

NEW PROVIDENCE SCHOOL DISTRICT PROGRAM OF STUDIES ~ SIXTH GRADE

INTEGRATED LANGUAGE ARTS

The sixth grade language arts program follows a balanced literacy framework that aligns with the New Jersey Student Learning Standards and assessments. It contains all components necessary to develop lifelong literacy. These components include word study, Reader's Workshop, and Writer's Workshop.

Word study at the upper level focuses on morpheme analysis and word meanings. Students learn to analyze word structure and use context clues to determine word meaning.

Reader's Workshop is based on reading research and develops essential reading skills, while fostering a love of reading. At the intermediate level, students read and learn about a variety of genre, including full-length trade books and nonfiction selections. Students learn and grow through various instructional contexts including teacher modeling, mini-lessons, small group instruction, book clubs, partnerships, and independent reading. Attention is given to each student's level of reading development while guiding him/her along the pathway to further growth as a strategic reader.

Writer's Workshop is similar to Reader's Workshop in many ways. This instructional model includes the following:

- Teacher modeling of his/her thought process to demonstrate the writing process
- Use of mentor text to illustrate particular elements of writing
- Regular and sustained periods of time for writing
- Student choice and responsibility in using strategies needed to become independent, lifelong writers
- Student opportunity to reflect upon writing and to discuss their growth with others
- Practical application of grammar rules

MATHEMATICS

The mathematics program in sixth grade is designed to actively engage students in a variety of activities and explorations that foster and develop understanding with ratio and rates, extend the system of rational numbers to include negative numbers, use expressions and equations, and develop understanding of statistical thinking. In sixth grade, instructional time focuses on the following areas:

Solve ratio and rate problems

- ✓ By extending rows or columns in the multiplication table, students further develop their understanding of equivalent ratios and rates. They analyze drawings that show relative size of quantities and solve a wide variety of problems involving ratios and rates.

Extend division

- ✓ Students use previous knowledge to explain why the procedures for dividing fractions make sense. They extend their understanding of numbers to the full system of rational numbers, including negative integers. Through logical reasoning skills, students order rational numbers,

find their absolute value, and locate points in all four quadrants of the coordinate plane.

Write expressions and equations

- ✓ Using variables, students write mathematical expressions and equations that correspond to given situations. They write equivalent expressions using algebraic properties, evaluate expressions, and use formulas to solve problems. Students solve simple one-step equations by understanding the need to maintain the equality of both sides of that equation. Further, students construct and analyze tables of quantities and use simple equations like $y=3x$ to describe relationships between quantities.

Develop statistical understanding

- ✓ Students realize that data may not have a definite center and that different ways to measure the center may yield different values. They work with the mean and median of a data set, but recognize the need for measures of variability, like the interquartile range or mean absolute deviation as a way to summarize data.

Extend geometric measurement

- ✓ Students extend their work from elementary school to include finding area, surface area, and volume of polygons. They discuss, develop, and justify formulas for areas of triangles and parallelograms. Students find areas of polygons and solid shapes by decomposing them into pieces whose area they can determine. They draw polygons in the coordinate plane to help them prepare for their work on scale drawings and constructions in Grade 7.

The curriculum for this course includes 21st Century Skills that promote the use of innovative learning strategies by integrating supportive technologies, performance tasks, and higher order thinking skills as well as the integration of global perspectives and financial literacy.

The Mathematics curriculum is aligned with the New Jersey Student Learning Standards for Mathematics.

TECHNOLOGY LITERACY

The K-6 technology program provides an important foundation for elementary students. The program is comprehensive and interdisciplinary, addressing major themes within the curriculum. Each elementary school has a full time technology specialist teacher. These technology specialists provide curriculum development, instruction, professional development, and technical support in their respective schools.

Elementary students engage in curriculum-related technology activities designed by their classroom teacher, technology specialist, and/or library media specialist. Students are encouraged to use technology for problem-solving activities, to use technology as a tool to transfer knowledge and communicate their understandings effectively. As students move through the elementary grade levels, they are also encouraged to use the Internet responsibly as a tool for basic research.

Technology Literacy is based on the New Jersey Student Learning Standards:

- Technology Operations and Concepts: Students demonstrate a sound understanding of technology concepts, systems, and operations.

