Math

Textbook: Math Expressions by Houghton Mifflin

Math Expressions Common Core combines elements of standards-based instruction with the best traditional approaches. Through drawings, conceptual language, and real-world examples, it helps students make sense of mathematics. NSF-funded* and research-based, Math Expressions is proven to be effective in raising student achievement. It puts students on the path to becoming lifelong learners—and lovers—of all things math with our trusted Common Core math curriculum.

Math Expressions Common Core in your classroom

● Supports the CCSS by covering select concepts for deeper mastery

● Is NSF-funded, research-based, and proven to raise student achievement

● Offers new ways to teach and learn through exploration, modeling, and discussion

It teaches students how to think more logically and taps into higher-level thinking skills. It helps students understand place value and how and what the math concepts mean. Students use math journals for practice work and play math games to reinforce math skills in a fun and engaging way. Math Expressions is aligned with Common Core Standards.

Topics include:

● Fractions (equivalent, mixed numbers, improper, adding, subtracting, word problems, etc.

● Decimals (place values, relating fractions and decimals, adding, subtracting, rounding, estimating, graphing, word problems, etc.)

● Multiplication and Division (fractions, word problems, mixed numbers, etc.)

● Multiplication with Whole Numbers and Decimals

● Division with Whole Numbers and Decimals

● Operations and Word Problems

● Algebra, Patterns, and Coordinate Graphs

● Measurement and Geometry

Technology

Concepts and resources:

● Dell Chromebook: Every 5th grader is assigned one for use in daily lessons and activities.
● Typing.com: Keyboarding skill development.
● Interactive Whiteboard: used to enhance learning.
● IXL: A web-based K-12 math and ELA program integrated with problems based on Common Core State Standards, used to improve skills both inside and outside the classroom. Problems have a wide variety of question types.
● Coding programs: students learn the basics of coding.
● Spelling City, Khan Academy, Ten Marks, Google Docs, and Google Slideshows as well as other programs to enhance student learning.

Science

Program: Science Interactive Notebooks

Rather than a textbook approach to science vocabulary, hands-on activities to engage students with the mysteries of science and expose them to the joy of scientific inquiry at an early age. These lessons inspire kids to love science and make it more fun Lessons are aligned with Common Core and Next Generation Science Standards and designed to supplement existing curriculum.

Topics of study include:

● Matter
● Minerals
● Chemical Changes
● Gravity
● Animals' Food Chains

● Photosynthesis
● Stars and Earth
● Nitrogen Cycle
● Earth's Four Systems
● Earth's Interactions

Social Studies

5th graders explore themes through interactive notebooks, which are used as a guideline to cover topics more thoroughly. Students also use Chromebooks, interactive whiteboards, Chromebooks, and projects, to help with comprehension and make learning more hands-on and engaging.

Topics of study include:

● Native Americans
● Explorers
● Colonial America
● American Revolution
● Geography

Language Arts/Reading/Writing

Program: Schoolwide Fundamentals

Schoolwide Fundamentals Units of Study are designed to meet the instructional needs of literacy educators, with a particular focus on usability and effectiveness. Built using the workshop model, Schoolwide's units teach students to be critical thinkers, readers, and writers by using proven, research-based best practices for reading and writing instruction.

Created by teachers for teachers, these units are designed for ease of instruction, providing a clear framework and opportunities for differentiation. Units can be easily integrated with each other for seamless academic instruction. The units are also aligned with and deeply connected to the Common Core State Standards and other state standards, including the Partnership for Assessment of Readiness for College and Careers, and the Smarter Balanced Assessment Consortium, as well as Depth of Knowledge thinking strategies.

Implementation is easy with the menu of Professional Development opportunities, which are led by Schoolwide's highly qualified and experienced educational staff with K–12 expertise. Schoolwide also offers continued support of units with a suite of newly developed Digital Resources, Independent Reading Classroom Libraries, and Leveled Book Room Collections.

Common Elements of the Fundamentals Units of Study :
● Mentor and Short Shared Texts
● Standards-Based Alignment to the CCSS and Other State Standards
● Research-Based Best Practices
● Interactive Read-Aloud Lessons and Mini-Lessons
● Formative and Summative Assessments
● Digital Resources
● Customized Professional Development
● Integrated Curriculum: Reading/Writing/Grammar It's All About the Books: Mentor Texts
● Each Reading, Writing, and Grammar Fundamentals unit includes 5–10 rich, engaging, authentic literary and/or informational texts that span grade-level complexity bands. They include a wide variety of genres, authors, cultures, and content.
● Each unit also includes 3–13 short shared texts (e.g., articles, essays, poems, short stories, editorials, book reviews, primary source documents, etc.).

Criteria for Mentor Text Selection:
● Variety: varied genres and subgenres, text structures, authors, content, and cultures .
● Complexity: providing regular practice with grade-appropriate complex texts.
● Quantitative measures: word length or frequency, sentence length, and formula (Lexile, Accelerated Reader)
   ○ Qualitative measures: content analysis, levels of meaning and purpose, structure and style, language conventionality, and clarity.
   ○ Reader and task considerations: language, knowledge, experiences, and motivational factors.

In addition, 5th graders use leveled readers, organized by genres. Our classroom has about 200 books and growing. Many reading strategies are used in conjunction with these books: Summarizing, retelling, context clues, character analysis, genres, inferencing, connections, etc. 5th graders also do 3 novel studies throughout the year. 5th graders participate in Reading Theaters to bring stories and characters to life.

Spelling/Vocabulary

Students use graphic organizers and their individual Dell Chromebooks to look up definitions, identify parts of speech, synonyms, antonyms, and integrate those words in a sentence.

Resources:
● Vocabulary Spelling City: This program is used at both school and at home to complete various effective and engaging vocabulary and spelling activities to help them retain spelling and definitions.

● "Words Their Way" word sorts and lists to pull words from.

● Novels, read-aloud books and/or social studies/science texts.

Language Arts/Reading/Writing (continued)

Criteria for Mentor Text Selection:

● Variety: varied genres and subgenres, text structures, authors, content, and cultures
● Complexity: providing regular practice with grade-appropriate complex texts. The following are important criteria for determining complexity: Quantitative measures: word length or frequency, sentence length, and formula (Lexile, Accelerated Reader); Qualitative measures: content analysis, levels of meaning and purpose, structure and style, language conventionality, and clarity; Reader and task considerations: language, knowledge, experiences, and motivational factors.

Spelling:

Resources:

● Dell Chromebooks: Students use graphic organizers and their individual Chromebooks to look up definitions, identify parts of speech, synonyms, antonyms, and integrate those words in a sentence.

● Vocabulary Spelling City: Students use at school and at home to complete various effective and engaging vocabulary and spelling activities to help them retain spelling and definitions.

● "Words Their Way": Word sorts and lists to pull words from, as well from read-aloud book and/or social studies/science vocabulary terms.

Reading:

Resources: Leveled readers by Irene Fountas and Gay Su Pinnell

● These readers are in sections organized by genre. Our classroom library continues to grow, and now includes about 200 books that are used daily.

● Many reading strategies are used in conjunction with these books: Summarizing, retelling, context clues, character analysis, genres, inferencing, etc.

Reading Theaters to bring stories and characters to life.