.
- The standards are rigorous and will prepare children for successful lives in the 21st century.
- Work continues through partnerships with BOCES and Teacher Centers to develop resources and professional learning opportunities to provide deeper learning for teachers.



CONNECTIONS TO STUDENT CULTURAL NEEDS

Standards and local curriculum need to reflect cultural needs of students

Connections to the [Culturally Responsive-Sustaining Education Framework](#):

- Welcoming and affirming environment
- High expectations and rigorous instruction
- Inclusive curriculum and assessment
- Ongoing professional learning work

“If we are to create the conditions where all children can meet Standards, we begin by affirming their identities, respecting their heritage, and integrating their perspectives in the everyday activities that organize instruction.”

~From the Early Learning Standards Introduction

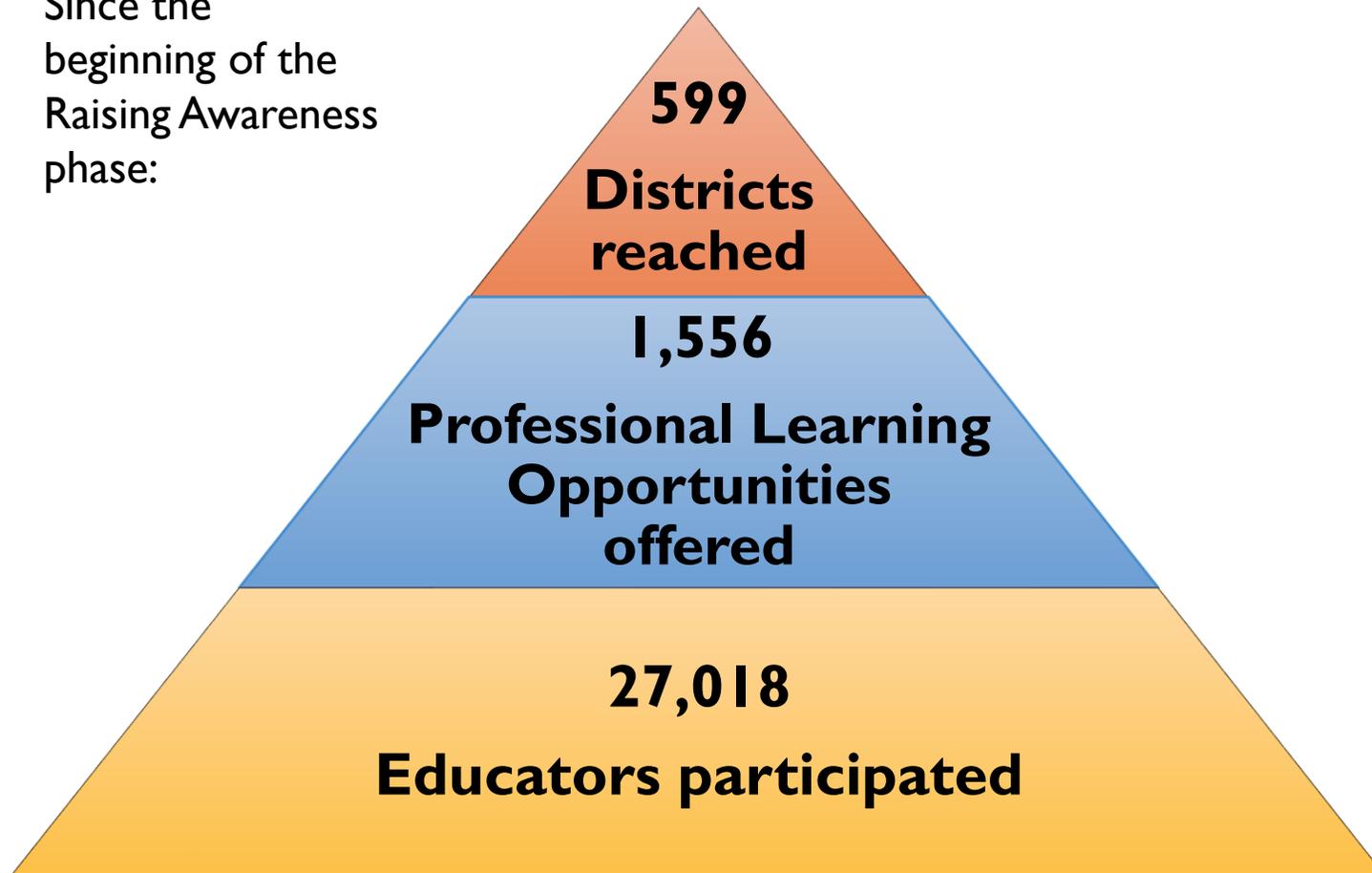


“Works should be culturally responsive, relevant to all students, and available in the home language when possible”
~From the ELA Introduction



STATEWIDE SURVEY AND DATA FROM BOCES

Since the beginning of the Raising Awareness phase:



- Halfway through the Raising Awareness Phase, BOCES asked for district feedback through a survey (early 2019)
- Surveys help to target teacher needs for professional learning around the standards at the district level

