

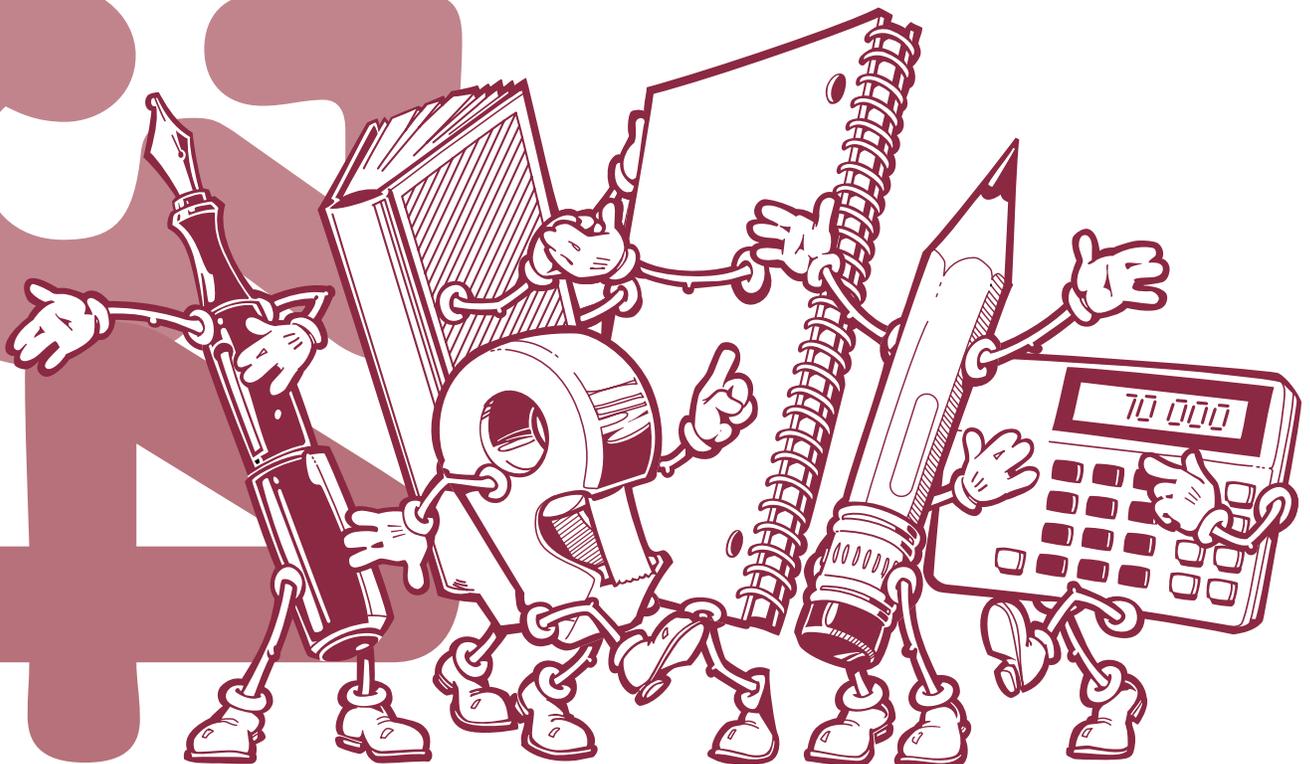
SOUTH COLONIE CENTRAL SCHOOL DISTRICT

K4 Elementary Curriculum GUIDE

A Parent's Guide
to the K-4
Elementary Curriculum

Forest Park • Roessleville
Saddlewood • Shaker Road • Veeder

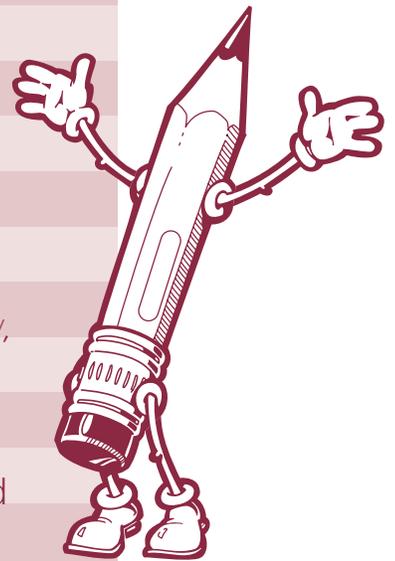
"PREPARING WORLD CLASS CITIZENS"



SOUTH COLONIE
CENTRAL
SCHOOLS **Standards**

“All Students Can Learn Well”

We value: integrity,
excellence,
self-worth,
caring,
inclusion,
individuality,
responsibility,
security,
cooperation,
learning, and
optimism.



EACH STUDENT WILL DEMONSTRATE:

- * Self-esteem;
- * The ability to make responsible choices;
- * Personal visions and plans to achieve them;
- * The use of a second language;
- * The understanding, respect and acceptance of people of different race, sex, ability, cultural heritage, national origin, religion, and political, economic and social background, and their values, beliefs, and attitudes;
- * The skills to acquire, interpret and transmit information;
- * Mastery of all essential learner objectives at all levels of thinking; and
- * The ability to work with others to reach common goals.

FILTERS FOR ACTION

- * We will make only decisions that are in the best interest of students.
- * We will not tolerate any action or circumstance that degrades any person.
- * We will not grant tenure of a permanent appointment to anyone that demonstrates less than excellence.
- * No new program will be accepted unless parents are involved in the development and the decision, appropriate provisions for effective staff development are made, adequate resources are provided, and a program assessment component is included.
- * We will practice participatory management. (1) Those closest to the job know it best. (2) Strategic information flows downward and operational information flows upward. (3) Decisions should be made at the lowest appropriate level. (4) Accountability is commensurate with authority.

“PREPARING WORLD CLASS CITIZENS”

Dear **PARENTS**

This publication is designed to provide an overview of the major areas of study for elementary students in grades kindergarten through four across the five elementary schools of the South Colonie Central School District.

The curriculum for the schools is guided by leadership from the following individuals and groups:

- * *elementary principals;*
- * *K-12 instructional supervisors;*
- * *instructional councils composed of teachers, administrators and instructional supervisors;*
- * *site based committees representative of instructional and support staff and parents; and*
- * *the Curriculum Review Board consisting of teachers, administrators, students, parents and teachers of special areas.*

The Superintendent and Board of Education carefully review the recommendations of these groups. We continually strive to offer the best possible programs for all students.

Please use this handbook as a guide to the curriculum in your child's classroom. If you have questions about the school curriculum, please feel free to contact your child's teacher, the elementary principal, the instructional supervisors, or the assistant superintendent for instruction.

