

Port Isabel Junior High  
Course/Grade Level: Science 6th  
Science Curriculum Map (Tentative)

WK	Dates	TEKS	Scientific investigation and reasoning	Resources	Vocabulary
1	8/22-8/26	<p><b>Science Safety &amp; Procedures/ MSDS Practice and Journal Setup/Scientific Method</b></p> <p><b>6.1A</b> Demonstrate safe practices during lab &amp; field investigations.</p> <p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p> <p><b>6.3A</b> In all fields of science, analyze, evaluate, and critique scientific explanations by using empirical evidence, logical reasoning, and experimental and observational testing, including examining all sides of scientific evidence of those scientific explanations, so as to encourage critical thinking by the student.</p> <p><b>6.4B</b> Use preventative safety equipment, including chemical splash goggles, aprons, and gloves, and be prepared to use emergency safety equipment, including an eye/face wash, a fire blanket, and a fire extinguisher.</p>	<p>- The student, for at least 40% of instructional time, conducts laboratory and field investigations following safety procedures and environmentally appropriate and ethical practices.</p> <ul style="list-style-type: none"> <li>• Wear appropriate safety equipment.</li> <li>• Know the location of safety equipment.</li> <li>• Follow classroom guidelines, as outlined in the Texas Education Agency <i>Texas Safety Standards</i>.</li> <li>• Possible examples may include</li> <li>• Read or study the science activity or laboratory investigation prior to conducting the investigation.</li> <li>• Know and follow all safety rules prior to the investigation.</li> <li>• Be alert during the laboratory time.</li> <li>• Do not attempt unauthorized activities.</li> <li>• If a chemical spill occurs, report it immediately, and follow the instructions of the teacher.</li> <li>• Keep your area clean.</li> <li>• Do not enter preparatory or equipment storage rooms or chemical storerooms.</li> <li>• Always wash your hands for at least 20 seconds with soap and warm water before leaving the laboratory.</li> </ul> <p>- The student knows how to use a variety of tools and safety equipment to conduct science inquiry.</p> <ul style="list-style-type: none"> <li>• Journals/notebooks, beakers, other equipment as needed to teach the curriculum</li> <li>• Preventative safety equipment</li> <li>• Emergency safety equipment</li> </ul>	<ul style="list-style-type: none"> <li>• Fusion Book p. xxvii-xxviii</li> <li>• Fusion Book p. R26-27</li> <li>• Fusion Lab Manual safety pages.</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 1-2, 13-17, 26-27</li> </ul> </li> <li>• Scienesaurus p. 21-43</li> <li>• MSDS Chemical sheets</li> <li>• Safety video</li> </ul>	<ul style="list-style-type: none"> <li>• MSDS</li> <li>• Flammability hazard</li> <li>• Stability hazard</li> <li>• Volatile</li> <li>• Oxidizing</li> <li>• Toxic</li> <li>• Carcinogen</li> <li>• Proper names of equipment.</li> </ul>

2	8/29-9/2	<p><b>Scientific Tools &amp; Measurement</b></p> <p><b>6.2C</b> Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings, writing, and graphic organizers.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	Same as above.	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 2 (Lessons 1-3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 9-10, 24-25</li> </ul> </li> <li>• Sciencosaur p. 53-69</li> </ul>	<ul style="list-style-type: none"> <li>• Proper names of tools.</li> <li>• SI units</li> <li>• Measurement</li> <li>• Volume</li> <li>• Mass</li> <li>• Density</li> <li>• Temperature</li> <li>• Observation</li> <li>• Scientific Method</li> <li>• Independent/Dependent Variables</li> <li>• Graphs</li> <li>• Simulation</li> <li>• Model</li> <li>• Scientific Notation</li> <li>• Precision</li> <li>• Accuracy</li> </ul>
3	Holiday 9/5 9/6-9/9	<p><b>Atoms</b></p> <p><b>Matter and energy.</b> The student knows the differences between <u>elements and compounds</u>.</p> <p><b>*Project</b></p>		<ul style="list-style-type: none"> <li>• Fusion Textbook</li> <li>• Unit 3 (Lessons 4-5)</li> <li>• Fusion Lab Manual</li> <li>• Sciencosaur p. 255- 58</li> </ul>	<ul style="list-style-type: none"> <li>• Atom</li> <li>• Proton</li> <li>• Electron</li> <li>• Neutron</li> </ul>
4	9/12-9/16	<p><b>Elements</b></p> <p><b>6.5A</b> Know that an element is a pure substance represented by chemical symbols.</p> <p><b>**Periodic Table must be introduced at this time**</b></p>	<p><b>6.1A</b> Demonstrate safe practices during lab &amp; field investigations</p> <p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns; and</p> <p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p> <p><b>*By the end of the 8th grade, students should know that:</b></p> <p style="text-align: center;"><b>Even with similar results, scientists may wait until an investigation has been repeated many times before accepting the results as correct.</b></p> <p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 4-5)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 28-29</li> </ul> </li> <li>• Sciencosaur p. 259-261</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Periodic table</li> <li>• Element</li> <li>• Symbol</li> <li>• Pure substance</li> <li>• Chemical</li> <li>• Atom</li> </ul>
5	9/19-9/23	<p><b>6.5B</b> Recognize that a limited number of the many known elements comprise the largest portion of solid Earth, living matter, oceans, and the atmosphere</p>	<p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 5)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet</li> </ul>	<ul style="list-style-type: none"> <li>• Periodic table</li> <li>• Elements</li> <li>• Symbol</li> <li>• Pure substance</li> </ul>