DEPARTMENT OUTREACH AND PROFESSIONAL LEARNING

- Three [statewide conferences](#) (Rochester, NYC, and Saratoga)
- Ongoing partnership with BOCES District Superintendents and Big 5 content leaders
- [Implementation Roadmap and Timeline](#) with three clear phases
- [Next Generation website](#) to share information
- [Roadmap Spotlight](#) feature, to highlight local BOCES and district work across the state
- [Professional Learning toolkits](#) to share conference materials and training statewide
- [Parent brochure](#) on the standards
- Supporting resources, such as [crosswalks](#), [glossaries](#), [a video series for P-3](#), and [curriculum guidance for aligning local school curriculum](#)
- Ongoing calls and webinars with the Big 5 districts, professional organizations, and BOCES S/CDN to collaborate and keep communication ongoing
- New [content area listserv](#) to keep teachers up-to-date with news about the standards and content; open to all educators and the public

NEXT GENERATION STANDARDS PRESENTATIONS TO ORGANIZATIONS (OVER THE PAST YEAR)

- BOCES Staff and Curriculum Development Network (S/CDN)
- Long Island Association of Supervision and Curriculum
- Regional Bilingual Education Networks
- NYS Council of Education Associations
- NYS Council of School Superintendents
- Commissioner's Advisory Council
- Association of School Counselors
- BOCES S/CDN Statewide Groups
- Executive Leadership Institute (NYC)
- Association of Mathematics Teachers of New York State
- NYS Reading Association
- NYS English Council
- Schoharie County District Training
- Annual Nonpublic Schools conference
- School Administrators Association of NYS



NYS NEXT GENERATION LEARNING STANDARDS IMPLEMENTATION TIMELINE (2017-2021)

September 2017:

Adoption of Next
Generation Learning
Standards

- Phase I Raise Awareness**
(Winter 2018 - Winter/Spring 2019)
- Professional development on NYS Next Generation Learning Standards
 - Two-day assessments measuring the 2011 P-12 Learning Standards

- Phase II Build Capacity**
(Spring 2019 – Summer 2020)
- Professional development continuing on NYS Next Generation Learning Standards
 - Two-day assessments measuring the 2011 P-12 Learning Standards

- Phase III Full Implementation**
(September 2020 - ongoing)
- Full implementation of the NYS Next Generation Learning Standards

Spring 2021:
New Grades 3-8 tests
measuring the NYS Next
Generation Learning
Standards.

NEXT STEPS FOR PROFESSIONAL LEARNING



BOCES S/CDN and district partnerships will continue with targeted professional learning and ongoing communication and collaboration



Office of Curriculum & Instruction will continue to provide assistance through face-to-face and video trainings



NYSED will make a compilation of where to go for Roadmap assistance and regional professional learning



More teacher resources will be created to support Phase II (Building Capacity) and Phase III (Full Implementation)



Guidance and Resource Development

EDITABLE ROADMAP



New York State Education Department – New York State Next Generation ELA and Mathematics Learning Standards Implementation Roadmap

- Requested by educators and administrators to increase ease of documentation of action steps taken towards implementation
- Key implementation activities pertaining to S/CDN, BOCES, Local School District, or other Stakeholder Groups now have a fillable action steps column
- Click and type to edit!

<http://www.nysed.gov/common/nysed/files/programs/curriculum-instruction/editable-roadmap-011019.pdf>

NYS NEXT GENERATION ENGLISH LANGUAGE ARTS and MATHEMATICS LEARNING STANDARDS						
Phase I: Raise Awareness		Stakeholder Groups *				Timeline:
Make all education stakeholders aware of the revised standards and the timeline for implementation; highlight areas of impact with respect to current standards, instruction, and assessment. This collaborative phase will help identify the necessary professional development that will occur in Phase II. Please note: In Spring 2021, the NYS 3-8 assessments will align to the NYS Next Generation Learning Standards. The timeline regarding assessment alignment at the high school level has not been determined and will be forthcoming.						Winter 2018-Winter/Spring 2019
Goal(s)	Key Implementation Activities	NYSED	S/CDN & BOCES	Local School Districts	Other Stakeholder Groups	Action Steps Taken (To be completed by local districts)
Goal 1: Clearly communicate the adoption and the implementation timeline of the Next Generation ELA and Mathematics Learning Standards.	Maintain updated NYSED ELA and Mathematics Curriculum and Instruction website and EngageNY.	✓				
	Conduct conference calls with Statewide Leaders of Professional Associations/Big 5 Districts.	✓				
	Conduct presentations on the implementation timeline at major statewide meetings.	✓	✓			
	Conduct presentations on the implementation timeline at district administrative meetings and/or regional/local level meetings. Share information with administrators and teachers.	✓	✓	✓	✓	
	Utilize electronic communication and social media to inform stakeholders of the timeline for implementation.	✓	✓	✓	✓	



GUIDANCE FOR STUDENTS WITH DISABILITIES

- Clear language in the Next Generation Standards Introductions, with sections dedicated to guidance for Students with Disabilities
- Parent brochure, which will be translated into different languages
- Instructional scaffolding guidance documents (focused on Grades 3-8)
- Guides for aligning local curricula to the Next Generation Standards, with guidance for supporting students with disabilities
- Supporting all Students conference materials and toolkits. For example, developing a Standards-Based Individualized Education Program toolkit is available

