



HIGHLIGHTS OF THE COMMON CORE STATE STANDARDS FOR MATHEMATICS

The Common Core State Standards (CCSS) define what students should understand and be able to do in the study of mathematics. Students who master the CCSS for mathematics will be prepared for college-level courses and possess the skills necessary for success in today's workforce.

The CCSS include a focused and coherent set of standards that provide students the opportunity to achieve proficiency in key topics that are introduced in early grades and built upon in successive years. By focusing on central concepts necessary for the study of more advanced mathematics in later years, students gain greater depth of understanding.

The kindergarten through grade eight standards are grouped by grade level and are organized into domains that vary slightly by grade. The high school standards are organized into conceptual categories. High school mathematics courses should be developed using standards from those categories. High school mathematics courses should be developed using standards from those categories. One such course that can be offered in eighth grade or in high school, Algebra I, is included in the CCSS. In addition, the CCSS include standards for advanced courses including Calculus and Advanced Placement Probability and Statistics; standards that are intended to prepare students for such advanced coursework in high school are highlighted with a plus (+) symbol. The standards also contain integrated *Standards for Mathematical Practice* that describe a set of skills and processes that all students should develop as part of their study of mathematics.

Kindergarten through Grade Eight Grade-Level Standards: Domains

Counting and Cardinality (CC), Operations and Algebraic Thinking (OA), Number and Operations in Base Ten (NBT), Number and Operations – Fractions (NF), Ratios and Proportional Relationships (RP), The Number System (NS), Measurement and Data (MD), Expressions and Equations (EE), Functions (F), Geometry (G), and Statistics and Probability (SP).

High School Standards: Conceptual Categories

Number and Quantity (N), Algebra (A), Functions (F), Modeling (*), Geometry (G), and Statistics and Probability (S).



THE COMMON CORE STATE STANDARDS FOR MATHEMATICS

Focus on arithmetic and fluency with whole numbers at early grades

The kindergarten through grade five standards provide students with a solid foundation in whole numbers arithmetic (addition, subtraction, multiplication and division), fractions, and decimals. Mastery of these skills prepares students for learning more advanced concepts and procedures in later grades. The CCSS provide students with time to master topics by developing procedural fluency as well as conceptual understanding. Students who achieve fluency with essential math facts involving whole numbers will be better able to focus on more complex skills and algorithms. A representative sample of standards includes:

- **K.OA.2** – Solve addition and subtraction word problems, and add and subtract within 10, e.g., by using objects or drawings to represent the problem.
- **2.NBT.7** – Add and subtract within 1000, using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship between addition and subtraction; relate the strategy to a written method. Understand that in adding or subtracting three-digit numbers, one adds or subtracts hundreds and hundreds, tens and tens, ones and ones; and sometimes it is necessary to compose or decompose tens or hundreds.

- **3.OA.7** – Fluently multiply and divide within 100, using strategies such as the relationship between multiplication and division (e.g. knowing that $8 \times 5 = 40$, one knows $40 \div 5 = 8$) or properties of operations. By the end of grade 3, know from memory all products of two one-digit numbers.
- **4.NBT.6** – Find whole number quotients and remainders with up to four-digit dividends and one-digit divisors, using strategies based on place value, the properties of operations, and/or the relationship between multiplication and division. Illustrate and explain the calculation by using equations, rectangular arrays, and/or area models.

Fluency with fractions and decimals

Student mastery of conceptual and procedural knowledge about fractions is essential to success in algebra. In grade three, students begin to develop an understanding of fractions as numbers and represent fractions on a number line diagram. Addition and subtraction of fractions are introduced in grade four and multiplication and division in grade five. The standards for grades six and seven extend work with fractions and develop concepts such as rational numbers and proportional relationships. A representative sample of standards includes:

- **3.NF.2.a** – Represent a fraction $1/b$ on a number line diagram by defining the interval from 0 to 1 as the whole and partitioning it into b equal parts. Recognize that each part has size $1/b$ and that the endpoint of the part based at 0 locates the number $1/b$ on the number line.
- **4.NF.3.d** – Solve word problems involving addition and subtraction of fractions referring to the same whole and having like denominators, e.g., by using visual fraction models and equations to represent the problem.
- **5.NF.2** – Solve word problems involving addition and subtraction of fractions referring to the same whole, including cases of unlike denominators, e.g. by using visual fraction models or equations to represent the problem. Use benchmark fractions and number sense of fractions to estimate mentally and assess the reasonableness of answers. *For example, recognize an incorrect result $2/5 + 1/2 = 3/7$, by observing that $3/7 < 1/2$.*
- **5.NBT.7** – Add, subtract, multiply, and divide decimals to hundredths, using concrete models or drawings and strategies based on place value, properties of operations, and/or the relationship

between addition and subtraction; relate the strategy to a written method and explain the reasoning used.

- **7.NS.2.c** – Apply properties of operations as strategies to multiply and divide rational numbers.
- **7.RP.3** – Use proportional relationships to solve multi-step ratio and percent problems. *Examples: simple interest, tax, markups and markdowns, gratuities and commissions, fees, percent increase and decrease, percent error.*

Algebra readiness by grade eight and established grade eight standards

The CCSS are consistent with the goal that all students succeed in Algebra 1. Students who master the content and skills through grade seven will be well-prepared for algebra in grade eight. Recognizing that all students must continue their study of mathematics, the CCSS moves students forward with grade eight standards that prepare them for higher math, include Algebra 1.