Sincerely,

South Colonie's elementary school principals

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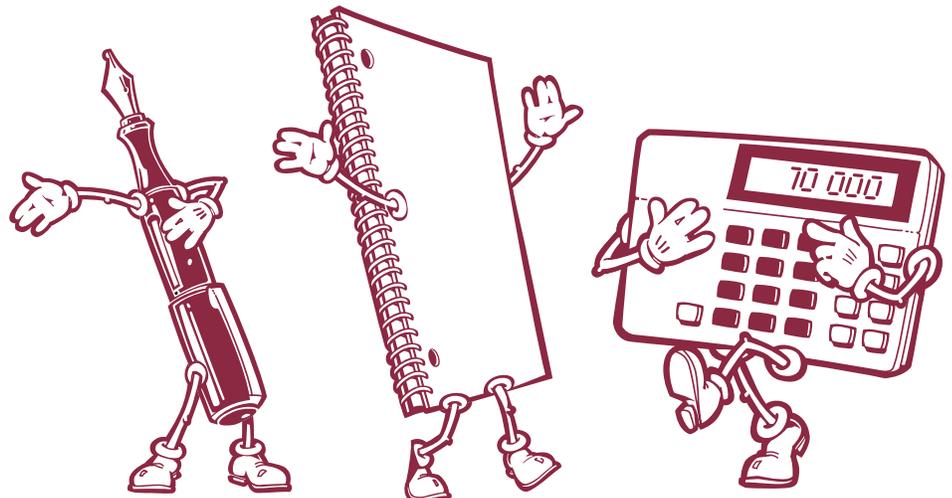
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The Elementary Curriculum: **An Overview**

LANGUAGE ARTS

The language arts—reading, writing, listening and speaking—play a major role in the educational program of each elementary student. District goals and the New York State Learning Standards guide the language arts course of study. In the elementary grades, students are expected to learn to read, write, listen and speak:

- * for information and understanding,
- * for literary response and expression,
- * for critical analysis and evaluation, and
- * for social interaction.

In South Colonie, we strive to develop students' skills in all modes of communication and to help students become proficient, enthusiastic literate individuals who will contribute to a global society.

Literacy development is monitored through locally developed assessments, standardized, and state tests. The assessments developed locally provide a method for teachers to monitor ongoing progress through systematic observation. Teachers evaluate evidence of what a child already knows, understands, and is able to do. Information gathered in this manner will inform and guide instruction on increasingly difficult tasks.

MATHEMATICS

Elementary children learn to understand mathematics and learn to become mathematically confident through instruction in:

- * mathematical reasoning,
- * number and numeration,
- * operations of whole numbers, fractions, and decimals,
- * measurement,
- * uncertainty,
- * patterns/functions, and
- * modeling/multiple representation.

We strive to make mathematics meaningful and relevant, which means we connect instruction to real-life applications. Many teachers pre- and post-test students' mastery of math skills and concepts and develop lessons and activities to meet students' individual needs.

Third and fourth grade students receive support through computer-assisted instruction. Classroom computers and a computer laboratory allow students to utilize computer technology to enhance their mathematical reasoning. Many math activities are integrated with the science curriculum.

The mathematics curriculum and lessons are aligned with the New York State Learning Standards and the recommendations of the National Council of Teachers of Mathematics.

"PREPARING WORLD CLASS CITIZENS"

SOCIAL STUDIES

The kindergarten through fourth grade social studies program is comprehensive, diverse and multicultural. Students are introduced to:

- * the variety of communities, languages, customs and family traditions as they relate to the responsibility of being a member of a local, state, national and global community;
- * a world interrelated through history, geography, economics and civics; and
- * use of informed choices and decisions on issues that reflect a concern for the community and self.

Our overarching goal is that each student will demonstrate a growing knowledge of history, geography, economics, and the political process. This enables each student to recognize the rights and responsibilities of diverse cultures and realize his/her role as a citizen in various communities.

The student learning goals for the social studies program incorporate the New York State Learning Standards. Students will demonstrate:

- * understanding of significant historical events and developments in our community, our state, and our nation;
- * understanding of significant historical events and developments in world history;
- * understanding of the geography of the interdependent worlds: local, national and global;
- * understanding of how people/societies develop economic systems;
- * the necessity for establishing government;
- * understanding of the roles, rights and responsibilities of citizenship; and
- * understanding of the roles and contributions of individuals and/or groups in society.

SCIENCE

Science in grades one through four is studied for the appreciation of natural phenomena, an understanding of how scientific information is organized, and the experience of conducting investigations. To effect the science program, students are supplied with common textual material published by the Silver Burdett Publishing Company. The text series is comprehensive and spiral in nature, extending the study of various topics each year. These topic areas are:

- * life sciences, including the study of plants, animals and ecology;
- * physical science, including the study of matter and energy; and
- * earth science, including the study of the earth, space, and weather.

Supplemental activities beyond the text also are part of the science curriculum. These activities include the study of ladybugs,

butterflies, duck egg/chicken egg hatching, owl pellets and technology challenges.

THE ARTS

The New York State Learning Standards provide the basic framework for South Colonie's first through fourth grade curriculum in the arts—dance, music, theatre, and the visual arts. The student learning goals include:

- * creating, performing and participating in the arts;
- * knowing and using materials and resources in the arts;
- * responding to and analyzing works of art; and
- * understanding the cultural contributions of the arts.

ART

All students in grades one through four participate in art classes for one forty-minute period each week. Our goal is to provide the skills needed for each student to create and participate in the arts. Students will acquire the artistic skills needed to visually express and communicate their personal experiences. Through their participation in the elementary art program, students will:

- * personalize their work and recognize the uniqueness of the work of others;
- * properly use and select the appropriate materials and tools to produce their intended results;
- * discuss and evaluate their work and the work of other artists based on their knowledge of art and personal opinion; and
- * become motivated to produce independent artwork specifically for the joy of expressing their ideas artistically.

The display of student artwork is an integral component to the elementary program.

MUSIC

All students in grades one through four participate in one 40-minute period of music instruction each week. Our goal is for each student to acquire knowledge and skills to become both an active participant and an educated consumer of music. The curriculum in general music includes a balance of tonal and rhythmic activities with an emphasis on skill development. Singing, dancing, music games, listening activities and instrument playing are incorporated into the general music classes. Students are introduced to the basics of reading music through work on recorders, Orff instruments, keyboards and singing. Rhythmic skills are developed through movement activities derived from Phyllis Weikart's *Education through Movement* and other sources.

Beginning in fourth grade, students may participate in music instruction on string instruments. Students receive one 30-minute group lesson each week and participate in one orchestra rehearsal each week.

HEALTH EDUCATION

The elementary health education program offers first through fourth grade students the opportunity to develop healthy lifestyles that continue into adulthood. Health education is offered once per week for a forty-minute block of time. Comprehensive health education topics include feelings, the human body, disease, nutrition, safety, and drug education. The health education curriculum is sequential, building each year upon the curriculum of the previous year.

PHYSICAL EDUCATION

The physical education program at the elementary level offers a variety of physical activities—games, sports, exercises and skills—related to each fitness component. In each class students are encouraged to improve in areas of cardiovascular endurance, flexibility, muscular strength and agility. In conjunction with these activities, students are expected to develop and demonstrate group cooperation, fair play, sportsmanship and respect, accepting the differences in others' physical abilities and skill levels. Physical education is offered to students in first through fourth grades.

SPECIAL EDUCATION

The South Colonie school district holds firmly to the belief that all students can learn. Our goal is to help each student to become an independent learner and to attain the learning standards and goals established by the district.

Special education services are based on the individual needs of each child. Many programs, services, and placement options are available. We believe that, to the extent possible, services should be provided to students in a setting with their non-disabled peers. The board of education of South Colonie has had a goal to include all students in regular education classes to the extent possible.

Kindergarten through fourth grade special education programs are served by the district's eight speech pathologists and currently receive the services of the school psychologist approximately two days per week and the services of a social worker two days per week. Physical therapy is provided by a contract with Capital Region BOCES as are Orientation and Mobility services and those for the visually impaired.

