

Fourth Grade Curriculum

Fourth Grade at Springhurst Elementary School is filled with many rich learning experiences. Students gain greater independence and life-long study skills. Subjects are semi-departmentalized so most students will have the opportunity to switch teachers. Enrichment activities in the arts, math, ecology, and student government are offered for students to take part in.

English Language Arts

We have adopted a new districtwide K-5 curriculum called Bookworms which will assist in providing the instruction that each of the students needs and deserves as they are actively reading, writing, listening, and speaking about complex ideas every day. A Bookworms classroom has three designated literacy blocks each day: Shared Reading, English Language Arts, and Differentiated Instruction.

- Within the *Shared Reading* block, children will partake in rereading activities and discussions to build students' ability to read fluently, build vocabulary, and to think critically about text.
- The *English Language Arts* block features a read-aloud to build language and vocabulary knowledge, build world knowledge, and improve students' inferential thinking. During this time, students participate in genre-based writing with embedded grammar instruction.
- In the *Differentiated Instruction* time, children work through cycles of teacher-led and student-driven activities addressing specific individual needs.

Another component of the Bookworms Reading and Writing day is a dedication to word study. **Word study** is a type of spelling instruction that is designed to help children link sound and pattern so that they can read and spell unknown words. Students in all grade levels have a daily designated time for word study instruction and time to practice the words across the week.

Math

IM Math™ (Illustrative Mathematics) is fully aligned to the focus, rigor, and coherence of the standards, and has been given the stamp of approval by EdReports, earning perfect scores in the areas of Focus & Coherence and Rigor & Mathematical Practices. The scope and sequence of units, activities and representations are designed to help students develop a deep understanding of mathematical concepts, build fluency with procedures and solve mathematical problems that reflect and connect to their lived experiences. A problem based curriculum, IM places a focus on student thinking and reasoning, mathematical discourse, and student collaboration.

Link to family website: [Illustrative Mathematics Website](#)

The topics that will be addressed this year include:

- Factors and Multiples
- Fraction Equivalence and Comparison
- Extending Operations to Fractions
- From Hundredths to Hundred-thousands
- Multiplicative Comparison and Measurement
- Multiplying and Dividing Multi-digit Numbers
- Angles and Angle Measurement
- Properties of Two-Dimensional Shapes
- Putting it All Together

Students are expected to have a quick recall of their multiplication facts (0-10) in 4th grade.

Science

The fourth grade science program includes units of study in various disciplines of science that are also connected to many reading, writing, and math experiences. Students will continue to work with the Science 21 program when learning science this year. The Science 21 units are as follows:

Unit 1 – Structure, Function, and Information Processing

This unit continues student investigations from 1st Grade into how animals can only see when light is present and reflects off objects. This reflected light is information that is processed by the brain to perceive an image. Students will also investigate plant and animal structures (both internal and external) that serve the species for growth, survival, behavior, and reproduction functions.

Unit 2 – Energy

Students will investigate how an object possesses more energy of motion when moving faster and predict the changes in energy when objects collide with one another. Students will be collecting evidence that energy is conserved as it is transferred and/or converted from one form to another. Students investigate these concepts by testing devices that convert energy from one form to another. Finally, students will use information to describe that energy and fuels are derived from natural resources that can be renewable or nonrenewable, and their uses can affect the environment.

Unit 3 – Waves: Waves and Information

Students will continue the investigations on the topic of waves from 1st Grade to describe patterns they observe using the terms amplitude and wavelength. Students will begin their understanding of information technologies by investigating how information can be transmitted over long distances without degrading.

Unit 4 – Earth’s System: Processes that Shape the Earth

Students will continue their investigations from Grade 2 and Grade 3, about how Earth systems are affected by weathering and erosion due to water, ice, wind, or vegetation. In addition, they will use patterns of rock formations and fossils in rock layers to explain changes to the Earth’s surface over time. Students will interpret information from maps to describe patterns of earthquakes and volcanoes to aid in their understanding of Earth changes over time. Finally, students will investigate various natural hazards, generate solutions to reduce the impact of natural hazards on humans, and compare solutions with other students.

Social Studies

The Springhurst Social Studies curriculum follows the New York State Social Studies Framework. In fourth grade we focus on the study of New York State, including its geography, regions, and its history. We study New York State's early inhabitants (Native Americans, Dutch, English, French) and their influences. Students will also learn about NYS during colonial times, and the American Revolution. We explore New York's role in the women's rights and slavery reform movements, as well as industrialization and expansion periods. Map skills are integrated as we look at a variety of maps with regard to New York State's history. Projects may be assigned periodically.

Springhurst Spanish FLES Program

The Spanish FLES curriculum for fourth grade is a sequential model in which all students receive instruction that are structured by units. Lessons have a duration of 15 minutes. Spanish FLES instruction is proficiency-oriented with a focus on meaningful communication rather than on grammatical structure. Students are encouraged first to understand and then to produce words in the target language. Using an immersion approach, similar to the way children learn their first language, students participate in language activities that are geared to their interest level and include experiences with cultural practices and integration of thematic content. These experiences emphasize listening, speaking, reading and comprehension in meaningful, communicative contents: social/cultural situations, games, songs, and rhymes in addition to experiences with arts, crafts, movement and total physical response (TPR).

Each lesson lays the foundation for the next one, and children gain confidence in listening and speaking in the target language. They also learn to read and write short sentences to complement their learning of the Spanish language.

Character Education

Developing caring, responsible, and respectful community members through education and active participation is one of our primary goals as elementary school educators. Parental and guardian support is key to the success of some of these programs and initiatives. In grade 4 some of the topics we discuss are recognizing, reporting and refusing bullying as well as bystander power, bystander responsibility, and cyber bullying. We utilize the "Second Step" curriculum in the classroom and incorporate multiple read alouds throughout the year that focus on community altruism and celebrating differences.

Homework

Instead of traditional homework, we encourage families to engage in reading together, discussing the themes and characters, and sharing personal reflections about the texts. The type of text chosen does not matter. Students can choose magazines, books, newspapers, blogs, informative texts, or fiction texts. All of these provide an opportunity for children to build vocabulary, world knowledge, and understanding of text structures. You can also talk to your child about the books they are reading in class to where you will likely find them willing to share much about the road to becoming a bookworm this year. Also in line with Bookworms' philosophy around homework, they do not suggest sending spelling lists home, as the goal is to move away from rote memorization and to help students develop a strong understanding of spelling conventions and concepts.

Math homework will be given Monday through Thursday. The purpose of these assignments is simply the practice of concepts that the child is working on. Please set aside a quiet time and place for homework. Allow your child to work independently as much as possible. Your interest in your child's work is a very important component in the beginning development of good work habits and a positive attitude.

Communications

Throughout the year, we will be observing your child's growth and development so that we can support their individual needs. We are always available to discuss any thoughts, questions, or concerns you may have. You can reach out to us by telephone, via email, or handwritten note.

Please note that all dismissal information is handled through the School Dismissal Manager. It is important for you to make any changes to your child's dismissal prior to the cut-off time. Please be sure to update as necessary.

We look forward to a wonderful year with your child! Thank you!