Real world applications using modeling

Throughout the standards, students apply the mathematics they have learned to solve problems that arise in everyday life, society, and the workplace. The *Standards for Mathematical Practice* emphasize this skill and provide specific suggestions for modeling real-world situations using mathematics. The high school standards include modeling standards throughout the other conceptual categories; these standards are identified with a star (★) symbol. A representative sample of standards includes:

- **3.MD.8** – Solve real world and mathematical problems involving perimeters of polygons, including finding the perimeter given the side lengths, finding an unknown side length, and exhibiting rectangles with the same perimeter and different areas or with the same area and different perimeters.
- **F-IF.5** – Relate the domain of a function to its graph and, where applicable, to the quantitative relationship it describes. *For example, if the function $h(n)$ gives the number of person-hours it takes to assemble n engines in a factory, then the positive integers would be an appropriate domain for the function.*★
- **G-MG** – Apply geometric methods to solve design problems (e.g., designing an object or structure to satisfy physical constraints or minimize cost; working with typographic grid systems based on ratios).★
- **S-MD.5.b** – Evaluate and compare strategies on the basis of expected values. *For example, compare a high-deductible versus a low-deductible automobile insurance policy using various, but reasonable, chances of having a minor or a major accident.*



HIGHLIGHTS OF THE COMMON CORE STATE STANDARDS FOR ENGLISH-LANGUAGE ARTS AND LITERACY IN HISTORY/SOCIAL STUDIES, SCIENCE, AND TECHNICAL SUBJECTS

The Common Core State Standards for English–Language Arts and Literacy in History/Social Studies, Science, and Technical Subjects define what it means to be a literate person in the 21st century. Students who master the standards will be fluent readers, critical thinkers, informative writers, effective speakers, and engaged listeners. They also will use technology as a source of information and a means of communication.

The standards are divided into four strands: reading (Reading Literature–RL, Reading Informational Text–RI, Foundational Skills–RF), writing (W), speaking and listening (SL), and language (L). The standards are organized by grade level for kindergarten through grade eight and by grade span for high school.

The foundational skills standards for kindergarten through grade five foster students' understanding and knowledge of concepts of print, the alphabetic principle, and other basic conventions of the English language. Phonological awareness, phonics and word recognition, and fluency are the focus of these standards.

For grades six through twelve, the standards for literacy in history/social studies, science, and technical subjects provide additional specificity for the application of reading and writing skills to subject-area content. In lower grades, these skills are integrated into the reading and writing strands.



THE COMMON CORE STATE STANDARDS:

Balance reading literature with reading informational text

At each grade level (K-8) and grade span (9-12), the reading standards emphasize both literature and informational texts. Literature encompasses a broad range of cultures, periods, and genres (e.g., stories, folktales, fantasy, realistic fiction, drama, poetry). Informational texts include biographies and autobiographies; writings about history, social sciences, science, and the arts; technical texts (e.g., directions, maps, charts); and digital sources. The following standards illustrate the balance between literature and informational texts.

- Compare and contrast texts in different forms or genres (e.g., stories and poems; historical novels or fantasy stories) in terms of their approaches to similar themes and topics. (Grade 6, RL 9.)
- Compare and contrast one author's presentation of events with that of another (e.g., a memoir written by and a biography of the same person). (Grade 6, RI 9.)
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- Analyze a particular point of view or cultural experience reflected in a work of literature from outside the United States, drawing on a wide reading of world literature. (Grades 9-10, RL 6.)
- Determine an author's point of view or purpose in text in which the rhetoric is particularly effective, analyzing how style and content contribute to the power, persuasiveness, or beauty of the text. (Grades 11-12, RI 6.)

Balance narrative writing with informational, expository writing

Beginning in kindergarten, with children drawing, dictating, and writing, and continuing through high school, students write in different genres, building mastery in a range of skills and applications. Students write for different purposes and use technology to produce and publish their writing. The standards below exemplify the varied genres in which students write.

- Write opinion pieces in which they introduce the topic or name of a book they are writing about, state an

opinion, supply a reason for the opinion, and provide some sense of closure. (Grade 1, W 1.)

- Write informative/explanatory texts in which they name a topic, supply some facts about the topic, and provide some sense of closure. (Grade 1, W 2.)
- Write narratives in which they recount two or more appropriately sequenced events, include some details regarding what happened, use temporal words to signal event order, and provide sense of closure. (Grade 1 W 3.)

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- Write arguments to support claims with clear reasons and relevant evidence. (Grade 7, W 1.)
 - Write informative/explanatory texts to examine a topic or convey ideas, concepts, and information through the selection, organization, and analysis of relevant content. (Grade 7, W 2.)
 - Write narratives to develop real or imagined experiences or events using effective technique, relevant descriptive details, and well-structured event sequences. (Grade 7, W 3.)

Focus on critical analysis of both fiction and non-fiction

Students analyze text for the author's perspective and purpose, compare and contrast texts, and evaluate evidence used to support the thesis of the text. They use these skills in their own writing and speaking. The standards below are examples of how students apply analysis skills.

- Distinguish their own point of view from that of the narrator or those of the characters. (Grade 3, RL 6.)
- Trace and evaluate the argument and specific claims in a text, distinguishing claims that are supported by reasons and evidence from claims that are not. (Grade 6, RI 8.)
- Develop claim(s) and counterclaim(s) fairly and thoroughly, supplying the most relevant evidence for each while pointing out the strengths and limitations of both in a manner that anticipates the audience's knowledge level, concerns, values, and possible biases. (Grades 11-12, W 1.b.)

Emphasize vocabulary acquisition across the four strands of English-language arts

Vocabulary acquisition and practice are threaded throughout the four strands, reflecting current research on how students best learn new words. Students practice

using new vocabulary in their writing and collaborative conversations about grade-level topics and text. The standards below represent vocabulary standards found in each strand.