LIBRARY/MEDIA

The library media center in each school offers a variety of services to students, staff and the community. Each has collections of books, magazines, sound filmstrip kits, book/cassette sets, video tapes and computer software. The collections are integral to the

teaching program in all curricular areas and meet the recreational and informational needs of the students.

Students visit the media center regularly. Students have many opportunities throughout the day to use the media center for book selection or for seeking answers to reference questions. Library instruction focuses on the integration of library skills with classroom curriculum. Library media specialists encourage students to recognize the significance of literature through stories and book talks.

The South Colonie library curriculum is based on the New York State Learning Standards, which require integration of research skills in all academic areas. The goal of our media centers is to develop independent library users and lifelong readers.

Parents, grandparents and community members are invited to become volunteers. An active group of reliable volunteers is needed to accomplish the many tasks necessary to keep the libraries operating. Besides assisting in the circulation of materials and their return to the shelves, parents can help with reading programs and PTA-sponsored author presentations.

COMPUTER-ASSISTED INSTRUCTION (CAI)

Computer-assisted instruction has been an integral part of the elementary instructional program for the past eighteen years. All students in grades three and four utilize computers to practice their mathematics, reading and language arts skills. Students work in individualized sessions, which are recorded by the computer. This information, which identifies subject-specific strengths and weaknesses, is then interpreted by teachers to prescribe future activities to help improve student performance. Teaching assistants knowledgeable in computer applications are present in the CAI labs to direct and assist students.

TECHNOLOGY

In the elementary schools of South Colonie, students are utilizing computer technology as a tool for learning. Increasingly, teachers are creating computer-based student learning projects. For example, a class of third grade students can write original stories using the computer for word processing and, later, combine the stories with audio and computer-generated graphics to create a multi-media presentation.

The school district, through its Technology Committee, has developed a long-range plan for the integration of new technologies into the instructional program. This standing committee regularly reviews the district's progress in implementing new technologies and identifies the district's technology needs.

The major areas of study for students in the elementary grades, kindergarten through four, appear by grade level in the pages that follow. While the content and order within each subject area may vary from classroom to classroom within a grade level, in general all classrooms will cover the subject matter listed. For more information about the curriculum in your child's classroom, please contact your child's teacher or the school principal.

Curriculum for: **Kindergarten****LANGUAGE ARTS****READERS/LISTENERS****Language Arts Goals**

Students will...

Grade Level Indicators

Students will...

develop a positive attitude

- * be enthusiastic and take risks
- * participate in reading activities
- * enjoy being read to and listen attentively

view reading as an active process using experiences and strategies to construct meaning

- * pretend to read
- * read text from memory
- * understand that the written word has meaning and when reread, the message remains the same
- * recognize letters of the alphabet and their sounds
- * recognize that letters make up words
- * be aware of print concepts: book concepts, directionality, one-to-one correspondence, word concepts, letter concept
- * use picture and context clues to understand text
- * identify that a story has a beginning, middle and end
- * relate experience to reading
- * respond critically to literature
- * develop and expand vocabulary

be exposed to a variety of genre

- * listen to a variety of stories, poems, concept books, picture books, multi-media, predictable books, fairy tales, narrative and factual material

be exposed to a variety of informational sources

- * learn, through teacher modeling, that information may be gathered from books, computers, library, videos, maps, diagrams, charts, graphs, dictionaries, encyclopedias, etc.

WRITERS/SPEAKERS

exhibit a positive attitude

- * be enthusiastic and take risks
- * share drawings, writing, ideas and experiences

understand that writing is a means of communication

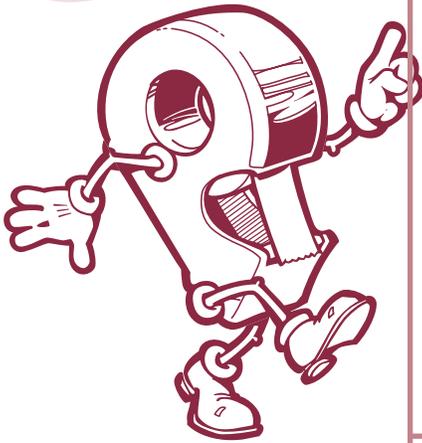
- * understand that writing is the spoken word, written down
- * use pictures and print to convey a message
- * write upper and lower case letters
- * use sound spelling

convey ideas in clear, understandable language

- * retell ideas and events in sequence from read-alouds
- * retell ideas and events in sequence from experiences
- * develop and expand vocabulary

write and speak for a variety of purposes and audiences

- * use language experiences, dramatic expression, music and movement
- * respond to literature and experience



Kindergarten, continued

MATHEMATICS

Number and Numeration

- * sorting and classifying
- * comparing and ordering
- * one-to-one correspondence
- * numerals through 15 orally; 0-10 written
- * counting to 20

Operations with Whole Numbers

- * combining to equal less than 10 by joining and separating sets
- * sequence
- * real-life problems

Operations with Fractions

- * inequality—more and less than 1/2
- * exploring halves and wholes

Probability and Statistics

- * classifying information
- * tallies
- * graphs
- * guessing

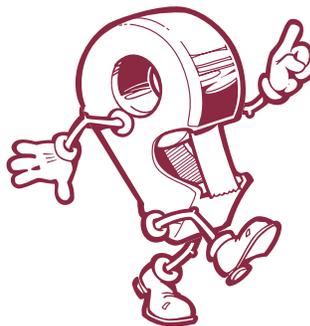
Geometry and Measurement

- * comparing non-standard units
- * estimating
- * understanding temperature in general terms
- * money (naming of coins and bills)
- * time—longer, as long as, less time than
- * shape—note shapes within the environment
- * patterns

SOCIAL STUDIES

The social studies program at the kindergarten level focuses on helping students develop awareness of self as a growing individual. The child's unique qualities as well as similarities to others are stressed. Children learn about values, ideas, customs, and traditions. Social interaction skills are integral to the kindergarten program. Topics explored at the kindergarten level are:

- * Myself and others
- * My family and other families
- * My school and school community
- * My neighborhood
- * Locating places on maps and globes (home, school, neighborhood, community)
- * Basic human wants and needs
- * Helping one another meet needs and wants
- * Symbols of citizenship
- * Rights, responsibilities, and roles of citizenship
- * Making and changing rules and laws
- * People make rules which involve consideration of others and provide for the health and safety of all



The kindergarten program also includes exposure to science, music and art through teacher-planned and teacher-led activities.

LANGUAGE ARTS**READERS/LISTENERS****Language Arts Goals**

Students will...

Grade Level Indicators

Students will...

exhibit a positive attitude

- * be enthusiastic and take risks
- * participate in reading activities
- * focus attention on readers and speakers
- * respect what others have to say

view reading as an active process using experiences and strategies to construct meaning

- * read for meaning
- * rely more on print than pictures to understand text
- * use letter/sound relationships to identify words in context
- * use word parts and patterns
- * reread when text does not make sense
- * self-correct errors
- * demonstrate understanding of characters, events and facts
- * make and confirm predictions about text
- * relate experiences to reading
- * respond critically to literature
- * increase fluency
- * develop and expand vocabulary

be exposed to a variety of genre

- * listen to and/or read poetry, rhymes, fairy tales, factual material, plays, fiction/non-fiction, multi-media, etc.
- * recognize that authors/illustrators have characteristics

be exposed to a variety of informational sources

- * understand that information may be gathered from books, computers, library, videos, maps, diagrams, charts, graphs, dictionaries, encyclopedias, etc.