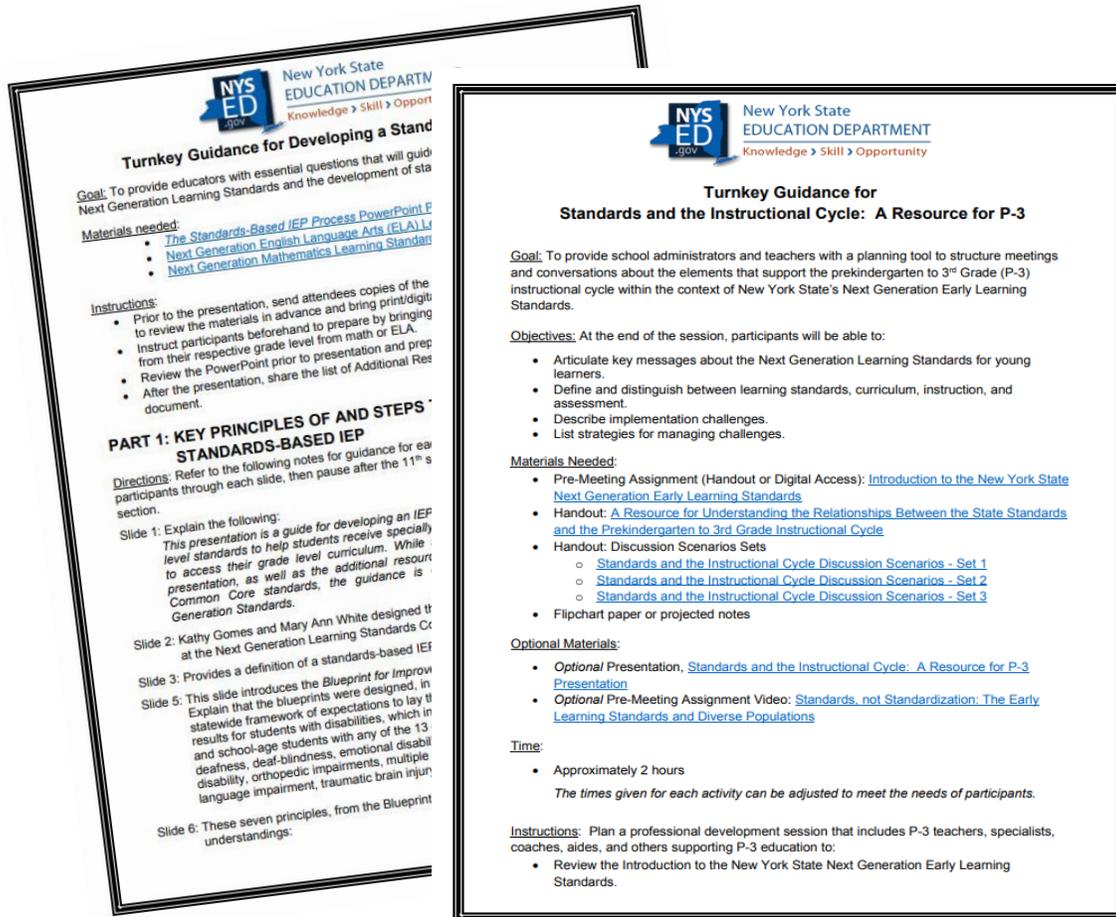


GUIDANCE FOR ENGLISH LANGUAGE LEARNERS

- Updated Bilingual Progressions and classroom practices under development from the Office of Bilingual Education and World Languages (OBEWL)
- Clear language in the Next Generation Standards Introductions, with sections focused on ELLs
- New professional learning for teaching mathematics to ELLs under development
- Series of Literacy Briefs includes a focus on academic language and ELLs
- ELL Program Quality Review toolkit from OBEWL



PROFESSIONAL LEARNING TOOLKITS



- Online access to materials from the *Supporting all Students* conferences
- Guidance on utilizing the presentations and workshop materials
- Suggestions for organizing professional development
- All materials are free and open to use for districts/schools
- **NOW AVAILABLE!**
 - Developing a Standards-Based IEP
 - Standards, *not* Standardization

LITERACY BRIEFS

A Series of [Topic Briefs](#) Produced for the New York State Education Department by Nonie K. Lesaux, PhD & Emily Phillips Galloway, EdD