- Participate in collaborative conversations with diverse partners about grade 2 topics and texts with peers and adults in small and larger groups. (Grade 2, SL 1.)
- Demonstrate understanding of figurative language, word relationships, and nuances in word meanings. (Grade 5, L 5.)
- Use precise language and domain-specific vocabulary to inform about or explain the topic. (Grade 7, W 2.d.)
- Determine the meaning of word and phrase as they are used in the text, including figurative and connotative meanings; analyze the cumulative impact of specific word choices on meaning and tone (e.g., how the language evokes a sense of time and place; how it sets a formal or informal tone.) (Grades 9-10, RL 4.)

Foster oral communication, collaboration, and listening skills

Students learn to express ideas, work together, and listen carefully to integrate and evaluate information. Skills are not learned in isolation, but in connection with reading and analyzing grade-level texts and topics. Technology is used to gather and present information. The standards below convey the range of speaking and listening standards.

- Come to discussions prepared, having read or studied required material; explicitly draw on that preparation and other information about the topic to explore ideas under discussion. (Grade 3, SL 1.)
- Plan and deliver an opinion speech that: states an opinion, logically sequences evidence to support the speaker's position, uses transition words to effectively link opinions and consequences (e.g., consequently and therefore), and provides a concluding statement related to the speaker's position. (Grade 5, SL 4.a.)
- Follow rules for collegial discussions and decision-making, track progress toward specific goals and deadlines, and define individual roles as needed. (Grade 8, SL 1.b)
- Make strategic use of digital media (e.g., textual, graphical, audio, visual, and interactive elements) in presentations to enhance understanding of findings, reasoning, and evidence and to add interest. (Grades 9-10 and 11-12, SL 5.)



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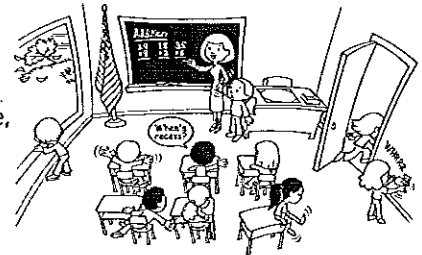


What is the Meaning of a Core Curriculum vs. Common Core?

by Becky L. Spivey, M.Ed.

What is a core curriculum?

In a public school setting, a core curriculum is a set of educational goals, explicitly taught (and not taught), focused on making sure that all students involved learn certain material tied to a specific age or grade level. The design of a core curriculum includes things that do not have much relevance to a homeschooler: grade levels, learning divided into discrete subjects (math, science, history, etc.), testing goals, and classroom management needs. We think of curriculum as *formal* instruction using materials (textbooks) that support the instructional agenda of a school. This instructional agenda includes directions designed and reviewed by administrators, curriculum directors, and teachers.



There are many definitions of curriculum, depending upon whom you ask to define it. In the research conducted for this handout, I found my favorite definition. Stated anonymously it read, *"The curriculum is the entire life of a school child."* Enough said.

In detail, a core curriculum encompasses:

- The content and sequence of subjects taught and assessed (according to performance objectives) using a variety of materials.
- Anything and everything students participate in that includes or teaches a lesson (Housewise-Streetwise, Just Say No, Red Ribbon Week, Jump Rope for Heart, etc.)
- Everything that goes on within a school including extra-curricular activities, guidance, and interpersonal relationships.
- Everything *implied* by a school's organization: room/seating arrangements, time management, raising your hand to speak, behavioral expectations for students, student competition for academic/social awards (Honor Roll, Student of the Month, etc.), adhering to a routine or schedule, etc.
- Everything and anything planned by school personnel – festivals, prom, homecoming, etc.
- Everything experienced by the learners in the school.

A core curriculum has layers and is very eclectic. Just like students, no two curricula are the same. Each school has regional, societal, and financial differences, even within their own district. Students in affluent areas, as well as financially challenged ones, learn content from their teachers as well as conduct and attitude. They learn important social and emotional lessons from everyone involved in their school from the principal and school nurse, to the cafeteria and custodial staff, to parent volunteers, down to their own peers. Many educators and associated personnel are sometimes unaware of the strong lessons they impart on their students through everyday contact.

What is the difference between a core curriculum and a Common Core Curriculum?

A school's core curriculum, for all intent and purposes, includes everything taught in the classroom (explicitly, and indirectly) using textbooks and other materials for support. Public schools have state standards that teachers must address within their instruction and assess after students have opportunities to learn. Within these learning opportunities, students demonstrate what they know.

The nation's governors and education commissioners through their representative organizations, the National Governor's Association (NGA) and the Council of Chief State School Officers (CCSSO), led the development of the *Common Core State Standards* and continue to lead the initiative. Teachers, parents, school administrators and experts from across the country, together with state leaders, provided input into developing these standards.

"The Common Core State Standards provide a consistent, clear understanding of what students are expected to learn, so teachers and parents know what they need to do to help them. The standards are designed to be robust and relevant to the real world, reflecting the knowledge and skills that our young people need for success in college and careers. With American students fully prepared for the future, our communities will be best positioned to compete successfully in the global economy." Taken from <http://www.corestandards.org/>

Released in 2010, the *Common Core State Standards* presents rigorous grade-level expectations in the areas of math and English language arts and identify the knowledge and skills students need in order to be successful in college and in future careers. These standards will help ensure that students across the U.S. have similar academic skills and create a level playing field for future job prospects. As mentioned before, schools can be very different in their curriculum focus; their differences have allowed some students to be more prepared in some skills because a certain skill may have been a focus within that particular school – without the school even realizing it.

A "Common Core" curriculum – a curriculum shared by all schools having adopted it – will bind school professionals across the nation together in working toward the same goals. Everyone will work in concert. Teachers will no longer have to guess what will be on student assessments; if they teach the Common Core Standards, the students will be prepared.

Students changing schools will not lose valuable time "catching up" and others will not have to wait for new students to catch up to their class. Different teachers may have different styles or lesson plans throughout the US, but the core content and skills in the Common Core are the same.

