Livonia Public Schools

FIFTH GRADE ESSENTIAL CONTENT

Parent Guide

Our curriculum is designed to provide on-going learning experiences which enable students to achieve these outcomes upon graduation:

- Acquire a core of understandings and competencies within the content areas
- Respect self, others and the environment
- Use critical and creative thinking to make decisions and solve problems
- Know how to learn and work productively
- Work and participate independently and cooperatively
- Acquire and process information
- Communicate effectively

K-6 LIVING AND LEARNING

Acquiring and Using Information
Acquire information from a variety of sources.
Develop and use basic thinking skills.
Use critical and creative thinking to make decisions and solve problems.
Apply metacognitive skills to all thinking processes.

Personal Management/Ethics
Work productively to achieve learning.
Develop a positive attitude toward learning and work.
Demonstrate a commitment to personal and societal ethics.

Social Interaction
Communicate effectively to assist in group tasks.
Identify with the group.

ART
Apply skills and knowledge to perform in the arts.
Apply skills and knowledge to create in the arts.
Describe, analyze, interpret, and evaluate works of art.
Understand, analyze, and describe works of art in their historical, social and cultural contexts.
Recognize, analyze, and describe connections among the arts; between visual art and classroom curriculum; between visual art and everyday life.
Reflect upon and assess the characteristics of student’s own processes and the merit of their art work and art work of others.
Enhance their use of technology as a tool to create art.

HEALTH
Demonstrate knowledge of nutrition: essential nutrients, healthy snacks, make good food choices.
Demonstrate understanding of exercise and fitness: fitness skills, types of exercise, benefits of physical fitness.
Develop an awareness of drugs: prescription drugs; know how to say NO to drugs; effects of alcohol on physical, mental, and social health; harmful effects of tobacco.
Understand the mental, emotional, social, and physical changes that occur during puberty and how individuals develop at different rates.
Understand functions of male reproductive system and functions of female reproductive system.
Describe the changes in the Reproductive System during puberty and care of the Reproductive System.
Describe the harmful impact of harassing behaviors to both the perpetrator and the victim.

LITERACY
Quote accurately from the text when explaining and drawing inferences.
Determine a theme or central idea and summarize text.
Identify main idea and explain how it is supported by key details.
Compare and contrast two or more characters, settings or events drawing on specific details.
Compare and contrast the overall structure of the text between two or more texts.
Integrate information gained from more than one text.
Read grade level appropriate texts with purpose and understanding.
Know and apply grade-level phonics to decode words.
Read with sufficient accuracy and fluency to support comprehension.
Determine the meaning of unknown words.  
Produce opinion, informational, and narrative writing pieces.  
Conduct short research and writing projects using several sources of information.  
Use grade-appropriate spelling and conventions in writing.  
Read and write routinely across the curriculum.  
Come to discussions prepared, following agreed upon rules for discussion and building on others’ talk.  
Report on a topic orally, sequencing ideas logically.  
Use formal English when appropriate to task.  
Type a minimum of 2 pages in a single sitting.

## LMC SKILLS

### Standard 1: Access information efficiently and effectively to inquire, think critically, and gain knowledge
- Recognize the need for information  
- Formulate questions based on information needs  
- Identify various potential sources of information  
- Develop and use successful strategies for locating information  
- Seek information from diverse sources

### Standard 2: Evaluate information critically and competently
- Determine accuracy, relevance, and comprehensiveness of information  
- Distinguish among fact, point of view, and opinion  
- Identify inaccurate and misleading information  
- Select information appropriate to the problem or question

### Standard 3: Use information accurately, creatively, and ethically to share knowledge and to participate collaboratively and productively as a member of a democratic society
- Organize information for practical application  
- Integrate new information into own schema  
- Produce and communicate information and ideas in appropriate formats  
- Uses problem-solving techniques to devise strategies for improving process or product  
- Practice ethical behavior when using print and digital resources (including freedom of speech, intellectual freedom, copyright, and plagiarism)

### Standard 4: Appreciate literature and other creative expressions of thoughts and ideas and pursue knowledge related to personal interests and aesthetic growth
- Cultivate a love of reading and become a self-motivated reader  
- Develop a knowledge of genres and literary elements  
- Derive meaning from informational texts in various formats

### Standard 5: Understand and practice Internet safety when using any electronic media for educational, social, or recreational purposes
- Practice strategies that promote personal safety and protect online and offline reputation  
- Recognize that networked environments are public places governed by codes of ethical behavior  
- Practice positive digital citizenship  
- Distinguish website authority, validity, and purpose  
- Understand the need for protecting personal privacy when using public access to digital sources  
- Protect personal information and electronic devices in an online environment

## MATHEMATICS

Use parentheses and brackets in expressions.  
Write expressions I hear using mathematic symbols and the order of operations.  
Use numerical rules and patterns to form ordered pairs.  
Graph the ordered pairs on a coordinate plane.  
Understand and explain the value of digits.  
Explain patterns when multiplying a number by powers of 10.  
Explain patterns when a decimal is multiplied or divided by a power of 10.  
Read, write, and compare decimals to thousandths.  
Use place value understanding to round decimals to any place.  
Multiply multi-digit whole numbers.  
Divide four-digit dividends by two-digit divisors.  
Illustrate and explain a division problem using equations, arrays and/or models.  
Add, subtract, multiply, and divide decimals to hundredths.  
Use concrete models or drawings to explain the method used.  
Add and subtract fractions with unlike denominators and mixed numbers.  
Solve word problems that involve fractions.  
Understand that fractions are really the division of a numerator by the denominator.  
Solve word problems where I divide whole numbers to create an answer that is a mixed number.  
Multiply a fraction or whole number by a fraction.  
Think of multiplication as the scaling of a number (similar to a scale on a map).  
Solve real world problems by multiplying fractions and mixed numbers.  
Divide fractions by whole numbers and whole numbers by fractions.  
Convert measurements within the same measuring system.  
Make a line plot to display data sets of measurements in fractions.  
Use fraction operations to solve problems involving information presented on a line plot.  
Understand volume.  
Measure volume by counting unit cubes.  
Solve real world problems involving volume.
Find the volume of an object using the formulas \( V = l \times w \times h \) and \( V = b \times h \).