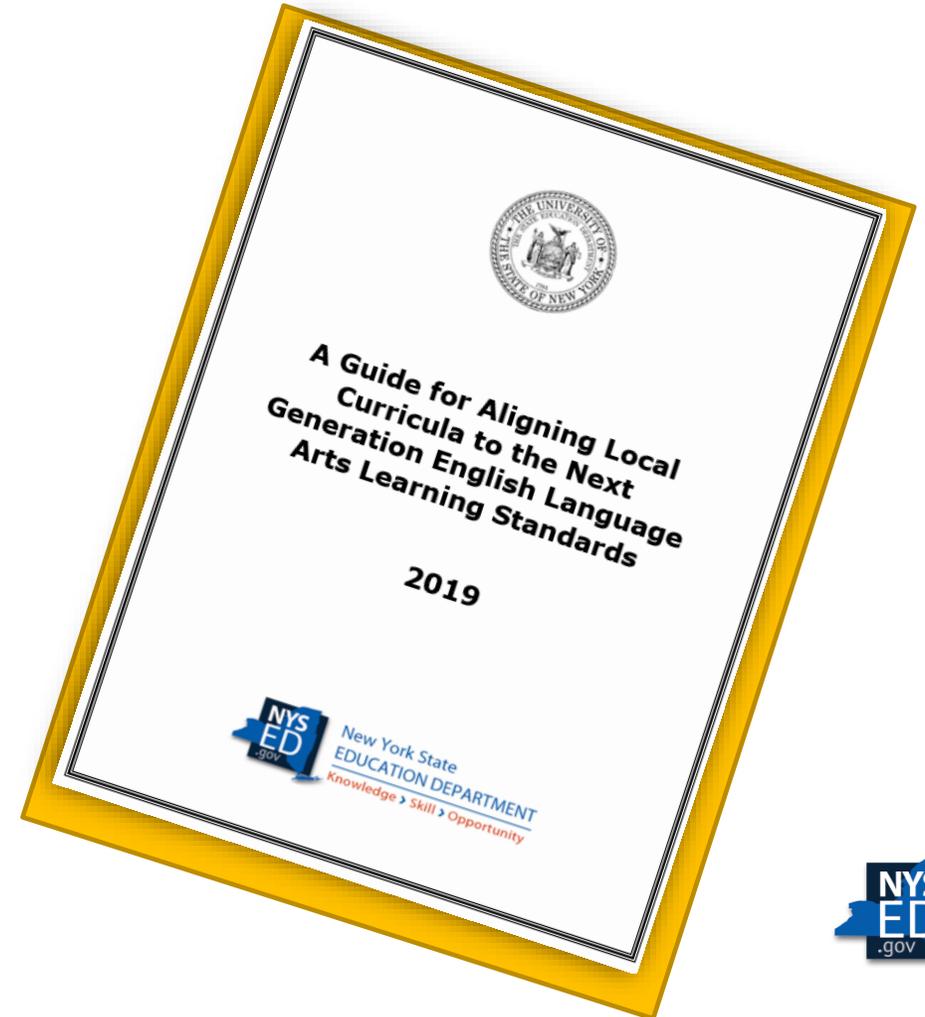
Code-Based Skills + **Meaning-Based Skills** = **Reading**

APPLY ADVANCED LITERACY SKILLS AND COMPETENCIES | **CONSOLIDATE CONTENT KNOWLEDGE** | **FOSTER ACADEMIC MOTIVATION**

NYS ED .gov

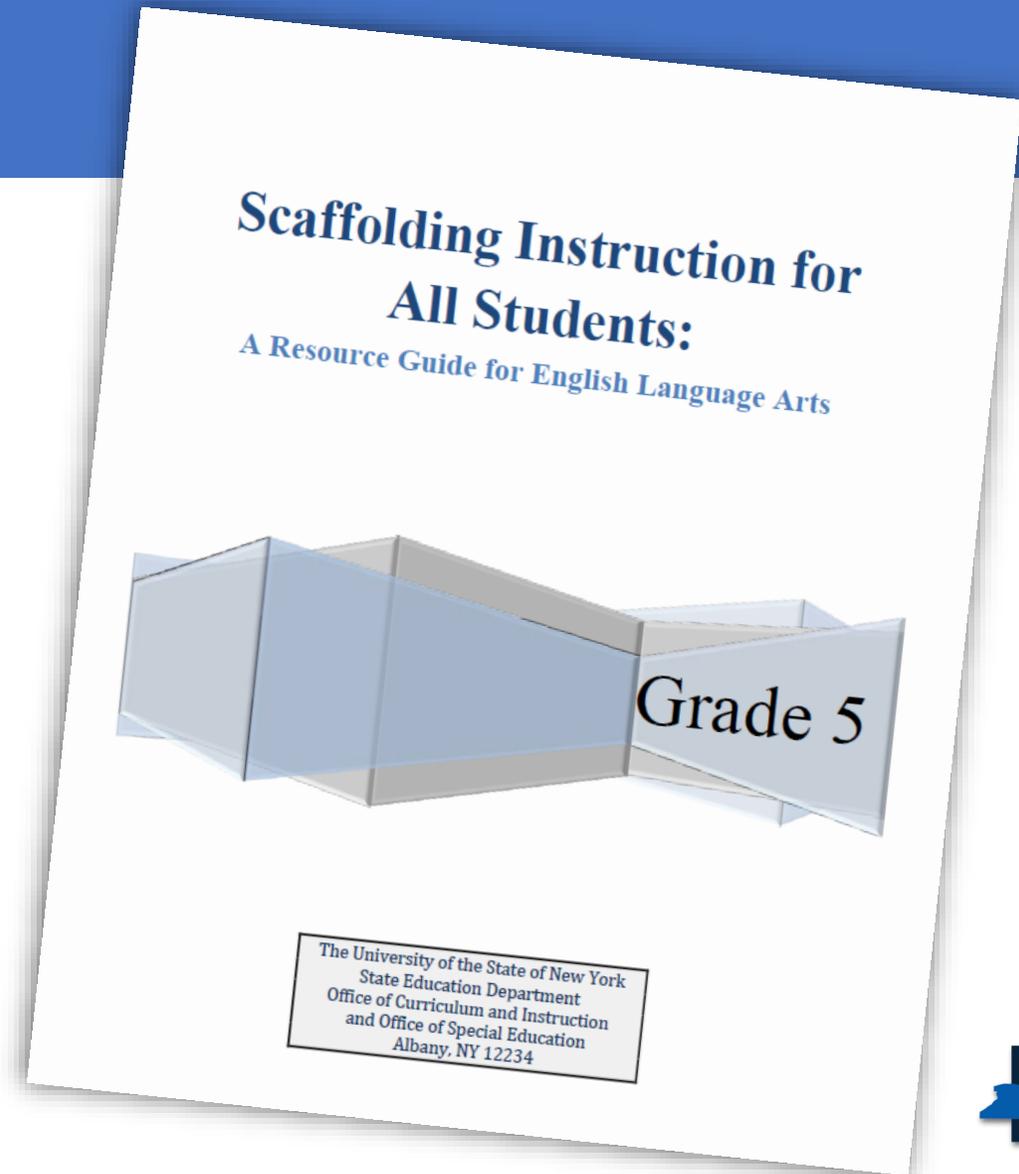
CURRICULUM GUIDANCE: ALIGNMENT GUIDE FOR MATH/ELA