As of this writing, five states still have not adopted the Common Core Standards, alone or in addition to their state standards. Along with the praise and thanksgiving for the Common Core Standards, some educators still have misconceptions, misunderstandings, and misgivings about such a rigorous and aggressive move. Only time will tell.

Resources

Field Guide to Learning. February 28, 2011). *What is a core curriculum? Should we be following one?* Retrieved May, 2013, from <http://fieldguidetolearning.wordpress.com/2011/02/28/what-is-a-core-curriculum-should-we-be-following-one/>

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Helpful Products

The list of Super Duper® products below may be helpful when working with children who have special needs. Visit www.superduperinc.com and type in the item name or number in our search engine. Click the links below to see the product descriptions.

Webber Core Curriculum Apps
<http://www.superduperinc.com/apps/apple.aspx>

Webber Core Curriculum Vocabulary Cards
Item# CRD-42

Webber Core Curriculum Vocabulary Worksheets
Item# BKCRD-42

500 Prefixes, Suffixes, and Stems
Item# BK-364

Language Lab
Item# LANG-22

Triple Talk
Item# CRD-62

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GRADES: KINDERGARTEN-HIGH SCHOOL

Parents' Guide to Student Success

THIS GUIDE INCLUDES

- An overview of some of the key things your child will learn in English/Literacy and Math in Kindergarten through High School
- Ideas for activities to help your child learn at home
- Topics of discussion for talking to your child's teacher about his or her academic progress

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of kindergarten in mathematics and English language arts/literacy. This guide is based on the new Common Core State Standards, which have been adopted by more than 45 states. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 1st grade.

KINDERGARTEN

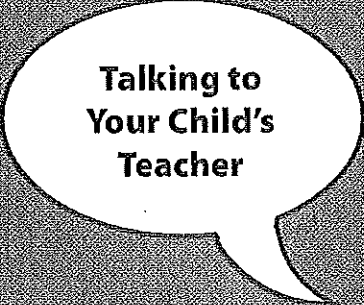
Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in Kindergarten

- Naming upper-and lower-case letters, matching those letters with their sounds, and printing them
- Comparing the adventures and experiences of characters in familiar stories, such as fairy tales and folktales
- Retelling familiar stories and talking about stories read to them using details from the text
- Using a combination of drawing, dictating, and writing to describe an event, including his or her reaction to what happened
- Stating an opinion or preference about a topic or book in writing (e.g., *My favorite book is...*)
- Taking part in classroom conversations and following rules for discussions (e.g., learning to listen to others and taking turns when speaking)
- Speaking clearly to express thoughts, feelings, and ideas, including descriptions of familiar people, places, things, and events
- Asking and answering questions about key details in stories or other information read aloud
- Understanding and using question words (e.g., *who, what, where, when, why, how*) in discussions
- Learning to recognize, spell, and properly use those little grammatical words that hold the language together (e.g., *a, the, to, of, from, I, is, are*)



Talking to Your Child's Teacher

Keeping the conversation focused.

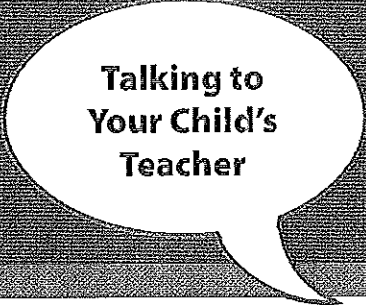
When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In kindergarten, these include:

- Using knowledge of letters and letter-sound correspondences to figure out how to spell words as they sound
- Reading and understanding a story designed for early readers
- Ask to see a sample of your child's work. Ask the teacher questions such as: Is this piece of work satisfactory? How could it be better? Is my child on track? How can I help my child improve or excel in this area? If my child needs extra support or wants to learn more about a subject, are there resources to help his or her learning outside the classroom?

Mathematics

A Sample of What Your Child Will Be Working on in Kindergarten

- Counting objects to tell how many there are
- Comparing two groups of objects to tell which group, if either, has more; comparing two written numbers to tell which is greater
- Acting out addition and subtraction word problems and drawing diagrams to represent them
- Adding with a sum of 10 or less; subtracting from a number 10 or less; and solving addition and subtraction word problems
- Adding and subtracting very small numbers quickly and accurately (e.g., $3 + 1$)
- Correctly naming shapes regardless of orientation or size (e.g., a square oriented as a “diamond” is still a square)



Talking to Your Child's Teacher

Keeping the conversation focused.

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In kindergarten, these include:

- Counting to tell the number of objects (this will not be written work; ask the teacher for his or her observations of your child's progress in this area)
- Solving addition and subtraction word problems

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Read with your child every day. Ask your child to explain his or her favorite parts of the story. Share your own ideas. To find more books for your child to read, visit www.corestandards.org/assets/Appendix_B.pdf
- Encourage your child to tell you about his or her day at school
- Have your child describe the picture to you

Mathematics

- Ask your child questions that require counting as many as 20 things. For example, ask, “Do many children have more than 20 books about wild animals?”
- Ask your child questions that require comparing numbers. “Who is wearing more bracelets, you or your sister?” (Your child might use matching or counting to find the answer)

For more information, the full standards are available at www.corestandards.org

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of 1st grade in mathematics and English language arts/literacy. This guide is based on the new Common Core State Standards, which have been adopted by more than 45 states. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 2nd grade.