- Creativity and Innovation: Students think creatively, construct knowledge, and develop innovative products 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
- Digital Citizenship: Students understand human, cultural, and societal issues related to technology and practice legal and ethical behavior.
- Research and Information Fluency: Students access, retrieve, manage, and evaluate information using digital tools.
- 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 technology tools.

SCIENCE

The sixth grade science program uses the Full Option Science System (FOSS) Next Generation. Students explore standards-based, inquiry centered units in life, physical, and earth science. FOSS Next Generation puts the Next Generation Science Standards into practice by integrating all three dimensions: the disciplinary core ideas, the science and engineering practices, and the crosscutting concepts into the science classroom in order to engage students in experiences that lead to deeper understanding of the natural and designed world.

Sixth grade science is taught as a process in which students construct an understanding of scientific core ideas through investigations and analysis of observed phenomena. In doing so, students will apply the following science and engineering practices throughout the course:

- Ask questions and define problems
- Develop and use models
- Plan and carry out investigations
- Analyze and interpret data
- Use mathematics and computational thinking
- Construct explanations and design solutions
- Engage in argument from evidence
- Obtain, evaluate, and communicate information

The sixth grade students continue to develop their understanding of key concepts in life science, physical science, and earth science. The ideas build upon the K-5 ideas and capabilities to allow learners to explain phenomena central to science. The specific units explored are:

- Matter and Energy in Organisms and Ecosystems
- Interdependent Relationships in Ecosystems
- Body Systems
- Types of Interactions
- Thermal Energy
- Astronomy
- Weather and Climate

The sixth grade science curriculum is aligned with the 2016 New Jersey Student Learning Standards for Science (NJSLS-S).

STEM

Sixth grade students will collaborate on a number of engineering, coding and design challenges that emphasize innovation, critical thinking and problem solving. They will define the criteria and constraints of a design problem with sufficient precision to ensure a successful solution, taking into account relevant scientific principles and potential impacts on people and the natural environment that may limit possible solutions. They will then evaluate competing design solutions using a systematic process to determine how well they meet the criteria and constraints of the problem. Students will then analyze data from tests to determine similarities and differences among several design solutions and identify the best characteristics of each to be combined into a new solution to better meet the criteria for success. Finally, students will develop a model to generate data for iterative testing and modification of a proposed object, tool, or process such that an optimal design can be achieved. *(MS ETSI Engineering Design)*

SOCIAL STUDIES

The grade 6 Social Studies course of study will focus on the era of empires. Students will examine the great empires of the past, with a particular focus on the traditions of ancient Greece and Rome. The structural components of empires will be examined as well as the themes of global interconnectedness, economy, commerce, and territoriality. The students will pay particular attention to how these concepts relate to our world today.

The Social Studies curriculum is aligned with the 2014 New Jersey Student Learning Standards for Social Studies and the New Jersey Student Learning Standards for English Language Arts & Literacy in History/Social Studies, Science and Technical Subjects.

FLES

Foreign Language in the Elementary Schools (FLES) is a Spanish language and culture instructional program in grades 1-6. Students are given one session per week of instruction in the basics of Spanish language and cultural traditions of the world.

The students are introduced to vocabulary related to the environment and time, the countries of the Spanish speaking world, and how to speak about themselves and others by describing physical and personality characteristics, occupations, and life activities.

ART

In Kindergarten through sixth grade, children enjoy an ongoing and systematic art program. Using the elements of art and principles of design as a guide, students explore a wide range of materials and artistic methods. Performance tasks allow students to produce visual expressions with which to communicate their ideas, their culture and their environment, both real and imagined. Through creation, reflection and analysis, children learn to value art as a cultural institution and as a means of personal expression.

The art curriculum is aligned with the New Jersey Student Learning Standards for Visual and Performing Arts. Engaging in the four artistic processes (creating, presenting, responding and connecting,) as indicated in the National Core Art Standards, encourages all students to develop

personal artistic capabilities to their greatest potential.

In sixth grade, children meet with an art specialist once a week. The sixth grade Art Class provides a variety of artistic activities in various media designed to help students master concepts and skills while creating age-appropriate artwork. As individual artistic skills grow, students will be increasingly encouraged to be more self-directed in creative decisions. Students may be required to maintain a sketchbook or portfolio.