WRITERS/SPEAKERS

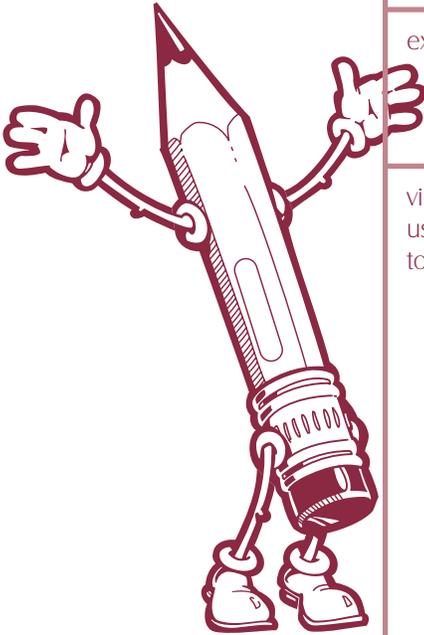
exhibit a positive attitude

- * be enthusiastic and take risks
- * share drawings, writing, ideas and experiences
- * participate in group discussions

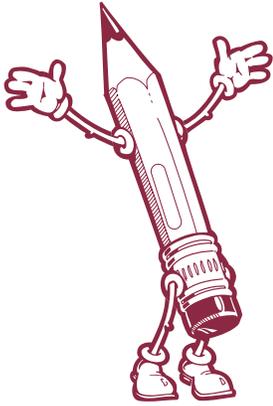
be introduced to the process of writing as a means of communication

- * understand and participate in brainstorming
- * see revising as a way to make writing clearer
- * reread for clarity
- * discuss with peers and adults
- * understand beginning, middle, end
- * edit sentences using conventional form (punctuation, capitalization, grammar, spelling, spacing and letter formation)
- * use consonants, vowels and word patterns to represent the written word
- * use a variety of spelling strategies to correctly spell words frequently used in reading and writing

CHART, CONTINUED



First Grade, continued



WRITERS/SPEAKERS, CONTINUED	
convey ideas in clear, understandable language	<ul style="list-style-type: none"> ✱ retell ideas and events in sequence from read-alouds ✱ retell ideas and events in sequence from experiences ✱ relate personal experiences to reading and other learning situations ✱ write simple sentences
write and speak for a variety of purposes and audiences	<ul style="list-style-type: none"> ✱ use narrative and informational pieces (language experience stories, letters, invitations, thank you notes, journals, how to, etc.) ✱ respond critically to literature and ideas

MATHEMATICS

Number and numeration

- ✱ numerals 1-99
- ✱ counting by ones, twos, fives, and tens
- ✱ even and odd
- ✱ comparing and ordering
- ✱ estimation
- ✱ money notation up to \$9.99

Operations with whole numbers

- ✱ renaming
- ✱ addition, subtraction facts through 10
- ✱ place value, 2 digits without regrouping
- ✱ operation symbols (+, -, =)
- ✱ inverse operations
- ✱ patterns for sums and differences
- ✱ story problems
- ✱ readiness for multiplication

Operations with fractions

- ✱ equal parts of a whole
- ✱ one-half, one-third, one-fourth
- ✱ story problems

Probability and statistics

- ✱ data gathering
- ✱ recording
- ✱ tallying
- ✱ fairness

Geometry and measurement

- ✱ comparisons of measurements
- ✱ estimation
- ✱ nonstandard units of measure
- ✱ standard units of measure (customary and metric)
- ✱ temperature – Celsius, Fahrenheit

- ✱ time – hour, day, month, year, clocks, calendars
- ✱ money – exchange pennies for dimes and nickels
- ✱ shape
 - 2 dimensions
 - symmetry
 - 3 dimensions
 - position
 - patterns

SOCIAL STUDIES

The grade one social studies program focuses on helping students learn about their roles as members of a family and school community. The development of identity and social interaction are stressed. Students learn about families now and long ago, studying about different kinds of families that existed in different societies and communities. Students also begin to locate places on maps and learn how maps serve as representations of physical features and objects.

Topics include:

- ✱ My family and other families
- ✱ History of my family
- ✱ My community and local region
- ✱ Places in my community and local region
- ✱ Challenge of meeting needs and wants
- ✱ Economic decision making
- ✱ Symbols of citizenship
- ✱ Rights, responsibilities, and roles of citizenship
- ✱ Making and changing rules and laws

First Grade, continued

SCIENCE

The science curriculum at the first grade level includes:

- * Life Science
 - variety of plants and animals
- * Physical Science
 - describing qualities of matter
 - differentiating between living and non-living things
- * Earth Science
 - the shape and composition of the Earth
 - the place of the Earth, sun, moon and stars
 - seasons
- * Additional activities
 - life science activities
 - technology activities

HEALTH EDUCATION

The first grade curriculum in health education includes the following subjects:

- * The four basic feelings
- * Skills for developing friendship
- * Self esteem
- * The five senses
- * Introduction to dental health
- * Prevention of the spread of germs
- * Healthy habits
- * Food and growth
- * The food groups
- * Food and safety
- * Stranger safety
- * Sexual abuse awareness (good touch vs. bad touch)
- * Traffic, household and playground safety
- * Medicine safety
- * Good medicine vs. bad drugs
- * Refusal skills

PHYSICAL EDUCATION

Students at the first grade level will:

- * participate in age appropriate activities which include basic locomotive (run, hop, jump) and non-locomotive skills (balance, spatial awareness);
- * begin to understand the need for appropriate warm-up and cool-down exercises; and
- * begin to explore the need for safety, fair play and sportsmanship.

ART

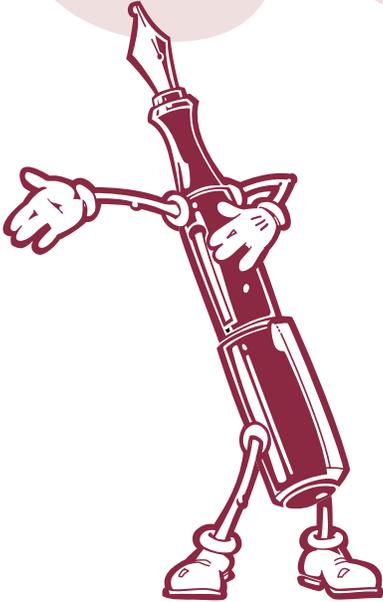
Using the New York State Learning Standard for the Arts as a framework, first grade students will:

- * experiment and create art works in a variety of mediums (drawing, painting and sculpture) based on a range of individual and collective experiences;
- * begin to develop an understanding and use of the elements and principles of art (line, color, texture and shape) in order to communicate their ideas;
- * begin to develop skills involving the use of a variety of art materials, processes and techniques;
- * become acquainted with the names of artists and their work; and
- * begin to develop and use an appropriate art vocabulary.

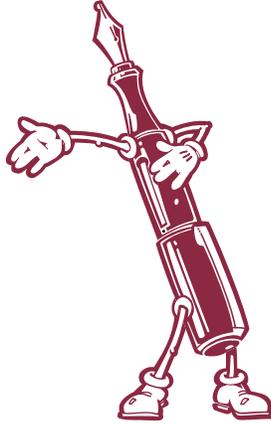
Projects might include lessons dealing with self-awareness, such as self-portraits and family portraits.

