

Fourth Grade Curriculum

Students in the Fourth Grade Program at Al Nur School explore the concepts listed below. Children learn these concepts at their own pace. Children are taught with hands-on materials, as well as with traditional methods.

Goals

- Provide a safe and loving environment for all children
- Foster a sense of self-confidence and well being in each child
- Expose children to and build a love for grade appropriate reading, math, science, Arabic, Quran, social skills, art, and movement
- Provide physical activities to facilitate gross and fine motor development
- To develop in children and parents a positive attitude towards self, others, school and learning

Math

Fourth grade Math students sharpen their computational and problem-solving skills while applying mathematical concepts to real-world problems. Students will:

- Work with and communicate about larger numbers through millions and decimals through hundredths.
- Estimate sums and differences before finding exact solutions.
- Achieve rapid fluency with basic number facts.
- Represent multiplication and division with area models and use multiplication and division to solve programs.
- Through a proprietary, research-based series of lessons develop strategies for solving word problems that progress from simple addition problems to problems with complex data.
- Select, use, and communicate problem-solving strategies.
- Use geometry to determine perimeter, volume, and area in both standard and metric units.
- Demonstrate spatial transformations such as translation and rotation of geometric figures.
- Model fractional relationships and equivalent fractions using mathematical notation and concrete manipulatives.
- Relate manipulatives that represent fractional relationships and quantities to decimal and fractional representations.
- Expand understanding of probability and its link to fractions.

Language Arts

This course provides a comprehensive sequence of lessons covering composition, vocabulary, grammar, usage, and mechanics including sentence analysis and diagramming. Structured lessons on spelling enable students to recognize base words and roots in related words. Students also get structured lessons on spelling. Lessons are designed to develop comprehension, build vocabulary, and help students become more independent readers.

LANGUAGE SKILLS

- **Composition**—Students practice writing as a process (from planning to proofreading), as they write a report, a book review, a persuasive essay, poetry, a news article, and more
- **Grammar, Usage, and Mechanics**—Students learn more about sentence structure, parts of speech, punctuation, capitalization, and usage. They begin sentence analysis and diagramming
- **Vocabulary**—The Vocabulary Workshop program helps enrich students' vocabulary, develop word analysis skills, and prepare for standardized tests
- **Spelling**—Students understand sound-symbol relationships and spelling patterns, and recognize base words and roots in related words

LITERATURE

Students learn to identify and analyze literary elements such as character, plot, theme, and setting. The emphasis is on classic literature, including episodes from *Robinson Crusoe*, *Gulliver's Travels*, and *Pollyanna*; legends of King Arthur; and folktales from many lands. Students read works of nonfiction, as well as four novels (selected from a long list of such classics as *The Cricket in Times Square*, *My Side of the Mountain*, and *Sarah, Plain and Tall*). A test preparation program prepares students for standardized tests.

Science

Students develop scientific reasoning and perform hands on experiments in Earth, Life, and Physical Sciences. They construct an electromagnet, identify minerals according to their properties, use chromatography to separate liquids, and assemble food webs. Students will explore topics such as:

- **The Interdependence of Life**—producers, consumers, and decomposers; food webs
- **Animal and Plant Interactions**—populations; competition; predators and prey; symbiosis; animal behavior
- **Invertebrates**—sponges; worms; mollusks; arthropods; echinoderms
- **Chemistry**—mixtures vs. solutions; distillation, evaporation, and chromatography
- **Forces and Fluids**—pressure; forces in flight; density; buoyancy
- **Human Body**—nervous system (senses, reflexes, nerves, and brain); endocrine system (hormones, glands, growth, and digestion)

- **Electricity and Magnetism**—charges; magnets; static electricity; currents and circuits; electromagnetism
- **Rocks and Minerals**—the earth's interior; crystals; minerals; rock cycle; plate tectonics; volcanoes, earthquakes
- **The Fossil Record and the History of Life**—types of fossils; the Paleozoic, Mesozoic, and Cenozoic eras

Social Studies

In Social Studies, the students will study the history of Texas including a study of regions in the United States. The students will discuss the impact of settlement and economic patterns as well as the effects of European colonization in Texas. The students will use a variety of material in which to receive information, and apply critical thinking skills such as determining relationships, predicting and making conclusions about the information

Technology

- Use computer programs to create and write picture stories
- Use a computer mouse: click, click and drag
- Use the Internet to explore kid-friendly websites
- Acquire technology skills as outlined in the TEKS

Quran Memorization Program:

Quran

- Develop the love of Quran and a motivation to memorize it.
- Know the right etiquette for learning Quran and learn to respect it.
- Continue memorizing the Quran starting from where the student left off.
- Revision of past surahs previously memorized.
- Understand meanings of the Surahs with the help of stories, pictures, and plays.
- Improve on Quran recitation and pronunciation.
- Learn how to read and write the Ayahs they are memorizing.

Arabic Grammar and Islamic Studies

- Arabic grammar is taught through a customized curriculum which enhances their understanding and reading of the Surahs they are memorizing.
- Islamic Studies is customized to the Surahs that the student are memorizing by having them understand the meanings of the verses in the Quran as well as deriving lessons from those verses.
- The Islamic Studies curriculum also incorporates Islamic manners and concepts which will enhance the student's understanding and character development and leadership skills.
- The boys will be trained to write and deliver Friday Khutbahs and be given the opportunity to lead daily salat.