1ST GRADE

Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in 1st Grade

- Using phonics (matching letters and sounds) and word analysis skills to figure out unfamiliar words when reading and writing
- Getting facts and information from different writings
- Writing about a topic, supplying some facts, and providing some sense of opening and closing
- Taking part in conversations about topics and texts being studied by responding to the comments of others and asking questions to clear up any confusion
- Producing and expanding complete simple and compound statements, questions, commands, and exclamations
- Identifying the correct meaning for a word with multiple meanings, based on the sentence or paragraph in which the word is used (e.g., deciding whether the word *bat* means a flying mammal or a club used in baseball)
- Learning to think about finer distinctions in the meanings of near-synonyms (e.g., *marching*, *prancing*, *strutting*, *strolling*, *walking*)

Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 1st grade, these include:

- Reading grade-level text with understanding and fluency
- Learning from, enjoying, and getting facts from books he or she reads and listens to

Mathematics

A Sample of What Your Child Will Be Working on in 1st Grade

- Solving addition and subtraction word problems in situations of adding to, taking from, putting together, taking apart, and comparing (e.g., a taking from situation would be: "Five apples were on the table. I ate some apples. Then there were three apples. How many apples did I eat?")
- Quickly and accurately adding with a sum of 10 or less, and quickly and accurately subtracting from a number 10 or less (e.g., $2 + 5$, $7 - 5$)
- Understanding what the digits mean in two-digit numbers (*place value*)
- Using understanding of place value to add and subtract (e.g., $38 + 5$, $29 + 20$, $64 + 27$, $80 - 50$)
- Measuring lengths of objects by using a shorter object as a unit of length
- Making composite shapes by joining shapes together, and dividing circles and rectangles into halves or fourths

Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 1st grade, these include:

- Adding with a sum of 20 or less and subtracting from a number 20 or less (this will not be written work; ask the teacher for his or her observations of your child's progress in this area)
- Using understanding of place value to add and subtract
- Solving addition and subtraction word problems

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Encourage your child to read to you books such as *Little Bear* by Else Holmelund Minarik. Help him or her sound out difficult words. To find more books for your child to read, visit www.corestandards.org/assets/Appendix_B.pdf
- Pick a "word of the day" each day starting with a different letter
- Have your child write the word and look for other things beginning with the same letter

Mathematics

Look for "word problems" in real life. Some 1st grade examples might include:

- If you open a new carton of a dozen eggs, and you use four eggs to cook dinner, close the carton and ask your child how many eggs are left
- Play the "I'm thinking of a number" game. For example, "I'm thinking of a number that makes 11 when added to 8. What is my number?"

For more information, the full standards are available at www.corestandards.org

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of 2nd grade in mathematics and English language arts/literacy. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 3rd grade.

2ND GRADE

Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in 2nd Grade

- Paying close attention to details, including illustrations and graphics, in stories and books to answer *who, what, where, when, why, and how* questions
- Determining the lesson or moral of stories, fables, and folktales
- Using text features (e.g., captions, bold print, indexes) to locate key facts or information efficiently
- Writing an opinion about a book he or she has read, using important details from the materials to support that opinion
- Writing stories that include a short sequence of events and include a clear beginning, middle, and end
- Taking part in conversations by linking his or her comments to the remarks of others and asking and answering questions to gather additional information or deepen understanding of the topic
- Retelling key information or ideas from media or books read aloud
- Producing, expanding, and rearranging sentences (e.g., "The boy watched the movie"; "The little boy watched the movie"; "The action movie was watched by the little boy")
- Determining the meaning of the new word formed when a known prefix or suffix is added to a known word (happy/unhappy; pain/painful/ainless)

Talking to Your Child's Teacher

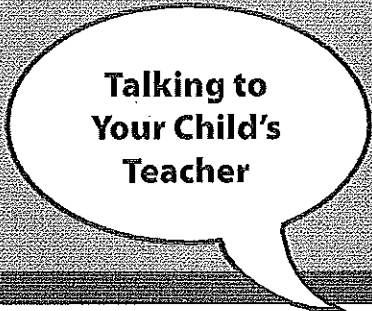
When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 2nd grade, these include:

- Reading grade-level books and stories with understanding and fluency
- Building a foundation of knowledge through reading and listening to books in history/social studies, science, and other subjects

Mathematics

A Sample of What Your Child Will Be Working on in 2nd Grade

- Solving challenging addition and subtraction word problems with one or two steps (e.g., a “one-step” problem would be: “Lucy has 23 fewer apples than Julie. Julie has 47 apples. How many apples does Lucy have?”)
- Quickly and accurately adding with a sum of 20 or less (e.g., $11 + 8$); quickly and accurately subtracting from a number 20 or less (e.g., $16 - 9$); and knowing all sums of one-digit numbers from memory by the end of the year
- Understanding what the digits mean in three-digit numbers (*place value*)
- Using understanding of place value to add and subtract three-digit numbers (e.g., $811 - 367$); adding and subtracting two-digit numbers quickly and accurately (e.g., $77 - 28$)
- Solving addition and subtraction word problems involving length (e.g., “The pen is 2 cm longer than the pencil. If the pencil is 7 cm long, how long is the pen?”)
- Building, drawing, and analyzing 2-D and 3-D shapes to develop foundations for area, volume, and geometry in later grades



Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 2nd grade, these include:

- Using understanding of place value to add and subtract
- Solving more challenging addition and subtraction word problems
- Measuring lengths and solving word problems involving addition and subtraction of lengths

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Read at home every day and assist your child by reading every other paragraph. To find recommendations of books for your child to read, visit www.corestandards.org/assets/Appendix_B.pdf
- Have your child write a thank you note or letter to family members or friends

Mathematics

Look for “word problems” in real life. Some 2nd grade examples might include:

- When saving for a purchase, compare the cost of the item to the amount of money you have; then ask your child to determine how much more money he or she needs to buy the item
- Play “draw the shape.” For example, ask your child to draw a hexagon with one side longer than the others, or ask him or her to shade in a quarter of a rectangle.

For more information, the full standards are available at www.corestandards.org

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of 3rd grade in mathematics and English language arts/literacy. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 4th grade.