- Supports Implementation of the Math and ELA Next Generation Learning Standards
 - **Optional** for Districts
 - Crafted for Grades 3-12
 - Guidance applies to PK- Grade 2 with modification(s)
- Provides overview of standards revision
- Includes ELA Reflection Rubric for Units
- Statewide rollout conference was held in August 2019



SCAFFOLDING GUIDES FOR INSTRUCTION

- Provide teachers with examples of scaffolds and strategies to supplement ELA and mathematics instruction in grades 3-8
- Scaffolds
 - Allow all students access to grade-level content within a lesson
 - Allow students to develop the knowledge, skills, and language needed to support their own performance in the future
 - Are intended to be gradually removed as students independently master skills
 - Grades 3-5 available this fall



NEXT GENERATION ROADMAP SPOTLIGHT

Utilizing Teacher Leadership and Instructional Coaching to Support the Next Generation Standards Rollout

Hudson Falls Central School District utilizes its teacher leadership structure and instructional coaching support to rollout the Next Generation Standards for English and Mathematics.



Demographics

The Hudson Falls Central School District (HFCSD) encompasses the Village of Hudson Falls and outlying communities of seven other nearby towns. It serves the educational needs of 2,366 students PK-12. The district maintains five buildings: Margaret Murphy Kindergarten Center for prekindergarten and kindergarten (MMKC), Hudson Falls Primary School (HFPS) for grades 1-3, Hudson Falls Intermediate School (HFIS) for grades 4-5, Hudson Falls Middle School (HFMS) for grades 6-8, and Hudson Falls High School (HFHS) for grades 9-12. Students are 50% male and 50% female, comprised of 1% Black students, 4% Hispanic or Latino, 1% Asian, 89% White, and 5% Multiracial. Among our student population, 1% are English Language Learners, 19% are Students with Disabilities, and 58% are Economically Disadvantaged.

Phase of Implementation and Specific Implementation Goals

Raising Awareness: During this phase of implementation, our district has worked to identify a team of experts that will work together to educate the district and broader community of the timeline for the rollout of the Next Generation Standards. Through this learning, staff and community members will review introductory documents, and consider implications and needs to ensure success for all learners.

Curriculum and Planning

ELA: The research based curriculum that our district has adopted (RW and WW) K-8 is aligned to the standards and supports best instructional practices in all classrooms. Through the transition to school-wide use of the workshop structure, instructional practices aligned to the new standards are the focus of curriculum planning within departments at the high school (9-12).

MATH: Through an internal review led by our Elementary Math Instructional Coordinator, our math program was evaluated for alignment to the

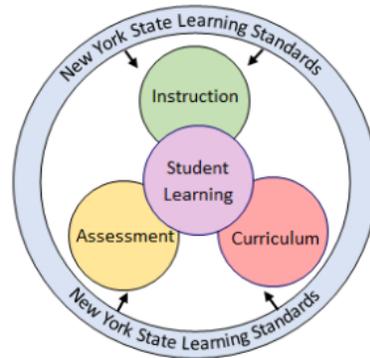
- Educators are encouraged to spotlight their Next Generation Standards implementation work.
- Examples include:
 - the connection Herricks UFSD made between their values and the Lifelong Practices of Readers and Writers in [The Senior Exit Portfolio: Measuring the Lifelong Practices through Student Reflection](#).
 - Cayuga-Onondaga BOCES Professional Development Unit's response to the needs of their component districts by providing them with the *Next Generation One Page Reference Guide*. This guide guarantees that all administrators and teachers have access to resources, materials, and tools necessary to raise awareness around the Next Generation standards in ELA and Math. Read more in [Cayuga-Onondaga BOCES Thinks "Outside the Box" to Raise Awareness](#).

PARENT BROCHURE

- [Guidance to assist with preparing parents for the transition to the Next Generation Learning Standards](#)
- Includes:
 - Description of the instructional cycle and the role of standards in the cycle
 - Brief FAQ
 - Links to resources to support classroom learning at home

Standards and My Child's Classroom Learning

Student learning is best supported when goals are well defined. The model below shows how key parts of learning work together. The central focus, student learning, depends on curriculum, instruction, and assessment. The learning standards represent the overall knowledge and skills students need to learn by the end of each school year.