MUSIC

The K-6 music curriculum is aligned with the New Jersey Student Learning Standards for Visual and Performing Arts. Engaging in the four artistic processes (creating, performing, responding and connecting,) as indicated in the National Core Art Standards for music education, encourages all students to develop personal musical capabilities to their greatest potential.

In sixth grade, children continue to refine the singing voice, proper singing posture and breathing, and skills in singing two- and three-part harmony. In *Chorus*, students increase their music reading skills by analyzing and singing from various choral octavos throughout the year and by using a system for sight-singing in unison and in two parts. Choral literature includes art music, folk song arrangements, songs in foreign languages, songs from the theatre, and music in pop and jazz styles. In December, March and May, all sixth graders demonstrate their choral music growth, stage presence, and audience etiquette during evening concerts held in the New Providence High School auditorium.

The Music Class provides a variety of musical activities designed to help each student master concepts and skills. Children perform vocal/instrumental ensembles, improvise and create original compositions, develop critical and creative listening skills by listening to and analyzing selections representing numerous composers, styles, and historical eras, and increase their knowledge of music notation through score study and sight-reading activities. Students complete several projects and engage in self-directed and cooperative learning activities. A firm understanding of musical concepts will allow each child to fully enjoy this highly expressive art form.

Sixth grade students are given the opportunity to continue their participation in *Band and Orchestra*. Band and orchestra students attend a forty-minute lesson once per week during which they increase music reading skills, refine tone quality, and further develop playing technique. These lessons are pull-outs, but are rotated in order to avoid missing the same academic period in consecutive weeks. Band and Orchestra rehearsals are held once or twice a week before the beginning of the school day. Each ensemble performs in several evening concerts held at New Providence High School. More advanced musicians may be eligible to participate in select ensembles inside and outside of school.

District Philosophy - Repertoire Selection for Concerts

Each teacher enters into the selection process of ensemble literature with the mindset of selecting repertoire based on quality of composition, aesthetic and educational value, and overall effectiveness with regard to the music education of the students in the ensemble. If the selection is deemed “good music,” it inherently has validity and educational merit. In selecting literature, teachers endeavor to find music that expands each student’s musical experiences.

In addition to being a catalyst for the development of musical skills and concepts, repertoire should expand each student's cultural awareness. This repertoire, and accompanying texts (in the case of vocal music), may or may not be associated with holidays - religious or otherwise. Because tradition and culture are rooted deeply within the composition, performance and enjoyment of music, the study of these traditions and cultures is essential for an optimal musical experience.

Throughout the K-12 experience in the New Providence Schools, students study the historical and cultural aspects of music representative of various holidays and traditions, not only in order to perform the music with greater skill, but also to better understand the world around them. The selections in a single concert comprise a mere snapshot of a student's complete educational journey.

LIBRARY AND INFORMATION SKILLS

Fifth and sixth grade students continue to receive library and information skills instruction from the library media specialist and the classroom teachers. Throughout the year, students visit the media center to research reports and projects created by the subject area teachers in collaboration with the library media specialist. In addition to reinforcing basic research skills, students now learn to extract bibliographical information from a variety of resources and apply it to MLA citation formats. Students recognize the difference between fact and opinion in print, non-print, and computer database resources. They refine their research skills by note taking, organizing, analyzing, evaluating, and synthesizing information to create a product that demonstrates original thought and the ability to communicate ideas. An emphasis is placed on learning that not all information sources are unbiased and reliable, especially on the Internet.

Students are encouraged to visit their school and public libraries frequently, not only for school-related projects, but also for their personal reading pleasure.

As students start to use more online resources, they learn how to evaluate websites for authority and accountability. Students begin to move closer to becoming independent and self-directed learners.

PHYSICAL EDUCATION

Physical Education is that part of the educational process which contributes to the mental, physical, social, and emotional growth of each child through the medium of physical activity. A regular program of physical education is provided in all grades. It is the intent of the physical education program to plan movement experiences that will strive to:

1. Develop motor skills necessary to successfully perform a variety of physical activities.
2. Develop a level of physical fitness that will enable active physical participation and enhance the learning of motor skills.
3. Develop knowledge, understanding, and the benefits from involvement in physical activity and its contributions to a healthful lifestyle.
4. Develop an awareness of social skills and socially acceptable behavior.
5. Motivate students to achieve their physical potential through a comprehensive physical education program.
6. Promote interest and proficiency in activities that will enable students to participate successfully, now, as well as in the future.