3RD GRADE

Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in 3rd Grade

- Reading closely to find main ideas and supporting details in a story
- Describing the logical connection between particular sentences and paragraphs in stories (e.g., first, second, third; cause and effect)
- Comparing the most important points and key details presented in two books on the same topic
- Writing opinions or explanations that group related information and develop topics with facts and details
- Writing stories that establish a situation and include details and clear sequences of events that describe the actions, thoughts, and feelings of characters
- Independently conducting short research projects that build knowledge about various topics
- Asking and answering questions about information he or she hears from a speaker or while participating in classroom discussions, offering appropriate elaboration and detail that build on what others have said
- Reading stories and poems aloud fluently, without pausing to figure out what each word means
- Distinguishing the literal and nonliteral meanings of words, such as *something's fishy* and *cold shoulder*
- Spelling correctly and consulting dictionaries to clarify meanings of words

Talking to Your Child's Teacher

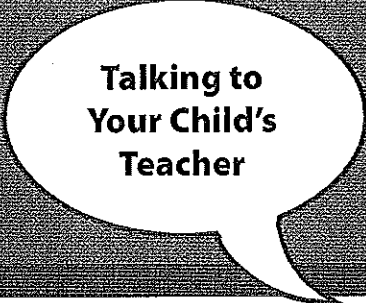
When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 3rd grade, these include:

- Reading grade-level books, stories, poems, and articles fluently
- Writing and speaking well, following rules of punctuation and grammar
- Reading grade-level books and stories with understanding and fluency
- Building a foundation of knowledge through reading and listening to books in history/social studies, science, and other subjects

Mathematics

A Sample of What Your Child Will Be Working on in 3rd Grade

- Multiplying and dividing up to 10×10 quickly and accurately, including knowing the times tables from memory
- Solving word problems using addition, subtraction, multiplication, and division
- Beginning to multiply numbers with more than one digit (e.g., multiplying 9×80)
- Understanding fractions and relating them to the familiar system of whole numbers (e.g., recognizing that $\frac{3}{1}$ and 3 are the same number)
- Measuring and estimating weights and liquid volumes, and solving word problems involving these quantities
- Reasoning about shapes (e.g., all squares are rectangles but not all rectangles are squares)
- Finding areas of shapes, and relating area to multiplication (e.g., why is the number of square feet for a 9-foot by 7-foot room given by the product 9×7 ?)



Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 3rd grade, these include:

- Multiplication and division
- Fractions

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Make reading for fun a part of your child's daily routine
- Encourage your child to find a picture from a newspaper or magazine, cut it out, paste it on paper, and write a story about it
- Start a family vocabulary box or jar. Have everyone write down new words they discover, add them to the box, and use the words in conversation

Mathematics

Look for "word problems" in real life. Some 3rd grade examples might include:

- Notice those everyday occasions when you find yourself using your times tables — such as to determine how many days there are in four weeks. Ask your child for the answer.
- Involve your child when you notice yourself using division to "work backward" in the times tables — such as determining how many candies each child will get if 36 candies are shared equally among nine children at a party

For more information, the full standards are available at www.corestandards.org

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of 4th grade in mathematics and English language arts/literacy. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 5th grade.

4TH GRADE

Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in 4th Grade

- Describing the basic elements of stories — such as characters, events, and settings — by drawing on specific details in the text
- Paying close attention to key features of informational books and articles: these include understanding the main and supporting ideas; being able to compare and contrast information; and explaining how the author uses facts, details, and evidence to support particular points
- Comparing ideas, characters, events, and settings in stories and myths from different cultures
- Writing summaries or opinions about topics supported with a set of well-organized facts, details, and examples
- Independently conducting short research projects on different aspects of a topic using evidence from books and the Internet
- Paraphrasing and responding to information presented in discussions, such as comparing and contrasting ideas and analyzing evidence that speakers use to support particular points
- Reporting orally on a topic or telling a story with enough facts and details
- Writing complete sentences with correct capitalization and spelling
- Relating words that are common in reading to words with similar meanings (*synonyms*) and to their opposites (*antonyms*)

Talking to Your Child's Teacher

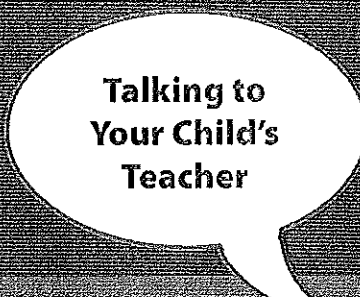
When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 4th grade, these include:

- Comprehending a range of grade-level stories, poems, and informational texts such as biographies, articles, or guidebooks about history, science, or the arts
- Building understanding of relationships between words and nuances in word meanings—*synonyms*, *antonyms*, *idioms*—and using this knowledge to convey ideas precisely

Mathematics

A Sample of What Your Child Will Be Working on in 4th Grade

- Using whole-number arithmetic to solve word problems, including problems with remainders and problems with measurements
- Adding and subtracting whole numbers quickly and accurately (numbers up to 1 million)
- Multiplying and dividing multi-digit numbers in simple cases (e.g., multiplying $1,638 \times 7$ or 24×17 , and dividing 6,966 by 6)
- Understanding and applying equivalent fractions (e.g., recognizing that $\frac{1}{4}$ is less than $\frac{3}{8}$ because 28 is less than 38)
- Adding, subtracting, and multiplying fractions in simple cases (such as $2\frac{3}{4} - 1\frac{1}{4}$ or $3 \times \frac{5}{8}$), and solving related word problems
- Understanding simple decimals in terms of fractions (e.g., rewriting 0.62 as $\frac{62}{100}$)
- Measuring angles and finding unknown angles in a diagram



Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 4th grade, these include:

- Doing arithmetic and solving word problems with multi-digit numbers
- Doing arithmetic and solving word problems with fractions