Standards <i>"What do we need to learn?"</i>	Standards are: <ul style="list-style-type: none"> • goals for New York State students • organized by subjects and grade levels • the learning intended to be accomplished by the end of a school year • approved by the New York State Board of Regents <i>Example of a Kindergarten Math Standard: Duplicate and extend patterns using concrete objects. Ex: Colored blocks or tiles.</i>
Curriculum <i>"What are we learning?"</i>	Curriculum is: <ul style="list-style-type: none"> • the content, concepts, and skills students will learn to meet the standards • determined by individual school districts <i>Example: locally developed units of study, such as a unit on poetry multiplication of two-digit numbers.</i>
Instruction <i>"How are we learning?"</i>	Instruction is: <ul style="list-style-type: none"> • the approaches and strategies an educator chooses to teach the curriculum • based on the needs of students • determined by classroom teachers and districts <i>Example: small group instruction or cooperative learning</i>
Assessment <i>"What have we learned?"</i> <i>"What should we do next?"</i>	Assessments: <ul style="list-style-type: none"> • are processes used to learn about student progress • guide and inform teaching • are determined by local districts and/or teachers, as well as the New York State * New York State administers: <ul style="list-style-type: none"> • ELA and Mathematics Assessments in Grades 3-8 • Science Assessments in Grades 4 & 8 • Regents Examinations • English as a Second Language Achievement Test (NYSESL) • Alternate Assessment (NYSAA) <i>Example: classroom observation of a student recognizing patterns; analyzing a student's classroom writing sample</i>

NYS ED 2010 **NYS Next Generation LEARNING STANDARDS**



A Parent's Guide to the New York State Next Generation ELA & Math Learning Standards



MATHEMATICS: UNPACKING THE NEXT GENERATION STANDARDS

- [NYS Next Generation Mathematics Learning Standards Unpacking Documents](#)
- [A Guide to Unpacking the Next Generation Mathematics Learning Standards](#)
- Section I:
 - Analyzing How the Standard Relates to its Domain and Cluster
- Section II:
 - Identifying Learning Targets
 - Identifying Foundational Understanding
 - Reflecting on the Aspects of Rigor and the Standards for Mathematical Practice
- Section III:
 - Designing Examples to Support Current Instruction of the Content Standard and the Attainment of the Learning Targets

New York State Next Generation Mathematics Learning Standards Unpacking Document (DRAFT)	
COURSE: Algebra I	DOMAIN: Number and Quantity (N) – The Real Number System (RN)
CLUSTER: Students are thinking about the properties of rational and irrational numbers and how with each extension of number, the meanings of addition, subtraction, multiplication and division are extended. Using their knowledge of operations on rational numbers, students will perform operations on irrational numbers, using mathematical properties to simplify and combine expressions.	
Grade Level Standard: AI-N.RN.3a Perform all four arithmetic operations and apply properties to generate equivalent forms of rational numbers and square roots.	
Note: Tasks include rationalizing numerical denominators of the form $\frac{a}{\sqrt{b}}$ where a is an integer and b is a natural number.	
PERFORMANCE/KNOWLEDGE TARGETS (measurable and observable)	
<ul style="list-style-type: none"> • simplify, add, subtract, multiply, and divide expressions that contain square roots and/or rational numbers; • rationalize denominators of the form $\frac{a}{\sqrt{b}}$ where a is an integer and b is a natural number; and • generate equivalent forms of square roots. 	
ASPECTS OF RIGOR	
	Procedural Conceptual Application
MATHEMATICAL PRACTICES	<ol style="list-style-type: none"> 1. Make sense of problems and persevere in solving them. 2. Reason abstractly and quantitatively. 3. Construct viable arguments and critique the reasoning of others. 4. Model with mathematics. 5. Use appropriate tools strategically. 6. Attend to precision. 7. Look for and make use of structure. 8. Look for and express regularity in repeated reasoning.
FOUNDATIONAL UNDERSTANDING	<p>NY-6.G.5 Use area and volume models to explain perfect squares and perfect cubes.</p> <p>NY-8.NS.1 Understand informally that every number has a decimal expansion; the rational numbers are those with decimal expansions that terminate in 0s or eventually repeat. Know that other numbers that are not rational are called irrational.</p> <p>NY-8.EE.1 Know and apply the properties of integer exponents to generate equivalent numerical expressions. For example, $3^2 \times 3^4 = 3^6 = \frac{3^6}{3^2} = 3^4$.</p> <p>NY-8.EE.2 Use square root and cube root symbols to represent solutions to equations of the form $x^2 = p$ and $x^3 = p$, where p is a positive rational number. Know square roots of perfect squares up to 225 and perfect cubes to 125. Know that the square root of a non-perfect square is irrational.</p>

The following pages contain EXAMPLES to support current instruction of the content standard and may be used at the discretion of the teacher and adapted to best serve the needs of the learners in the classroom.

1. **Equivalent forms of Rational Numbers:** Lessons on infinite and finite decimal expansions of rational numbers can be found in [EngageNY Grade 8 Module 7](#), topic 8 (lessons 6-14). Keep in mind that students may not have been exposed to representing a rational number expressed as a repeating decimal in fraction form. This is no longer a grade-level expectation for grade 8.
2. **Simplifying Square Roots:** Lessons on simplifying radicals, as well as performing operations (rationalizing denominators) can be found in [EngageNY Grade 8 Module 7](#), lesson 4, as well as in the [Geometry Module 2](#), lessons 22 and 23.
3. **Visual/Geometric Representation for Simplifying Radicals** (Taken from Radical Thoughts on Simplifying Square Roots, Kyle T. Schultz and Stephen F. Bismarck, Vol. 19, No. 4, November 2013 MATHEMATICS TEACHING IN THE MIDDLE SCHOOL). This representation consists with work done in grade 6 (NY-6.G.5) with respect to using area models to represent perfect squares.

