7th Grade Science - Syllabus Outline

Brooke Dickinson – Lake Dallas Middle School

Semester 1, Fall 2025

Dear Parents and Guardians,

Welcome to 7th-grade science at Lake Dallas Middle School! This syllabus outlines the course plan for your child's class this semester, including key topics, expectations, and how you can support their success. As required by Texas law (Senate Bill 12), this document serves as the instructional plan and is available for your review.

I look forward to working with you and your child!

Contact Information

- **Teacher**: Brooke Dickinson
- **Email**: sdickinson@ldisd.net
- **Phone**: 940-497-4037
- **Conference Time**: 1:42-2:27 pm Monday – Friday
- **Best way to reach me**: Email, ParentSquare, or call the school office. I'll respond within 24 hours on school days.

Course Overview (Instructional Plan)

This semester, your child will study the following topics in Science, based on Texas state standards, Texas Essential Knowledge and Skills (TEKS):

1. **Unit 1: Investigating Elements and Compounds**
    - Learning objectives: Use the periodic table to identify the atoms and the number of each kind within a chemical formula.
    - TEKS: 7.6(A)(B)
2. **Unit 2: Investigating Changes in Matter and Solutions**
    - Learning objectives: Students will learn to distinguish between physical and chemical changes in matter.

- TEKS: 7.6(C)

3. **Unit 3: Investigating Motion**
   - Learning objectives: calculate average speed using distance and time measurements from investigations

     distinguish between speed and velocity in linear motion in terms of distance

     displacement, and direction; measure, record, and interpret an object's motion using distance-time graphs

   - TEKS: 7.7(A)(B)(C)

4. **Unit 4: Investigating Balanced and Unbalanced Forces**

   - Learning Objective: Analyze the effect of balanced and unbalanced forces on the state of motion of an object using Newton's First Law of Motion.

     Scientific and engineering practices. The student analyzes and interprets data to derive meaning, identify features and patterns, and discover relationships or correlations to develop evidence-based arguments or evaluate designs. The student is expected to: analyze data by identifying any significant descriptive statistical features, patterns, sources of error, or limitations; use mathematical calculations to assess quantitative relationships in data.

   - TEKS: 7.2 (B)(C) 7.7(D)

5. **Unit 5: Investigating Thermal Energy**

   - Learning objectives: Investigate methods of thermal energy transfer into and out of systems, including conduction, convection, and radiation.

     Explain the relationship between temperature and the kinetic energy of the particles within a substance.

   - TEKS: 7.8(A)(C)

6. **Additional Skills/Activities**

   - Developing critical thinking, note-taking, and vocabulary quizzes
   - Activities: Labs, group projects, and Multimedia presentations
   - Activities: One-pagers, class debates, and gallery walks
   - Scientist Study: Pick a famous scientist and write a brief description about them and how they changed the world.

Thank you for supporting your child’s education! Feel free to contact me with questions.

Sincerely,
Brooke Dickinson