*All students must wear sneakers.

HEALTH

Health Education is a sequential and age-appropriate instructional program to help students develop positive behaviors and attitudes that contribute to a healthy, active lifestyle. Students are provided with opportunities to gain knowledge, learn and practice life skills, and develop character traits that foster health-promoting behaviors.

UNIT 1: Wellness

Structures and functions of the cardiovascular, respiratory and skeletal systems; strategies to maintain a healthy lifestyle; heart disease; hypertension and its risk factors; healthy food choices including unsaturated fats and recommended calcium requirements for adolescents; symptoms of heart attack, stroke and choking; first aid procedures for minor and life-threatening emergencies.

UNIT 2: Integrated Skills

Effective communication; decision-making; refusal skills; conflict resolution, goal-setting; strategies to make and maintain healthy friendships; harassment; bullying; effect of family, peers and media in health decision process.

UNIT 3: Drugs and Medicines

Types and uses of over-the-counter medications; safe use of over-the-counter and prescription medications; short and long term effects of tobacco use; role of advertising, media, peer pressure, self-esteem and role models in the choice to use or not to use drugs; physical and behavioral effects of marijuana, inhalant, hallucinogen and steroid abuse.

UNIT 4: Human Relationships and Sexuality

Physical and emotional changes of puberty; how family, peer relationships and values influence choices about sexuality and dating; strategies to remain abstinent; fertilization and fetal development; risk behaviors for pregnancy and STD's; difficulties encountered if an adolescent becomes pregnant; ways HIV/AIDS is spread and is not spread; types of child abuse including: physical abuse, emotional abuse, sexual harassment, sexual abuse and neglect; sources of help if experiencing any type of abuse or difficult problem.

The Physical Education and Health curriculum is aligned with the New Jersey Student Learning Standards for Comprehensive Health and Physical Education.

GIFTED AND TALENTED

Enrichment education is an integral part of the New Providence School District's curricular program, including services for students identified as "gifted and talented" and for all students as an extension of the New Jersey Student Learning Standards, grades K-6. Enrichment education is an opportunity for students to expand their intellectual and creative capacities at an appropriate level commensurate with students' educational and social development and their specific abilities, talents and interests. The New Providence School District's K-6 Gifted and Talented Program is committed to identifying students who exhibit characteristics of general intellectual ability and to meet their special learning needs. Our responsibility to provide an excellent education for these children requires developing their special abilities and talents as well as addressing their social and emotional needs. In addition, the program is committed to stimulating educational opportunities which encourage each child to strive for excellence and fulfill her/his potential. The

New Providence School District Gifted and Talented Services are centered on a three-tiered approach to afford flexibility to meet the varying needs, abilities and interests of students. Further information can be found on the New Providence School District website.

HOMEWORK

Homework is a planned part of the curriculum which is intended to reinforce the school learning experience. The number, frequency, and degree of difficulty of assignments are based on ability and utilize no more the student’s time than necessary.

HOW PARENTS CAN HELP

- ✓ Set aside a specific time and place for the child to work.
- ✓ Offer guidance, but allow the child to do his/her own work.
- ✓ Promote the child’s personal responsibility.
- ✓ Be supportive of school and classroom procedures.

ELEMENTARY SCHOOLS ~ K-6

ALLEN W. ROBERTS SCHOOL	
80 Jones Drive	(908) 464-4707
Gina Hansen	Principal
Anna Rita Falco	Assistant Principal

SALT BROOK SCHOOL	
40 Maple Street	(908) 464-7100
Jean M. Drexinger	Principal
Jonathan Firetto	Assistant Principal

ADMINISTRATIVE OFFICES	
356 Elkwood Avenue	(908) 464-9050
David M. Miceli, Ed.D	Superintendent
Scott Hough	Assistant Superintendent
James E. Testa	Business Administrator/Board Secretary
Jay Richter	Director of Curriculum, Instruction, and Supervision