Everest Academy

Scope & Sequence
Grade: 7th Subject: Science

Revised:April 2024

1st Quarter (44 Days)			
Resources: **STEMScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
1st: Aug 8-9 *(2days)*	**Welcome to school**	TW establish class routines and procedures	N/A
2nd: Aug 12-16 *(5 days)*	**Elements and Compounds**	TSW compare and contrast elements and compounds in terms of atoms and molecules, chemical symbols, and chemical formulas TSW use the periodic table to identify the atoms and the number of each kind within a chemical formula	7.6A 7.6B
3rd: Aug 19-23 *(3 days)*	**Elements and Compounds**	TSW compare and contrast elements and compounds in terms of atoms and molecules, chemical symbols, and chemical formulas TSW use the periodic table to identify the atoms and the number of each kind within a chemical formula	7.6A 7.6B
4th: Aug 26- Aug 30 *(5 days)*	**Physical and Chemical Changes**	TSW distinguish between physical and chemical changes in matter	7.6C
5th: Sept 2-6 *(4 days)*	Monday: Labor Day Holiday **Aqueous Solutions**	TSW describe aqueous solutions in terms of solute and solvent, concentration, and dilution TSW investigate and model how temperature, surface area, and agitation affect the rate of dissolution of solid solutes in aqueous solutions	7.6D 7.6E
6th: Sept 9-13 *(5 days)*	**Speed and Velocity**	TSW calculate average speed using distance and time measurements from investigations TSW distinguish between speed and velocity in linear motion in terms of distance, displacement, and direction	7.7A 7.7B
7th: Sept 16-20 *(5 days)*	**Speed and Velocity**	TSW calculate average speed using distance and time measurements from investigations TSW distinguish between speed and velocity in linear motion in terms of distance, displacement, and direction	7.7A 7.7B
8th: Sept 23-27 *(4 days)*	**Distance-Time Graphs** Friday: Professional Development	TSW measure, record, and interpret an object's motion using distance-time graphs	7.7C
9th:Sept 30 Oct 4 *(5 days)*	**Distance-Time Graphs**	TSW measure, record, and interpret an object's motion using distance-time graphs	7.7C
10th: Oct 7-11 *(5 days)*	**Newton's First Law of Motion**	TSW analyze the effect of balanced and unbalanced forces on the state of motion of an object using Newton's First Law of Motion	7.7D

2nd Quarter (43 Days)			
Resources: **STEMScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
1st: Oct 14-18 *(5 days)*	**Thermal Energy**	TSW investigate methods of thermal energy transfer into and out of systems, including conduction, convection, and radiation TSW investigate how thermal energy moves in a predictable pattern from warmer to cooler until all substances within the system reach thermal equilibrium	7.8A 7.8B
2nd: Oct 21-25 *(5 days)*	**Thermal Energy**	TSW investigate methods of thermal energy transfer into and out of systems, including conduction, convection, and radiation TSW investigate how thermal energy moves in a predictable pattern from warmer to cooler until all substances within the system reach thermal equilibrium	7.8A 7.8B
3rd: Oct 28- Nov 1 *(4 days)*	Friday: Parent/Teacher Conferences **Temperature and Kinetic Energy**	TSW explain the relationship between temperature and the kinetic energy of the particles within a subs	7.8C
4th: Nov 4-8 *(5 days)*	**Temperature and Kinetic Energy**	TSW explain the relationship between temperature and the kinetic energy of the particles within a subs	7.8C
5th: Nov 11-15 *(5 days)*	**Celestial Objects**	TSW describe the physical properties, locations, and movements of the Sun, planets, moons, meteors, asteroids, comets, Kuiper belt, and Oort cloud	7.9A
6th : Nov 18-22 *(5 days)*	**Earth and Life**	TSW analyze the characteristics of Earth that allow life to exist such as the proximity of the Sun, presence of water, and composition of the atmosphere	7.9C
7th: Nov 25-29	**Thanksgiving Holiday**		
8th: Dec 2-6 *(5 days)*	**Plate Tectonics**	TSW describe the historical development of evidence that supports plate tectonic theory TSW describe how plate tectonics causes ocean basin formation, earthquakes, mountain building, and volcanic eruptions, including supervolcanoes and hot spots	7.9A 7.9B
9th: Dec 9-13 *(5 days)*	**Plate Tectonics**	TSW describe the historical development of evidence that supports plate tectonic theory TSW describe how plate tectonics causes ocean basin formation, earthquakes, mountain building, and volcanic eruptions, including supervolcanoes and hot spots	7.9A 7.9B

