



WORLD BOOK

Typical Course of Study: Kindergarten

Kindergarten Math

Numbers and Counting

- Count to 100 by ones and by tens
- Count forward from a given number (instead of beginning at 1)
- Write numbers from 0 to 20
- Recognize and name written numerals to 100
- Understand that a number represents a quantity
- Recognize and describe the concept of zero
- Count objects in one-to-one correspondence saying number names in order
- Understand that each successive number name refers to a quantity one larger than the last
- Count a number of objects from 0 to 20 and name the set with a written numeral
- Understand that the last counting word tells "how many" in the set
- Count to answer "How many?" about 0-20 items arranged in a line, rectangle, or circle
- Compare numbers and quantities with the words
- Without counting, give number of objects in a set (up to four objects)
- Estimate the number of objects in a small set

Measurement and Data

- Describe measurable attributes of an object (height, weight, length, etc.)
- Classify objects and count number of objects in a category
- Compare objects in shape and size
- Compare objects by length, weight, or capacity, using such words as longer, shorter, bigger, smaller, heavier, lighter, taller, and shorter
- Put 3-10 objects in size order by some attribute
- Know that units are used to measure (pounds, minutes, feet, quarts, meters, etc.)
- Measure length with such units as toy blocks or similar objects safe for age range
- Estimate simple measurements
- Discuss such units of time as seconds, minutes, hours, days, weeks, and years

Numbers and Operations

- Compose and decompose numbers from 11 to 19 into ten ones and additional ones using drawings and objects
- Show compositions or decompositions with drawings or written equations ($16 = 10 + 6$)
- Understand that the numbers 11-19 are composed of ten ones and 1, 2, 3, 4, 5, 6, 7, 8, or 9 ones

Geometry and Spatial Relationships

- Describe positions of things in relation to other things (in, on, under, up, down inside, outside, behind, in front, between, and beside)
- Describe positions of objects in relation to other objects
- Identify, name, and describe a square, circle, oval, triangle, rectangle, and hexagon
- Find and name shapes in the environment
- Identify shapes as two-dimensional (flat) or three-dimensional (solid)
- Create shapes and compose shapes from other shapes

- Analyze and compare the parts and characteristics of two- and three-dimensional shapes in different sizes and positions
- Sort items according to their shapes (regardless of size)
- Build and draw shapes
- Combine simple shapes into larger shapes
- Combine shapes to create a picture or design
- Sort and classify objects by one or more characteristics into two or more groups
- Recognize simple repeating patterns
- Extend and create simple repeating patterns

Mathematical Operations and Algebra

- Represent addition and subtraction with fingers, objects, claps, drawings, explanations, or number sentences or phrases
- Understand addition as putting together and adding to
- Understand that “adding more” increases the number of objects in a set
- Understand subtraction as taking apart and taking from
- Understand that subtracting (“taking away”) items from a set makes a smaller set
- Use objects, drawings, and written number sentences to solve addition and subtraction problems within 10 (including word problems)
- Decompose numbers 0 to 10 into pairs using objects or drawings and written number sentences ($6 = 4 + 2$ or $6 = 3 + 3$)

Kindergarten Language Arts

Reading

- Look at pictures in books and pretend to read
- Show motivation to read; ask to be read to
- Is read to frequently
- Has own books
- Understand that print is something to be read and has meaning
- Understand that spoken words are represented by written words
- Understand that printed words are separated by spaces
- Identify and show an interest in many different kinds of texts
- Takes care of books; identify title, cover, author, and illustrator of book
- Recognize that letters form words and words form sentences
- Follow words from left to right and top to bottom
- Recognize own name and common words in print
- Recognize and name all uppercase and lowercase letters
- Recite the alphabet
- Recognize that letters have sounds
- Pronounce the most common sound for each letter
- Identify beginning, ending, and middle sounds in a word
- Pronounce words, one sound at a time
- Make new words from one-syllable words by changing a sound (cat from rat, mud from mad, lid from lip)
- Match and produce words that rhyme
- Hear and say separate syllables in words
- Orally blend sounds and syllables into words
- Read some common words by sight
- Retell familiar stories, including key sequence and details
- Identify events, characters, and settings in a story
- Identify the main topic and key details in an informational text
- Ask and answer questions about details in a text
- Describe the relationships between pictures and text

- Compare and contrast events or details in two stories or texts
- Tell why an author wrote a text and how he or she accomplished the purpose
- Tell or try to determine the meanings of simple words from texts
- Read grade-level texts with understanding
- Take part in group reading activities and discussions