Curriculum for: **Second Grade****LANGUAGE ARTS****READERS/LISTENERS**

Language Arts Goals Students will...	Grade Level Indicators Students will...
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * participate in reading activities * focus attention on readers and speakers * respect what others have to say
view reading as an active process using experience and strategies to construct meaning	<ul style="list-style-type: none"> * read for meaning * reread when text does not make sense * self-correct errors * use word parts and patterns to expand vocabulary * demonstrate understanding of characters, events, and facts * make and confirm predictions about text * relate experiences to reading * respond critically to literature * increase fluency * develop and expand vocabulary
become familiar with a variety of genre	<ul style="list-style-type: none"> * listen to and/or read poetry, rhymes, fairy tales, factual material, plays, fiction/non-fiction, multi-media, magazines, content area texts, etc. * recognize that authors/illustrators have characteristics * identify the work of authors/illustrators
recognize that information can be gathered from a variety of sources	<ul style="list-style-type: none"> * use books, computers, library, videos, maps, diagrams, charts, graphs, dictionaries, encyclopedias, etc. to obtain information
WRITERS/SPEAKERS	
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * share drawings, writing, ideas and experiences * participate in group discussions * enjoy talking about books, authors and illustrators
begin to use process writing to communicate a message	<ul style="list-style-type: none"> * use prewriting, drafting, conferencing, revising and editing with peers and teacher guidance * revise for meaning/clarity * write pieces with beginning, middle, end * edit sentences using conventional form (punctuation, capitalization, spacing, grammar, spelling, and letter formation) * continued development of consonants, vowels and word patterns * use a variety of spelling strategies to correctly spell words frequently used in reading and writing
	CHART, CONTINUED



Second Grade, continued



WRITERS/SPEAKERS, CONTINUED	
convey ideas in clear, understandable language	<ul style="list-style-type: none"> * retell ideas and events in sequence from read-alouds and independent reading * retell ideas and events in sequence from experiences * relate personal experiences to reading and other learning situations * write a story using several sentences * use some descriptions and details * develop and expand vocabulary
write and speak for a variety of purposes and audiences	<ul style="list-style-type: none"> * use observations, experiences, creative stories, letters, thank you notes, invitations, lists and poetry, etc. * respond critically to literature and ideas

MATHEMATICS

Number and numeration

- * cardinal numbers to 1000
- * ordinal numbers to 31st
- * counting patterns by 2's, 3's, 4's, and 5's
- * even, odd
- * place value, 2 and 3 digits
- * money notation to \$10.00

Operations with Whole Numbers

- * addition, subtraction through 18
- * equality, inequality
- * inverse operations
- * regrouping
- * expanded notation of 2- and 3-digit numbers
- * multiplication
- * repeated addition
- * division
- * sharing
- * repeated subtraction
- * story problems

Operations with fractions

- * equal parts of a whole
- * number line
- * story problems
- * estimation
- * checking
- * money notation—addition and subtraction using money notation
- * probability

Probability and Statistics

- * data gathering
- * tallying
- * analysis

Geometry and Measurement

- * nonstandard units of measure
- * standard units of measure (customary and metric)
- * length
- * mass
- * capacity
- * time—minutes, seconds, quarter and half-hour
- * temperature—make readings
- * money—change for a dollar
- * shape
 - 2 and 3 dimensions
 - symmetry

SOCIAL STUDIES

In the grade two social studies program, students explore rural, urban, and suburban communities, concentrating on communities in the United States. The student's own community can serve as an example for studying about and understanding other communities. Community studies include content examples from cultures other than the student's own, and from a variety of perspectives including geographic, socioeconomic, and ethnic. Students learn how to locate places on maps and how different communities are influenced by geographic and environmental factors. They also study about the rights and responsibilities of citizenship in their communities.

Topics include:

- * My community and region today
- * People depend on and modify the physical environment
- * Challenge of meeting needs and wants
- * People use human, capital, and natural resources
- * Economic decision making
- * Symbols of citizenship
- * Rights, responsibilities and roles of citizenship
- * Making and changing rules and laws

Second Grade – continued

SCIENCE

The science curriculum at the second grade level includes:

- * Life Science
 - characteristics of plant growth
 - animal and plant habitats
- * Physical Science
 - properties of matter
 - states of matter
 - magnetic radiant energy
- * Earth Science
 - air and water that cover the Earth
 - the sun
 - describing weather
- * Additional activities
 - life science activities
 - technology activities

HEALTH EDUCATION

The second grade curriculum in health education includes the following subjects:

- * Self awareness of strengths and weaknesses
- * Social skills
- * Dealing with bad feelings
- * Independent activities
- * Brain and nerves
- * Bones and muscles
- * Dental health
- * Infectious vs. non-infectious disease
- * Introduction to the immune system
- * Care for a cold
- * Medicine review
- * Effects of tobacco and alcohol
- * Decision making skills
- * Food and energy
- * Five food groups
- * Food production
- * Healthy breakfasts and snacks
- * Stranger safety
- * Emergencies and the telephone
- * Sexual abuse awareness (good touch vs. bad touch)
- * Bicycle, animal and fire safety

PHYSICAL EDUCATION

Students at the second grade level will:

- * participate in age appropriate activities which include locomotive, non-locomotive and manipulative skills (catching, throwing);
- * continue to refine spatial awareness and directional awareness;
- * gain exposure to trust building and cooperative games activities and begin to learn the need for singleness of purpose; and
- * become aware of the components of physical fitness, cardiovascular endurance, strength, flexibility and agility.

ART

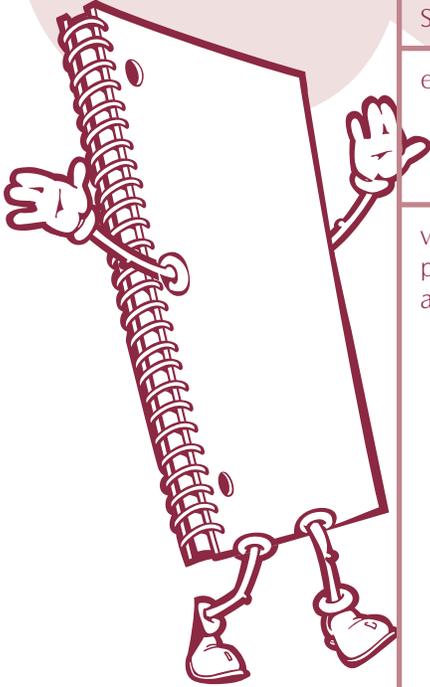
Using the New York State Learning Standard for the Arts, second grade students will:

- * develop their own ideas and images through the exploration and creation of artwork based on themes, symbols and events;
- * further develop an understanding and use of the elements and principles of art (line, color, texture and shape) in order to communicate ideas;
- * develop art room responsibility with materials and tools;
- * discuss and evaluate their work and the work of other artists; and
- * continue to develop an appropriate art vocabulary.

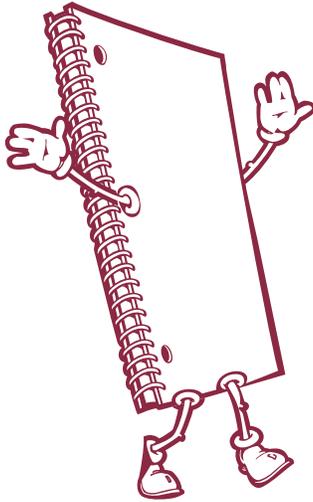
Projects might include lessons based on the students' environment and environments of the world (deserts, rainforests, and others).