To show the geometric simplification of $\sqrt{18}$, students use prior knowledge of perfect squares and realize that a square with an area of 18 square units cannot be partitioned into a square-shaped array. This square, nevertheless, can still be partitioned into a square-shaped array of smaller squares, provided that the area of these smaller squares is rational even if the side lengths are irrational. In this case, the square with an area of 18 square units can be partitioned into 9 squares, each with an area of 2 square units (see fig. 3 c). This new configuration provides an alternative way to calculate $\sqrt{18}$ by examining the length of the side of a square whose area is 18 square units. Notice that the side length of the large square is equivalent to three side lengths of one smaller square. The area of each small square is 2 square units, so the side length of each small square is $\sqrt{2}$ units. Thus, $\sqrt{18} = 3\sqrt{2}$. To connect this model to previous work with area models and perfect squares, the search for a perfect-square factor of 18 coincides with identifying how to partition the square into smaller squares with whole-number areas. The expression $\sqrt{9 \cdot 2}$ is equivalent to the length of the side of a square array of 9 squares each with an area of 2 square units. In this case, $\sqrt{2}$ is the length of a partitioned side of the large square into the nine small squares.

Students can create visual/geometric representations for other radicals, i.e., $\sqrt{50}$, $\sqrt{24}$, $\sqrt{80}$.

4. **Examples of Arithmetic Operations Involving Radicals:**

1. $\sqrt{48} = \sqrt{16 \cdot 3} = 4\sqrt{3}$
2. $\sqrt{2} + 3\sqrt{2} - 7\sqrt{2} = -3\sqrt{2}$
3. $\sqrt{2} + 2\sqrt{2} = \sqrt{2} + 4\sqrt{2} = 5\sqrt{2}$
4. $\sqrt{3} + 3\sqrt{3} + 5\sqrt{3} - 4\sqrt{3} = \sqrt{3} + 3\sqrt{3} + 5\sqrt{3} - 4\sqrt{3} = 6\sqrt{3} - \sqrt{3}$
5. $3\sqrt{5} \cdot 4\sqrt{5} = 3 \cdot 4 \cdot \sqrt{5 \cdot 5} = 12\sqrt{25} = 12 \cdot 5 = 60$
6. $\frac{3\sqrt{12}}{2\sqrt{3}} = \frac{3 \cdot \sqrt{4 \cdot 3}}{2 \cdot \sqrt{3}} = \frac{3 \cdot 2\sqrt{3}}{2 \cdot \sqrt{3}} = \frac{6\sqrt{3}}{2\sqrt{3}} = 3$
7. $\frac{\sqrt{2}}{\sqrt{5}} = \frac{\sqrt{2}}{\sqrt{5}} \cdot \frac{\sqrt{5}}{\sqrt{5}} = \frac{\sqrt{10}}{5}$
8. $\frac{10}{\sqrt{2}} = \frac{10}{\sqrt{2}} \cdot \frac{\sqrt{2}}{\sqrt{2}} = \frac{10\sqrt{2}}{2} = 5\sqrt{2}$
9. $\frac{42\sqrt{2}}{2} \cdot \frac{42\sqrt{2}}{2} = 21\sqrt{2} \cdot 21\sqrt{2} = 21 \cdot 21 \cdot 2 = 882$

NEXT GENERATION ELA FREQUENTLY ASKED QUESTIONS

- A space for educators to read and submit questions about the Next Generation ELA Standards
- Provides more clarity about the standards and two-way information
- Updated as more questions are submitted
- Example question: “Should students read both full-length and shorter texts?”
Answer: Yes!



The Next Generation Learning Standards for English Language Arts: Frequently Asked Questions

This document was last updated on October 17, 2018. The Office of Curriculum and Instruction will continually update. If you have a question that is not currently answered, please contact us at EMSCURRIC@nysed.gov, including the subject line ELA Standards Question.

1. Who designed the Next Generation Learning Standards and why?

In 2015, following a New York State legislative requirement that the P-12 Common Core Standards Learning Standards (2011) be reviewed with stakeholder input, the New York Common Core Task Force—charged with reviewing the Standards and making recommendations for improving the various components relating to the standards—issued its [Final Report](#). Among the suggestions were the gathering of input for new standards from local districts, educators, and parents through an open and transparent process, as well as ensuring the standards meet the needs of English language learners and students with disabilities.

The Next Generation ELA Learning Standards are the culmination of a collaborative two-year process that resulted in substantive changes while maintaining rigor. The [review committees](#) included educators and parents from around New York State. After reviewing more than 4,100 public comments from a fall 2016 survey, as well as comments from experts, the committees incorporated this feedback into the revised learning standards. ELA and Math Learning Standards Advisory Committees met through a series of all-day, in-person meetings, as well as web meetings. They reviewed every learning standard, making any necessary modifications



WRITE ON, NY!