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Urge your child to use logical arguments to defend his or her opinion. If your child wants a raise in allowance, ask him or her to research commonsense allowance systems and, based on that research, explain reasons why, supported by facts and details
- Talk about the news together. Pick one story in the news, read it together, and discuss with your child what it means

Mathematics

- Ask your child to compare numbers using phrases like “times as much.” For example, if the family cat weighs 8 lbs. and the family dog weighs 56 lbs., how many times as much does the dog weigh?
- Ask your child to help you compare fractional amounts — for example, if one recipe calls for $\frac{2}{3}$ of a cup of oil, but another recipe calls for $\frac{3}{4}$ of a cup of oil, which recipe calls for more oil? (In 5th grade, your child will learn ways to determine just how much more oil)

For more information, the full standards are available at www.corestandards.org

Parents' Guide to Student Success

This guide provides an overview of what your child will learn by the end of 5th grade in mathematics and English language arts/literacy. If your child is meeting the expectations outlined in these standards, he or she will be well prepared for 6th grade.

5TH GRADE

Why Are Academic Standards Important?

Academic standards are important because they help ensure that all students, no matter where they live, are prepared for success in college and the workforce. Standards provide an important first step — a clear roadmap for learning for teachers, parents, and students. Having clearly defined goals helps families and teachers work together to ensure that students succeed. They also will help your child develop critical thinking skills that will prepare him or her for college and career.

English Language Arts & Literacy

A Sample of What Your Child Will Be Working on in 5th Grade

- Summarizing the key details of stories, dramas, poems, and nonfiction materials, including their themes or main ideas
- Identifying and judging evidence that supports particular ideas in an author's argument to change a reader's point of view
- Integrating information from several print and digital sources to answer questions and solve problems
- Writing opinions that offer reasoned arguments and provide facts and examples that are logically grouped to support the writer's point of view
- Writing stories, real or imaginary, that unfold naturally and developing the plot with dialogue, description, and effective pacing of the action
- Coming to classroom discussions prepared, then engaging fully and thoughtfully with others (e.g., contributing accurate, relevant information; elaborating on the remarks of others; synthesizing ideas)
- Reporting on a topic or presenting an opinion with his or her own words, a logical sequence of ideas, sufficient facts and details, and formal English when appropriate
- Expanding, combining, and reducing sentences to improve meaning, interest, and style of writing
- Building knowledge of academic words with an emphasis on those that signal a contrast in ideas or logical relationships, such as *on the other hand*, *similarly*, and *therefore*
- Producing writing on the computer

Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 5th grade, these include:

- Reading closely and drawing evidence from grade-level fiction and nonfiction materials, including the ability to quote accurately from them when answering questions
- Adjusting communications to accomplish a particular purpose (e.g., providing more background information for audiences who do not know the topic well)

Mathematics

A Sample of What Your Child Will Be Working on in 5th Grade

- Adding and subtracting fractions with unlike denominators (e.g., $2\frac{1}{4} - 1\frac{1}{3}$), and solving word problems of this kind
- Multiplying fractions; dividing fractions in simple cases; and solving related word problems (e.g., finding the area of a rectangle with fractional side lengths; determining how many $\frac{1}{3}$ -cup servings are in 2 cups of raisins; determining the size of a share if 9 people share a 50-pound sack of rice equally or if 3 people share $\frac{1}{2}$ pound of chocolate equally)
- Generalizing the place-value system to include decimals, and calculating with decimals to the hundredths place (two places after the decimal)
- Multiplying whole numbers quickly and accurately, for example $1,638 \times 753$, and dividing whole numbers in simple cases, such as dividing 6,971 by 63
- Understanding the concept of volume, and solving word problems that involve volume
- Graphing points in the coordinate plane (two dimensions) to solve problems
- Analyzing mathematical patterns and relationships

Talking to Your Child's Teacher

When you talk to the teacher, do not worry about covering everything. Instead, keep the conversation focused on the most important topics. In 5th grade, these include:

- Multiplying and dividing fractions, and solving related word problems
- Decimals (concepts and arithmetic)
- Volume (concepts and problem-solving)

Help Your Child Learn at Home

Try to create a quiet place for your child to study, and carve out time *every day* when your child can concentrate. You should also try to sit down with your child at least once a week for 15 to 30 minutes while he or she works on homework. This will keep you informed about what your child is working on, and it will help you be the first to know if your child needs help with specific topics. Additionally, here are some activities you can do with your child to support learning at home:

English Language Arts & Literacy

- Invite your child to read his or her writing out loud to other family members. Ask questions about your child's word choices and ideas
- Go to a play or musical with your child. Discuss the way the actors bring the words to life
- Discuss your family stories and history. Encourage your child to ask relatives questions about their lives. Put the information together in an album or brainstorm different ways to tell family tales, such as poems or short stories

Mathematics

Look for "word problems" in real life. Some 5th grade examples might include:

- Doing arithmetic with decimals, for example when balancing a checkbook
- Multiplying with fractions — for example, if you used about $\frac{2}{3}$ of a $\frac{3}{4}$ -cup measure of vegetable stock, then how much stock did you use? About how much is left?
- Using the length, width, and depth of a garden plot to determine how many bags of garden soil to buy