Measure volume by counting unit cubes.

Solve real-world problems involving volume.

Understand how to graph ordered pairs on a coordinate plane.

Graph and interpret points in the first quadrant of a coordinate plane.

Classify shapes into categories.

Classify shapes based on properties.

Standards for Mathematical Practice

1. **Make sense of problems and persevere in solving them.**
   - When presented with a problem, I can make a plan, carry out my plan, and check its success.

2. **Reason abstractly and quantitatively.**
   - I can use numbers, words, and reasoning habits to help me make sense of problems.

3. **Construct viable arguments and critique the reason of others.**
   - I can make logical arguments and respond to the mathematical thinking of others.

4. **Model with Mathematics.**
   - I can recognize math in everyday life and use math I know to solve problems.

5. **Use appropriate tools strategically.**
   - I can use certain tools to help me explore and deepen my math understanding.

6. **Attend to precision.**
   - I can be precise when solving problems and clear when communicating my ideas.

7. **Look for and make use of structure.**
   - I can see and understand how numbers and shapes are organized and put together as parts and wholes.

8. **Look for and express regularity in repeated reasoning.**
   - I can notice when calculations are repeated. Then I can find more general methods and short cuts.

**MUSIC**

Demonstrate basic breathing techniques and posture.

Demonstrate Solfege note reading.

Demonstrate basic note reading skills.

Sing in unison for pitch matching.

Sing unison melodies with bass lines.

Sing call response, rounds and partner songs.

Demonstrate proper performance etiquette.

Explore instruments of the band and orchestra.

Explore music through composition and improvisation.

Units of instruction will include: Music of Today, Music Appreciation/History, Introduction to Families of Instruments and Jazz.

**PHYSICAL EDUCATION**

Demonstrate competence in selected object control skills: catching, overhand throw, hand dribble, foot dribble, underhand strike, batting, forehand strike, two-hand passing, overhead pass.

Demonstrate competence in selected body management skills: standing posture, vertical jump and landing.

Demonstrate growth and development in selected indicators of physical fitness.

Demonstrate knowledge of proper safety procedures.

Develop personal-social skills appropriate for sports-related activities and games: positive self-concept, self-discipline, fair play, respect for property and individuals, leadership, attentiveness, cooperation.

Demonstrate competence in selected sports and games for life-long physical activities: soccer, racquet sports, basketball, softball, volleyball and football.

**SCIENCE**

Apply understanding of science through reading, writing and technology.

Understand organism's characteristics, systems and survival.

Understand motion.

Understand the motions of objects in the sky.

Science and Engineering Practices

1. **Asking Questions and Defining Problems**
   - I can wonder about the world and write it as a question.

2. **Developing and Using Models**
   - I can create ways to model real-world situations.

3. **Planning and Carrying Out Investigations**
   - I can plan and carry out investigations.

4. **Analyzing and Interpreting Data**
   - I can understand and explain what data means.

5. **Use Mathematics and Computational Thinking**
   - I can use math strategies to explain my thinking.

6. **Constructing Explanations and Designing Solutions**
   - I can come up with solutions and explain why.

7. **Engaging in Argument from Evidence**
   - I can use proof to support my findings.

8. **Obtaining, Evaluating and Communicating Information**
   - I can collect, understand, and show my information.
SOCIAL STUDIES
Understand and develop a chronological sequence of major developments and events of early U.S. History from the Meeting of Three Worlds through U.S. Expansion.
Understand differing viewpoints and apply key concepts to evaluate key decisions and issues in early U.S. History and contemporary events.
Understand geographic patterns, causes and effects (Five Themes of Geography) in the development of the U.S.
Understand the principles and ideas expressed in the Declaration of Independence, Constitution, and Bill of Rights.
Apply understanding of civic principles to their own lives, U.S. History and contemporary events.
Understand the basic purpose, structure, organization and roles of local, state and federal government.
Apply understanding of basic economic principles and concepts to their own lives and the development of the U.S.
Locate, use and organize information from a variety of sources to address topics and questions regarding U.S. History, current events and their own lives.
Analyze and respond to questions and issues in U.S. History, current events and their own lives.
Participate and act constructively and ethically in the classroom, school and community.

TECHNOLOGY
Creativity and Innovation: Students demonstrate creative thinking, construct knowledge, and develop innovative products and processes using technology.
Communication and Collaboration: Students use digital media and environments to communicate and work collaboratively, including at a distance, to support individual learning and contribute to the learning of others.
Research and Information Fluency: Students apply digital tools to gather, evaluate, and use information.
Critical Thinking, Problem Solving, and Decision Making: Students use critical thinking skills to plan and conduct research, manage projects, solve problems, and make informed decisions using appropriate digital tools and resources.
Digital Citizenship: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior.
Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems, and operations.