LANGUAGE ARTS**READERS/LISTENERS**

Language Arts Goals Students will...	Grade Level Indicators Students will...
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * participate in reading activities * focus attention on readers and speakers * respect what others have to say
view reading as an active process using experiences and strategies to construct	<ul style="list-style-type: none"> * read for meaning * reread when text does not make sense * self-correct errors * use context * demonstrate understanding of characters, events and facts * make and confirm predictions about text * compare/contrast, draw conclusions, and verify information from text * identify and summarize main ideas and facts from text * understand use of figurative language * relate experiences to reading * respond critically to literature * increase fluency * develop and expand vocabulary
be able to recognize a variety of genre	<ul style="list-style-type: none"> * listen/read — poetry, tall/folk tales, historical/realistic fiction, biography, autobiography, non-fiction, magazines, multi-media, content area texts, etc. * recognize that authors/illustrators have characteristics * identify the work of authors/illustrators
gather information from more than one source	<ul style="list-style-type: none"> * use books, computers, library, videos, maps, diagrams, charts, graphs, dictionaries, encyclopedias, timelines, glossaries, etc.
WRITERS/SPEAKERS	
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * share drawings, writing, ideas and experiences * participate in writing activities and group discussions * enjoy talking about books, authors and illustrators
be able to use process writing to communicate a message	<ul style="list-style-type: none"> * use prewriting, drafting, conferencing, revising and editing with teacher guidance * revise for meaning/clarity * organize ideas in logical sequence * write pieces with beginning, middle, end * begin to write compound and complex sentences * replicate various styles of writing * edit using conventional form (punctuation, capitalization, grammar, paragraphing, spelling and letter formation) * use a variety of spelling strategies to correctly spell words frequently used in reading and writing



Third Grade, continued



WRITERS/SPEAKERS, CONTINUED	
convey ideas in clear, understandable, and appropriate language	<ul style="list-style-type: none"> * retell ideas and events from read-alouds and independent readings * relate personal experiences to reading and other learning situations * write a story using descriptions and details * write complete paragraphs with essential ideas and details
write and speak for a variety of purposes and audiences	<ul style="list-style-type: none"> * use letter writing, journals, expository and narrative writing, etc. * respond critically to literature and support ideas * begin note-taking * answer essay questions with teacher guidance

MATHEMATICS

Number and numeration

- * cardinal numbers through 10,000
- * ordinal numbers through 500
- * counting—skip count to 100
- * rounding
- * even, odd
- * positive and negative numbers
- * estimation
- * place value to 10,000
- * decimals using money activities
- * fraction notation, including mixed numbers

Operations with whole numbers

- * addition, subtraction facts to 25
- * place value, 2 and 3 digits, less than 10,000
- * regrouping—exchanging
- * expanded notation
- * multiplication tables
- * division
 - 2 and 3 digits
 - symbols
- * properties of numbers
- * story problems
 - addition, subtraction
 - multiplication by 1-digit
 - division by 1-digit

Operations with fractions

- * practical uses
- * order, inequality
- * equivalence
- * equal parts of a whole
- * estimation

Operations with fractions, continued

- * ratio
- * relation to division
- * addition, subtraction with like denominators
- * story problems
- * decimals—addition and subtraction to tenths

Probability and statistics

- * data gathering and recording
- * chance events
- * estimation of outcomes
- * tree diagrams
- * list arrangements

Geometry and measurement

- * measurement
 - tools
 - equivalence
 - time—1 and 5-minute intervals
 - money—solve problems using flyers and catalogs
 - volume—explore
 - perimeter of polygons
- * shape
 - construction
 - plane
 - compass and protractor
- * solids
- * lines of symmetry
- * coordinate geometry

Third Grade, continued

SOCIAL STUDIES

Grade three students study about communities throughout the world. Students learn about the social, political, geographic, economic, and historic characteristics of different world communities. Students learn about communities that reflect the diversity of the world’s peoples and cultures. They study Western and non-Western examples from a variety of geographic areas. Students also begin to learn about historic chronology by placing important events on timelines. Students locate world communities and learn how different communities meet their basic needs and wants. Students begin to compare the roles of citizenship and the kinds of governments found in various world communities.

Topics include:

- * Cultures and civilizations
- * Communities around the world
- * Beliefs, customs, and traditions in world communities are learned from others and may differ from place to place
- * The location of world communities
- * Physical, human, and cultural characteristics of world communities
- * People depend on and modify their physical environments
- * Challenge of meeting needs and wants in world communities
- * Economic decision making in world communities
- * Symbols of citizenship in world communities
- * Making and changing rules and laws
- * Governments around the world

SCIENCE

The science curriculum at the third grade level includes:

- * Life Science
 - seeds
 - uses of plants
 - uses of animals
- * Physical Science
 - changes in matter
 - measurement of matter
 - force
 - work energy
 - machines
- * Earth Science
 - the changing Earth
 - resources
 - description of the sun, Earth, the planets
 - water cycle
 - atmospheric energy and the water cycle
- * Additional activities
 - life science activities
 - technology activities

HEALTH EDUCATION

The third grade curriculum in health education includes the following subjects:

- * Relationship between feelings and experiences
- * Dealing with stress, fear, anger and hurt feelings
- * Getting along with others
- * Organization of the body
- * Four major organs: brain, heart, stomach and lungs
- * Viruses and bacteria
- * HIV/AIDS education
- * Function of the immune system
- * Chain of infection
- * Medicine use and abuse
- * Classification of drugs: stimulants and depressants
- * Decision making
- * Relationship between food and health
- * Food guide pyramid
- * How the food groups help the body
- * Responsibility and safety
- * Stranger safety
- * Sexual abuse awareness (good touch vs. bad touch)

PHYSICAL EDUCATION

Students at the third grade level will:

- * apply the principles learned in previous manipulative skills to develop new skills (i.e., catching objects while moving);
- * adjust performance of a skill as a result of assessing previous performance (i.e., moving closer to a target);
- * understand the effects of exercise on pulse rate and target heart rate; and
- * continue to learn sportsmanship, fair play and respect for others of like or different skill levels.

ART

Using the New York State Learning Standard for the Arts, third grade students will:

- * continue to develop their ideas and images through the exploration and creation of artwork based on themes, symbols and events;
- * further develop art room responsibility with materials and tools;
- * become acquainted with artists and the characteristics which define their work; and
- * continue to develop and use an appropriate art vocabulary.

Projects might include printmaking or lessons using primary/secondary colors.



**NEW YORK STATE
ASSESSMENT IN ENGLISH
LANGUAGE ARTS &
MATHEMATICS**

Students are required to take challenging state exams in grade 3-5. The tests provide evidence of students' progress on the NYS learning standards in English language arts and mathematics.

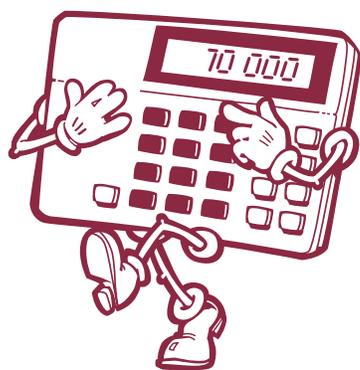
Students need not only to show basic skills in English and mathematics, but also to apply the knowledge and skills they have learned. In addition to answering multiple choice questions that measure basic skills, students will write compositions to explain their understanding of what they have heard and read, and to demonstrate their ability to use skills of spelling, grammar, punctuation, sentence formation, and paragraphing. They will also support their solutions to mathematics problems, showing the steps they used in the solution and explaining the mathematical processes and concepts involved.