For more information, the full standards are available at www.corestandards.org

Introducing the Common Core to Parents and Community Members



COMMON CORE STATE STANDARDS



ENGLISH LANGUAGE ARTS



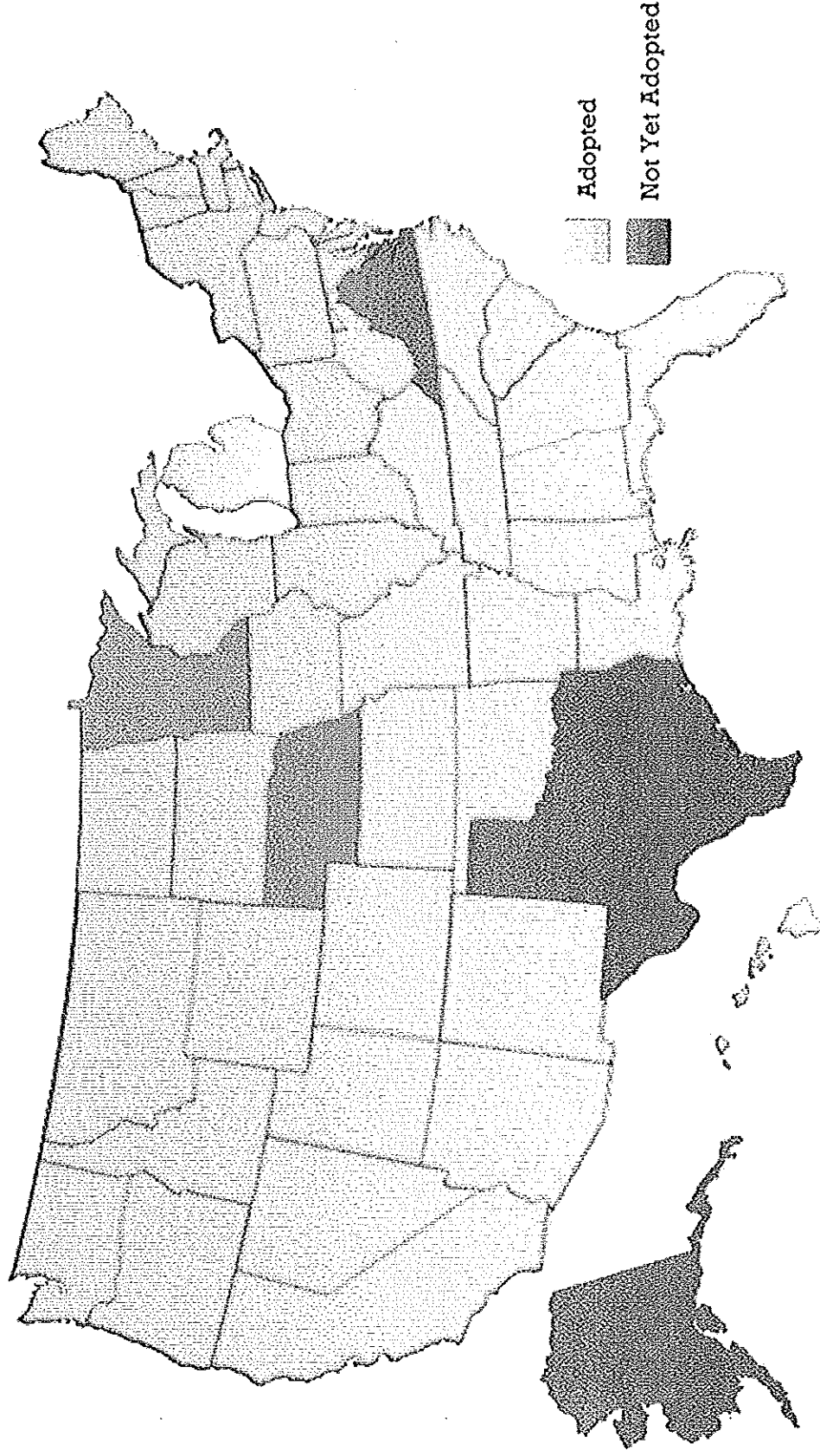
MATHEMATICS

Three-Minute Video Explaining the Common Core State Standards



<http://vimeo.com/51933492>

Common Core Across the Nation



What are the Common Core State Standards?

The Common Core State Standards set grade-by-grade learning expectations for students in grades K-12 for Mathematics and for English Language Arts and Literacy.

While states have had standards for more than 15 years, this set of standards is more focused on preparing students for success in college and career. They set clear, consistent and high learning goals.

Common Core: It Takes All of Us!

- Parents
- Community members
- Colleges and universities
- Technical training programs

What Should I Expect with CCSS?

More time to focus on preparing students for college and career readiness.

The Shifts in ELA/Literacy

1. **Building knowledge through content-rich nonfiction**
2. **Reading, writing and speaking grounded in evidence from text, both literary and informational**
3. **Regular practice with complex text and its academic language**

How can you help your child in literacy?

- Ask your child specific questions about what they read.
- Encourage children to read, then write and speak about, nonfiction text such as newspapers, magazines, and biographies.
- Encourage children to research topics of interest and read series that relate to a central topic.
- Have your child follow step by step instructions or a set of directions in order to accomplish a task, such as building a sandcastle or operating a game.

The Shifts in Mathematics

1. **Focus:** Focus strongly where the standards focus
2. **Coherence:** **Think** across grades, and **link** to major topics
3. **Rigor:** In major topics, pursue **conceptual understanding**, procedural skill and **fluency**, and application with equal intensity

How can you help your child in math?

- Help children practice their addition, subtraction, multiplication and division facts.
- Encourage children not to give up while solving problems, to build stamina and develop their critical thinking skills. Don't give them the answers - ask them to think of different ways they can solve problems.
- Have children illustrate the math they were thinking in their head and discuss it out loud.
- Have children apply their math knowledge to a real-world scenario at home, such as doubling a recipe or calculating the area of a room.

Additional Resources

Council of the Great City Schools Parent Roadmaps:

- Math
<http://www.cgcs.org//site/Default.aspx?PageID=244>
- ELA / Literacy
<http://www.cgcs.org/Page/328>
- National Parent Teachers Association (PTA)
<http://pta.org/parents/content.cfm?ItemNumber=2583>
- Achieve the Core
www.achievethecore.org
- Common Core State Standards Text Exemplars
<http://www.corestandards.org/assets/Appendix B.pdf>