Writing and Representing

- Understand that writing is a way to communicate meaning
- Print own first and last name
- Write many uppercase and lowercase letters
- Write letters to represent words
- Express ideas from a text by drawing, dictating, or writing
- Use pictures, designs, scribbles, and letters to represent events, objects, ideas, information, or stories
- Create drawings, designs, written words, or made-up words to express opinions or preferences, or to give information
- Use a combination of drawing, dictating, and writing to narrate a story or event
- Use invented spelling to form words, phrases, or sentences
- Explore digital tools to produce and publish writing
- Participate in group research and writing projects

Speaking, Listening, and Viewing

- Speak clearly enough to be understood and at an appropriate volume
- Speak in complete and increasingly complex sentences
- Understand and use an increasing number and variety of words
- Learn and follow age-appropriate rules of standard English grammar
- Speak to give a point of view or opinion, and to express thoughts and feelings
- Speak to describe, clarify, negotiate, or persuade
- Describe familiar people, places, things, and events with some detail
- Describe relationships among objects, events, and people
- Tell a story
- Retell a story or recount information gained through listening
- Respond appropriately to questions
- Take part in conversations with adults and peers
- Learn and follow rules for listening, speaking, and discussing
- Show understanding of spoken directions
- Show attentiveness to presentations
- Learn new vocabulary through listening
- Put ideas in sequence after listening to a story, instructions, or an explanation
- Make sense of pictures, symbols, and other visual features
- Ask and answer questions about presentations heard or viewed
- Draw conclusions based on information from digital and visual media

Kindergarten Science

Approach to Science

- Show curiosity about the world
- Use senses and tools to observe, investigate, ask questions, solve problems, and draw conclusions
- Describe what he or she wants to learn from a science investigation
- Ask "Why?" "How?" and "What if?" questions
- Try to answer how and why about what happened
- Use measurement and other math processes to gather information
- Collect, describe, record, and communicate information
- Explain, predict, analyze, and generalize about a science event
- Suggest solutions or answers and give evidence for the answers

Earth and Space Science

- Describe physical properties of soil and rocks
- Describe characteristics of soil, water, and air
- Observe and describe objects in space
- Observe and describe apparent movements of objects in space
- Describe changes in weather and seasons
- Discuss ways the environment provides resources for people
- Discuss some ways to protect the environment
- Describe weather and climate in terms of sunlight, precipitation, and temperature in a region
- Share observations of local weather
- Notice and record weather and climate patterns over time
- Discuss ways that animals and plants change their environment
- Draw or describe the relationship between needs of different plants and animals in the places they live (in such a setting as a desert or meadow)
- Describe ways to reduce people's adverse impact on land, water, air, living things
- Describe ways people use natural resources to get things they need

Life Science

- Describe the differences between living and nonliving things
- Describe the basic needs of living things
- Describe sources of food for plants and animals
- Describe sources of water and light for plants and animals
- Understand that living things grow and change
- Observe, describe, compare, and discuss living things
- Match plants and animals to their habitats
- Describe how animals resemble their parents
- Identify ways living things change as they grow
- Recognize seasonal changes in plants and animals
- Name external parts of some plants and animals
- Describe simple life cycles (butterfly or frog)
- Show respect for living things

Physical Science

- Observe, describe, and compare physical properties of objects (size, texture, shape, weight, color, freezing and melting, sinking or floating, etc.)
- Compare and sort objects according to physical attributes
- Identify such sources of energy as light, heat, and electricity
- Identify solids and liquids
- Understand that liquids take the shape of their containers
- Describe effects of common forces (pushing and pulling, kicking, wind, gravity, magnetism, etc.)
- Describe specific interactions between objects when they collide or touch
- Describe effects of smaller or bigger forces
- Observe the effects of sunlight on Earth's surface
- Design a structure to reduce the effects of sunlight on a specific area

Kindergarten Social Studies

Self, Family, and Community

- Identify personal family and community
- Recognize similarities and differences in people and families
- Discuss what it means to be a member of a family and a community
- Describe features of communities and neighborhoods
- Identify cultural traditions of one's own family or community
- Identify personal likes, dislikes, talents, and skills
- Understand and describe self as a learner

- Identify ways people learn from their families and communities
- Show understanding and appreciation of diversity (racial, ethnic, religious, national origins, beliefs, traditions, family structures, etc.)