LANGUAGE ARTS

READERS/LISTENERS

Language Arts Goals Students will...	Grade Level Indicators Students will...
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * participate in reading activities * focus attention on readers and speakers * respect what others have to say
view reading as an active process using experiences and strategies to construct meaning	<ul style="list-style-type: none"> * read for meaning * reread when text does not make sense * self-correct errors * use context * demonstrate understanding of characters, events and facts * make and confirm predictions about text * compare/contrast, draw conclusions, and verify information from text * identify and summarize main ideas and facts from text * understand use of figurative language * skim to locate pertinent information * relate experiences to reading * respond critically to literature * increase fluency * develop and expand vocabulary
begin to recognize distinguishing features of various genre	<ul style="list-style-type: none"> * identify/discuss author's style, purpose and technique * read/listen – poetry, tall/folk tales, fables, historical/realistic fiction, biography, autobiography, non-fiction, multi-media, magazines, content area texts, etc. * identify characteristics of various genre
use library and multi-media resources for research and to gather information for a variety of purposes	<ul style="list-style-type: none"> * apply knowledge of books, computers, library, videos, maps, diagrams, charts, graphs, dictionaries, encyclopedias, timelines, glossaries, bibliographies, outlines, telephone books, atlases, etc.
WRITERS/SPEAKERS	
exhibit a positive attitude	<ul style="list-style-type: none"> * be enthusiastic and take risks * take pride in sharing, writing ideas and experiences * actively participate in writing activities and group discussions * speak confidently in front of others
CHART, CONTINUED	

Fourth Grade, continued



WRITERS/SPEAKERS, CONTINUED	
use process writing to communicate a message, with increasing independence	<ul style="list-style-type: none"> * use prewriting, drafting, conferencing, revising and editing with teacher guidance * revise for meaning/clarity * write in logical sequence * interpret and present a clear understanding of information * use a variety of sentence lengths and styles * replicate various styles of writing * use editing and proofreading skills * use a variety of spelling strategies to correctly spell words frequently used in reading and writing
convey ideas in clear, understandable and appropriate language	<ul style="list-style-type: none"> * retell ideas and events from read-alouds and independent readings * relate personal experiences to reading and other learning situations * compose compositions and a variety of informational pieces with essential ideas and details * develop and expand vocabulary
write appropriately in various situations for a variety of purposes and audiences	<ul style="list-style-type: none"> * use letter writing, journals, interviews, expository and narrative writing, lists, outlines, bibliographies, etc. * respond critically to literature and support ideas * select and use appropriate materials for a specific purpose * answer essay questions * use note-taking skills

MATHEMATICS

Number and numeration

- * cardinal numbers to 100,000
- * counting—skip count to numbers greater than 1000
- * rounding to nearest tenth, whole number, hundred, and thousand
- * place value to millions
- * Roman system
- * patterns

Operations with whole numbers

- * addition, subtraction less than one million
- * multiplication facts through 144
 - 2 and 3 digits
 - by 10
- * division
 - through 144
 - 2 and 3 digits
 - checking
- * properties
 - commutative
 - associative
 - distributive
- * identity
- * inverse operations
- * word problems

Operations with fractions

- * order
- * inequality
- * equivalence
- * addition, subtraction with fractions and decimals
- * word problems

Probability and statistics

- * data gathering, organization, analysis
- * frequency tables
- * arrangements

Geometry and measurement

- * measurement
 - units of measure
 - area, volume, perimeter, initially by counting units
 - circumference using coordinate paper and string
 - formula with areas and volume
 - time to the second
- * word problems
- * shape
 - plane and solid figures
 - terms—i.e., polygon, chord, radius, face, edge, vertex, angle
- * symmetry
- * coordinate geometry

Fourth Grade, continued**SOCIAL STUDIES**

The grade four program builds on students' understanding of families, schools, and communities and highlights the political institutions and historic development of their local communities with connections to New York State and the United States. The in-depth study of local government will emphasize the structure and function of the different branches and the roles of civic leaders. Students continue to learn about the rights, responsibilities and duties of citizenship. Students develop a sense of political efficacy and a better understanding of the roles of supporters and leaders. Students expand their civic concepts of power, equality, justice, and citizenship as they learn about local government.

Students study about the significant people, places, events and issues that influenced life in their local communities and connect local, New York State, and United States history. *Topics include:*

- * Native American Indians of New York State
- * European encounter: three worlds meet in the Americas (Europe, Africa, and the Americas)
- * Colonial and Revolutionary periods
- * The Revolutionary War in New York State
- * The New Nation
- * Industrial growth and expansion
- * Economic, political and social impacts of urbanization
- * Government—local and state
- * Purposes of government

SCIENCE

The science curriculum at the fourth grade level includes:

- * Life science
 - classification of plants
 - communities of animals
 - ecological relationships
 - plant/animal adaptations
- * Physical science
 - measuring the matter
 - energy conversion with machines
 - electrical magnetic energy
- * Earth science
 - rocks/minerals
 - the oceans
 - organization of the solar system
 - measuring the weather
- * Additional activities
 - life science activities
 - technology activities

HEALTH EDUCATION

The fourth grade curriculum in health education includes the following subjects:

- * Individual uniqueness and self image
- * Appreciating differences
- * Physical effects of emotional strain
- * Conflict resolution
- * Decision making skills
- * Cells and tissues
- * Digestive, respiratory, circulatory and nervous systems
- * Identification of germ types and their ability to spread
- * Parts and function of the immune system
- * HIV/AIDS education
- * Effects of drugs on the body
- * Stimulants, depressants, inhalants and marijuana
- * Refusal skills and decision making
- * Food groups and their effects
- * Six classifications of nutrients
- * Combination foods
- * Serving sizes
- * Stranger safety
- * Sexual abuse awareness (good touch vs. bad touch)
- * Safety when in charge
- * Safety around water, fire and animals

PHYSICAL EDUCATION

Students at the fourth grade level will:

- * be able to perform motor/movement skills in a variety of structural games;
- * be able to demonstrate skill mastery in basic motor skills;
- * understand the component of physical fitness and effects of lack of exercise on the body;
- * be able to work collectively with other students to accomplish a variety of goals; and
- * be able to respect the rights and feelings of others by demonstrating self-control and peaceful conflict resolution.

ART

Using the New York State Learning Standard for the Arts, fourth grade students will:

- * understand and use the elements of art to create independent artwork which expresses their ideas artistically;
- * expand upon their knowledge of artists and their famous works;
- * acquire the artistic skills needed to visually express and communicate their personal experience;
- * select and use the appropriate materials and tools to produce their intended results; and
- * continue to develop and use an appropriate art vocabulary.

Projects might include lessons based on New York State cultures, computer generated artwork, or the creation of an art portfolio.

These standards, established by the New York State Board of Regents, require that all students will:

Health Education, Physical Education & Home Economics

- * acquire the necessary knowledge and skills to establish and maintain physical fitness, participate in physical activity, and maintain personal health.
- * acquire the knowledge and ability necessary to create and maintain a safe and healthy environment.
- * understand and be able to manage their personal and community resources.