2nd Quarter (43 Days)			
Resources: **STEMScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
10th : Dec 16-20 *(5 days)*	Review & Assessment	Review & Assessment	Review & Assessment
	Winter Break		

3rd Quarter (44 Days)			
Resources: **STEMScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
1st : Jan 6-10 *(5 days)*	**Monday Professional development** **Gravity**	TSW describe how gravity governs motion within Earth's solar system	7.9B
2nd: Jan 13-17 *(5 days)*	**Human Impacts on Watersheds**	TSW analyze the beneficial and harmful influences of human activity on groundwater and surface water in a watershed	7.11A
3rd : Jan 20-24 *(4 days)*	Monday: MLK Holiday **Human Impacts on Watersheds**	TSW analyze the beneficial and harmful influences of human activity on groundwater and surface water in a watershed	7.11A
4th : Jan 27-31 *(5 days)*	**Human Impact on Ocean Systems**	TSW describe human dependence and influence on ocean systems and explain how human activities impact these systems	7.11B
5th: Feb 3-7 *(5 days)*	**Energy and Trophic Levels**	TSW diagram the flow of energy within trophic levels and describe how the available energy decreases in successive trophic levels in energy pyramids TSWdescribe how ecosystems are sustained by the continuous flow of energy and the recycling of matter and nutrients within the biosphere	7.12A 7.12B
6th: Feb 10-14 *(5 days)*	Friday: District Professional Development **Human Body Systems**	TSW identify and model the main functions of the systems of the human organism, including the circulatory, respiratory, skeletal, muscular, digestive, urinary, reproductive, integumentary, nervous, immune, and endocrine systems	7.13A
7th: Feb 17-21 *(4 days)*	**Human Body Systems**	TSW identify and model the main functions of the systems of the human organism, including the circulatory, respiratory, skeletal, muscular, digestive, urinary, reproductive, integumentary, nervous, immune, and endocrine systems	7.13A

3rd Quarter (44 Days)			
Resources: **STEMScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
8th : Feb 24-28 *(5 days)*	**Human Body Systems**	TSW identify and model the main functions of the systems of the human organism, including the circulatory, respiratory, skeletal, muscular, digestive, urinary, reproductive, integumentary, nervous, immune, and endocrine systems	7.13A
9th: Mar 3-7 *(5 days)*	**Organism Organization**	TSW describe the hierarchical organization of cells, tissues, organs, and organ systems within plants and animals	7.13B
	Spring Break March 10-14		

4th Quarter (46 Days)			
Resources: **StemScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
1st: Mar 17- 21 *(5 days)*	**Reproduction**	TSW compare the results of asexual and sexual reproduction of plants and animals in relation to the diversity of offspring and the changes in the population over time	7.13C
	Ramadan & Spring break Mar 24 - 31		
2nd: Apr 1-4 *(4 days)*	**Taxonomy**	TSW describe the taxonomic system that categorizes organisms based on similarities and differences shared among groups TSW describe the characteristics of the recognized kingdoms and their importance in ecosystems such as bacteria aiding digestion or fungi decomposing organic matter	
3rd: April 7-11 *(5 days)*	**Taxonomy**	TSW describe the taxonomic system that categorizes organisms based on similarities and differences shared among groups TSW describe the characteristics of the recognized kingdoms and their importance in ecosystems such as bacteria aiding digestion or fungi decomposing organic matter	7.14A 7.14B
4th: April 14- 18 *(5 days)*	**STAAR REVIEW**	STAAR REVIEW	STAAR REVIEW
5th: Apr 21-25 *(5 days)*	**STAAR REVIEW**	STAAR REVIEW	STAAR REVIEW
6th: Apr 28 -May 2 *(5 days)*	**STAAR Testing**	STAAR TESTING	STAAR TESTING

4th Quarter (46 Days)			
Resources: **StemScopes**			
Week	**Unit/Lesson**	**Learning Objectives**	**TEKS**
7th: May 5- 9 *(5 days)*	**STAAR Testing**	STAAR TESTING	STAAR TESTING
8th: May 12- 16 *(5 days)*	**Map Benchmark**		
9th: May 19- 23 *(5 days)*	Award Ceremonies / Graduation Ceremonies		
10th May 26-28	**Graduation ceremonies & staff working days**	N/A	N/A