Citizenship

- Describe rights and responsibilities of children as members of a family, school, community, nation, and world
- Explain the importance of cooperation in a group
- Understand the need for rules at home or school
- Understand the need for laws in the community
- Discuss routines and rules that help keep people safe and healthy
- Identify own country, state (province or territory), and symbols such as the flag
- Experience opportunities to vote to make simple decisions
- Identify important cultural traditions, holidays, and symbols of one's own country
- Identify the capital of the country and some national holidays
- Identify the president (head of state/head of government) of the country and some local or state (provincial or territorial) leaders

History

- Tell the difference between past, present, and future events
- Show a basic awareness of personal and family history
- Describe ways family histories are shared and passed down
- Describe traditions and values of own family and other families
- Identify some important events that happened in the distant or recent past
- Describe how things change over time
- Put events in sequential order

Geography

- Recognize that maps and globes are representations of the Earth's surface
- Describe or draw maps of own home, school, community
- Locate home, school, community on maps
- Use directions to describe relative locations of familiar places
- Describe topographical features of own neighborhood or state (province or territory)
- Become familiar with maps of the United States (or home country) and world
- Discuss ways that people are affected by and adapt to their physical environment
- Discuss ways people can take care of their environment

Economics

- Understand that people need food, clothing, and shelter
- Identify and distinguish between needs and wants
- Discuss ways families make choices to meet their needs and wants
- Identify examples of scarcity and choices made due to scarcity
- Identify examples of goods and services
- Understand that money or trade is used to get goods or services
- Understand that money comes in different forms
- Identify some of the ways families get money
- Recognize jobs in the community and the work people do

Kindergarten Health and Safety

- Define and give examples of health choices and their consequences
- Practice good personal hygiene
- Take measures to prevent the spread of disease
- Identify and make healthy food choices

- Participate regularly in active play and other physical activities (contingent on any physical or other limitations)
- Understand reasons to get enough sleep and relaxation
- Learn and follow safety rules during play and daily activities (walking, being near streets, water play, riding in a car, biking, etc.)
- Name objects that may be dangerous
- Recognize and discuss causes and symptoms of common illnesses
- Discuss and use behaviors to prevent poisoning
- Know the basic structures and functions of the human body
- Identify health services in own community
- Distinguish between helpful and harmful situations
- Recognize and follow practices for responding to emergencies
- Know how to get out of house or school in event of fire
- Use telephone in emergency; provide name, address, and telephone number
- Show appropriate behavior during fire, earthquake, and other disaster drills
- Display appropriate skills to identify, avoid, report, and cope with potentially dangerous situations
- Understand and show ways to interact safely with strangers
- Identify safe behaviors when uncomfortable or unsafe around another person
- Show development of self-confidence and self-esteem
- Demonstrate respect and consideration for all individuals
- Develop resiliency and bonds with peers and adults
- Identify, express, and manages feelings appropriately
- Develop and display effective coping strategies
- Avoid self-destructive behaviors
- Show positive social and practices with peers, in home, and community
- Show understanding of and respect for individual differences
- Identify and discuss bullying behaviors
- Identify and demonstrate alternative behaviors to bullying
- Describe appropriate responses to bullying of self or others
- Describe how to get help in solving conflicts with peers

Kindergarten Arts

(NB: Contingent on physical or other limitations.)

- Experiment with musical instruments
- Move to different musical beats and rhythms
- Perform and create artistic movements and patterns
- Read, write, and perform simple patterns of sounds and rhythms
- Use voice to speak, chant, sing
- Improvise music with instruments
- Listen to, describe, and respond to a variety of music
- Experience and describe music representing different cultures
- Identify some common musical instruments by sight and sound
- Sing age-appropriate songs with accuracy from memory
- Act out events or stories using language and objects
- Improvise dramatizations of stories or ideas
- Take part in experiences in script writing, making props and sets, and acting
- Observe patterns in nature and works of art
- Experiment with visual art using a variety of materials and techniques
- Create and share original works of visual art in various media and dimensions
- Express observations, ideas, or feelings through music, drama, or visual art
- Identify and discuss some well-known works of dance, drama, music, and visual arts and some artists, actors, writers, musicians, choreographers, or composers

- Describe and respond to creative works
- Learn and use vocabulary of dance, music, drama, and visual arts
- Use several forms of art for self-expression of ideas, personality, or thoughts
- Demonstrate appropriate audience skills while watching live performances

Kindergarten Technology

- Identify basic parts of technology systems
- Name input and output devices
- Identify and use applications of technology systems
- Use basic computer skills (turn on computer, use keyboard and mouse)
- Know and use skills and procedures for other devices (music players, tablets, smart phones, cameras, etc.)
- Open, label, save, and close files
- Follow directions to operate software programs
- Operate sound recording devices
- Identify ways technology is used in daily living
- Listen to texts presented in electronic forms
- Create songs, drawings, movies, or stories
- Communicate digitally with available technology
- Collaborate digitally with available technology
- Know and follow age-appropriate practices for safe use of technology
- Use accurate terminology related to technology
- Show appropriate care and maintenance for digital equipment
- Use technology devices for a variety of age-appropriate tasks