- Initiative to support writing across New York State
- Audience includes educators and students, as well as parents and community members
- Plan to develop resources specific to content areas and to support the Next Generation Standards
- Includes partners in the field, including BOCES, Empire State Writing Project, NYS English Council, and others

ABOUT CONTENT AREAS RESOURCES RESEARCH

Write on, NY!



an initiative to support writing in all subject areas

Guiding Principles

We are all writers. As writers, we:

- are students, educators, and family and community members
- represent all ages, cultures, languages, abilities, interests, and life experiences
- communicate ideas and information, develop thinking and voice, explore questions, and build knowledge and understanding
- write frequently and for a variety of purposes and audiences
- use and blend a variety of languages, genres, and forms (including pictures, drawings, symbols, graphics, etc.)
- use varied modes of writing to participate in our evolving digital and global world
- use writing to develop literacy, oral language, and identity
- understand that writing is a recursive, evolving process that improves through reflection, revision, and experimentation
- thrive in welcoming, inclusive communities that encourage communication, creativity, collaboration, frequent writing, sharing of ideas, and publishing



Teachers



Family/Community



Students

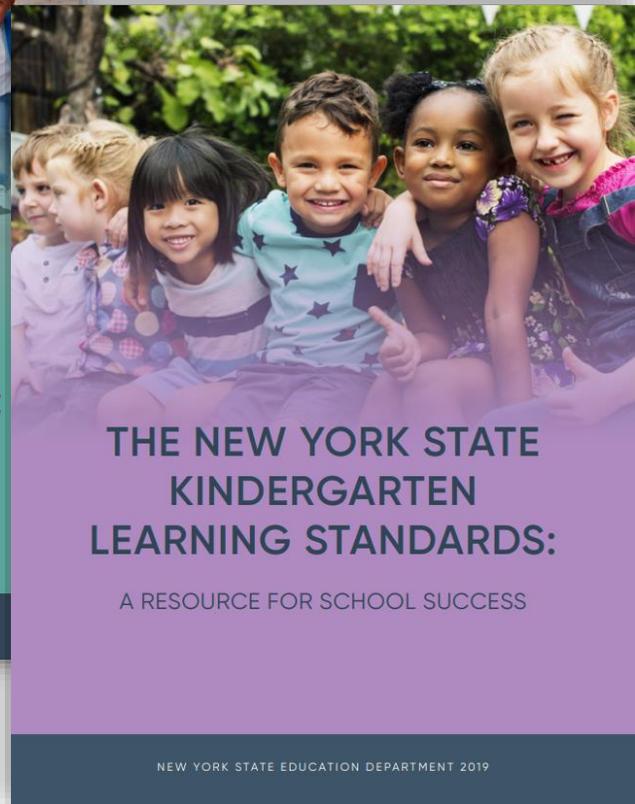
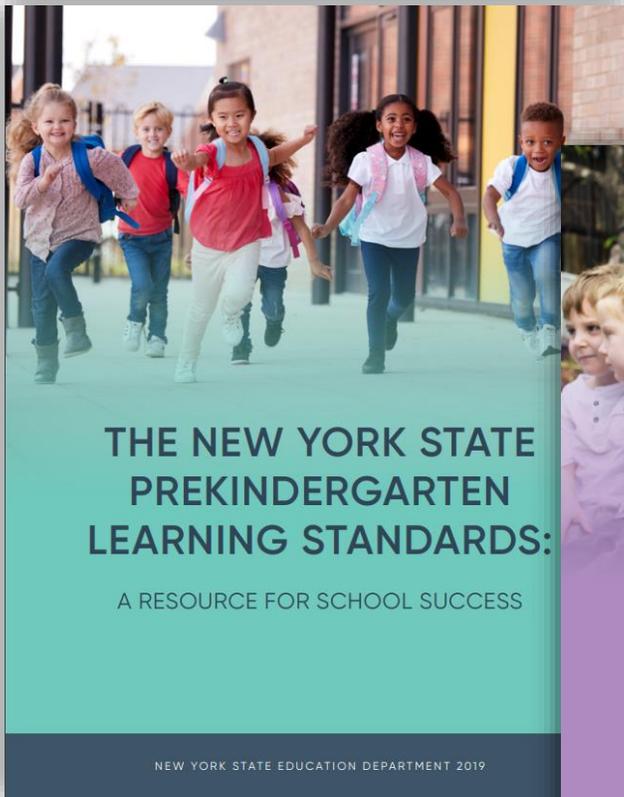


Curriculum/Coaches



Building & District Leaders

PREKINDERGARTEN / KINDERGARTEN STANDARDS RESOURCE



- Consolidate all learning standards for PK / K students into one document
- Include:
 - Introductory Material
 - Purpose and guiding principles
 - Meeting the needs of students with disabilities and multilingual learners
 - Understanding kindergarten as a unique level
 - Key terms and concepts
 - The Resource
 - Explanation of the organizational structure
 - Standards organized by key domains for learning
 - Model Interdisciplinary Unit of Study (PK)
 - Unit Planning Template (K)
- PK currently available at <http://www.p12.nysed.gov/earlylearning/standards/>
- K coming soon!

EARLY LEARNING VIDEO SERIES (OFFICE OF EARLY LEARNING)



- Includes 6 videos focused on classroom environment and the instructional cycle
 - A Look at Quality Learning Environments
 - [Prekindergarten](#)
 - [Kindergarten](#)
 - [1st and 2nd Grade](#)
 - The Instructional Cycle: Standards, Curriculum, Instruction, and Assessment
 - [Prekindergarten](#)
 - [Kindergarten](#)
 - [1st and 2nd Grade](#)