English Language Arts

- * read, write, listen, and speak for information and understanding.
- * read, write, listen, and speak for literary response and expression.
- * read, write, listen, and speak for critical analysis and evaluation.
- * read, write, listen, and speak for social interaction.

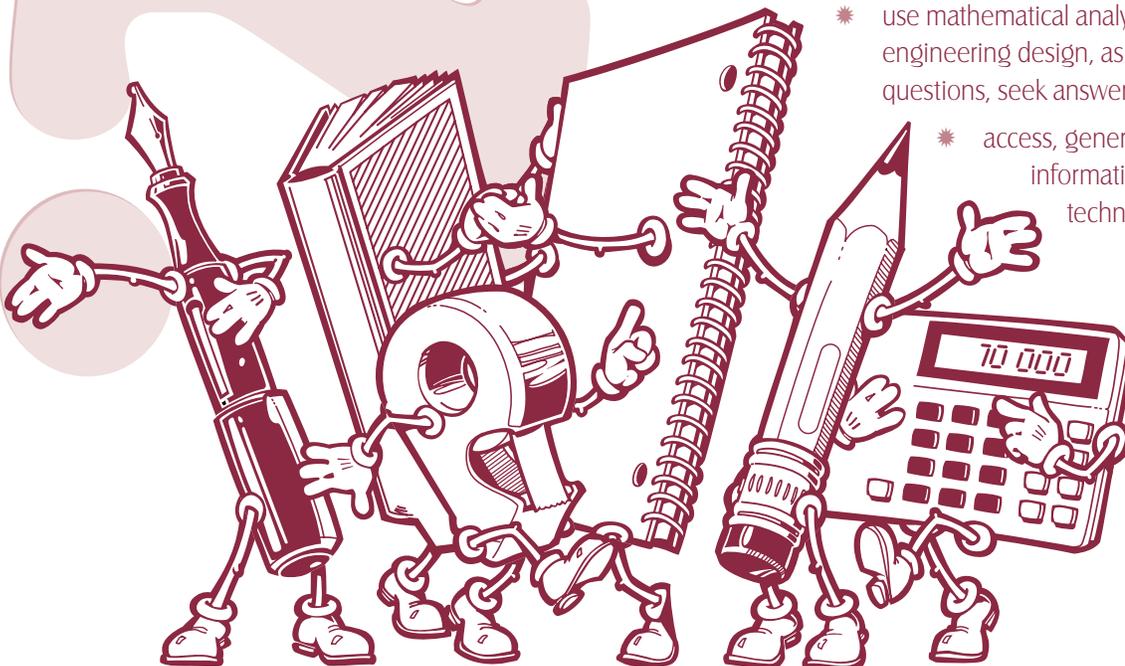
Languages Other Than English

- * use a language other than English for communication.
- * develop cross-cultural skills and understanding.

Mathematics, Science and Technology

- * use mathematical analysis, scientific inquiry, and engineering design, as appropriate, to pose questions, seek answers, and develop solutions.
- * access, generate, process, and transfer information using appropriate technologies.

— continued



New York State Learning Standards, continued

- ✱ understand mathematics and become mathematically confident by communicating and reasoning mathematically, by applying mathematics in real-world settings, and by solving problems through the integrated study of number systems, geometry, algebra, data analysis, probability and trigonometry.
- ✱ understand and apply scientific concepts, principles, and theories pertaining to the physical setting and living environment and recognize the historical development of ideas in science.
- ✱ apply technological knowledge and skills to design, construct, use, and evaluate products and systems to satisfy human and environmental needs.
- ✱ understand the relationships and common themes that connect mathematics, science, and technology and apply the themes to these and other areas of learning.
- ✱ apply the knowledge and thinking skills of mathematics, science, and technology to address real-life problems and make informed decisions.

The Arts

- ✱ actively engage in the processes that constitute creation and performance in the arts (dance, music, theatre, and visual arts) and participate in various roles in the arts.
- ✱ be knowledgeable about and make use of the materials and resources available for participation in the arts in various roles.
- ✱ respond critically to a variety of works in the arts, connecting individual work to other works and to other aspects of human endeavor and thought.
- ✱ develop an understanding of the personal and cultural forces that shape artistic communication and how the arts in turn shape the diverse cultures of the past and present society.

Social Studies

- ✱ use a variety of intellectual skills to demonstrate their understanding of major ideas, eras, themes, developments, and turning points in the history of the United States and New York State.

- ✱ use a variety of intellectual skills to demonstrate their understanding of major ideas, eras, themes, developments, and turning points in world history and examine the broad sweep of history from a variety of perspectives.
- ✱ use a variety of intellectual skills to demonstrate their understanding of the geography of the interdependent world in which we live—local, national, and global—including the distribution of people, places, and environments over Earth’s surface.
- ✱ use a variety of intellectual skills to demonstrate their understanding of how the United States and other societies develop economic systems and associated institutions to allocate scarce resources, how major decision-making units function in the United States and in other national economies, and how an economy solves the scarcity problem through market and non-market mechanisms.
- ✱ use a variety of intellectual skills to demonstrate their understanding of the necessity for establishing governments; the governmental system of the United States and other nations; the United States Constitution; the basic civic values of American constitutional democracy; and the roles, rights, and responsibilities of citizenship, including avenues of participation.

Career Development and Occupational Studies

- ✱ be knowledgeable about the world of work, explore career options, and relate personal skills, aptitudes, and abilities to future career decisions.
- ✱ demonstrate how academic knowledge and skills are applied in the workplace and other settings.
- ✱ demonstrate mastery of the foundation skills and competencies essential for success in the workplace.
- ✱ choose a career major [optional] and acquire career-specific technical knowledge/skills necessary to progress toward gainful employment, career advancement, and success in post-secondary programs.

Elementary School Information

Forest Park Elementary School

100 Forest Drive, Albany, 12205
Telephone: 869-3006

Roessville Elementary School

100 California Avenue, Albany, 12205
Telephone: 459-2157

Saddlewood Elementary School

100 Loree Drive, Albany, 12205
Telephone: 456-2608

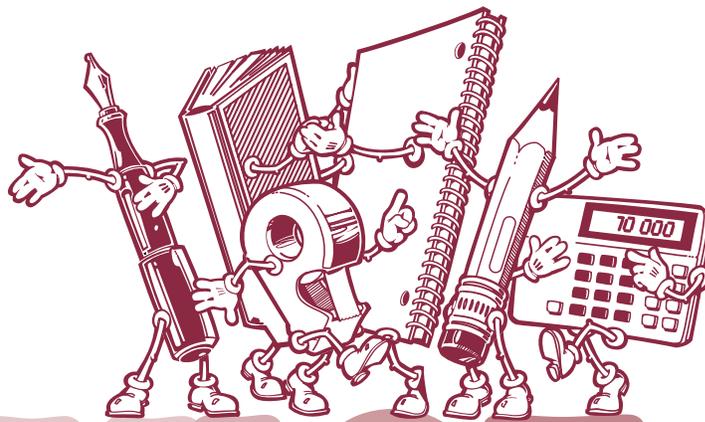
Shaker Road Elementary School

512 Shaker Road, Loudonville, 12211
Telephone: 458-1440

Veeder Elementary School

25 Veeder Drive, Albany, 12205
Telephone: 869-4661

"PREPARING WORLD CLASS CITIZENS"



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ELEMENTARY CURRICULUM GUIDE

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