				<ul style="list-style-type: none"> <li>➤ p. 30-31</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Chemical</li> <li>• Atom</li> <li>• Circle graph</li> <li>• Atmosphere</li> </ul>
6	9/26-9/30	<p style="text-align: center;"><b>Compounds</b></p> <p><b>Matter and energy.</b> The student knows the differences between <u>elements and compounds</u>.</p> <p><b>6.5C</b> Differentiate between elements &amp; compounds on the most basic level.</p>	<p><b>6.1A</b> Demonstrate safe practices during lab &amp; field investigations</p> <p><b>6.1B</b> Practice appropriate use and conservation of resources.</p> <p>❖ <b>By the end of the 8th grade, students should know that:</b></p> <ul style="list-style-type: none"> <li>• Recycling materials and the development of substitutes for those materials can reduce the rate of depletion of resources but may also be costly. Some materials are not easily recycled.</li> <li>• The wasteful or unnecessary use of natural resources can limit their availability for other purposes. Restoring depleted soil, forests, or fishing grounds can be difficult and costly.</li> <li>• The benefits of Earth's resources—such as fresh water, air, soil, and trees—can be reduced by deliberately or inadvertently polluting them. The atmosphere, the oceans, and the land have a limited capacity to absorb and recycle waste materials. In addition, some materials take a long time to degrade. Therefore, cleaning up polluted air, water, or soil can be difficult and costly.</li> </ul>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 4)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 32-33</li> </ul> </li> <li>• Sciencsaurus p. 262-264, 268, 270</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Periodic table</li> <li>• Elements</li> <li>• Symbol</li> <li>• Pure substance</li> <li>• Bond</li> <li>• Atom</li> <li>• Compound</li> <li>• Molecule</li> <li>• Model</li> <li>• Limitation</li> <li>• Advantage</li> <li>• Subscript</li> <li>• Formula</li> </ul>
7	10/3-10/7	<p style="text-align: center;"><b>Physical Properties of Matter</b></p> <p><b>Matter and energy.</b> The student knows <u>matter has physical properties</u> that can be used for classification.</p> <p><b>6.6B</b> Calculate <b>density</b> to identify an unknown substance.</p>	<p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 1)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 38-39</li> </ul> </li> </ul>	
8	Holiday 10/10 10/11-10/14	<p style="text-align: center;"><b>Physical Properties of Matter</b></p> <p><b>Matter and energy.</b> The student knows <u>matter has physical properties</u> that can be used for classification.</p> <p><b>6.6A</b> Compare metals, nonmetals, and metalloids using physical properties such as luster, conductivity, or malleability.</p>	<p><b>6.2A</b> Plan and implement comparative and descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology.</p> <p><b>6.2C</b> Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings,</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 5)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 36-37</li> </ul> </li> <li>• Sciencsaurus p. 265</li> <li>• Periodic Table</li> <li>• YouTube Video</li> </ul>	<ul style="list-style-type: none"> <li>• Periodic Table</li> <li>• Periods</li> <li>• Groups</li> <li>• Property</li> <li>• Physical property</li> <li>• Element</li> <li>• Metal</li> </ul>

			<p>writing, and graphic organizers.</p> <p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns; and</p> <p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p> <p><b>*By the end of the 8th grade, students should know that:</b></p> <p style="padding-left: 40px;">Even with similar results, scientists may wait until an investigation has been repeated many times before accepting the results as correct.</p> <p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>		<ul style="list-style-type: none"> <li>• Non-metal</li> <li>• Metalloid</li> <li>• Luster</li> <li>• Conductivity</li> <li>• Malleability</li> <li>• Circuit</li> <li>• Symbol</li> <li>• Substance</li> <li>• Atom</li> </ul>
9	10/17-10/21	*Continue with <b>6.6A</b> <b>*Project</b>			
10	10/24-10/28	<b>Physical Versus Chemical Properties</b> <b>5.5A</b> Classify matter based on physical properties, including mass, magnetism, physical state (solid, liquid, and gas), relative density (sinking and floating), solubility in water, and the ability to conduct or insulate thermal energy or electric energy.	<b>6.4A</b> Use appropriate tools to collect, record & analyze information.	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 2)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 5-6</li> </ul> </li> <li>• Sciencosaur p. 250-252, 271-273</li> <li>• YouTube video</li> </ul>	•
11	10/31-11/4	<b>6.5D</b> Identify the formation of a new substance by using the evidence of a possible <b>chemical change</b> such as production of a gas, change in temperature, production of a precipitate, or color change.	<p><b>6.2A</b> Plan and implement comparative and descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology.</p> <p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 3 (Lesson 3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 34-35</li> <li>➤ p. 11-12</li> </ul> </li> <li>• Sciencosaur p. 252-254</li> </ul>	
12	11/7-11/11	*Continue with 6.5D Chemical Changes		•	•
13	11/14-11/18	<b>Potential &amp; Kinetic Energy Force, Motion, Energy.</b> The student knows force and motion are related to <u>potential and kinetic</u>	<p><b>6.1A</b> Demonstrate safe practices during lab &amp; field investigations</p> <p><b>6.2A</b> Plan and implement comparative and</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 1)</li> </ul> </li> <li>• Fusion Lab Manual</li> </ul>	<ul style="list-style-type: none"> <li>• Potential</li> <li>• Kinetic</li> <li>• Chemical</li> </ul>

		<p>energy. The student is expected to:</p> <p><b>6.8A</b> Compare and contrast potential and kinetic energy.</p>	<p>descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology.</p> <p><b>6.2B</b> Design and implement experimental investigations by making observations, asking well-defined questions, formulating testable hypotheses, and using appropriate equipment and technology.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	<ul style="list-style-type: none"> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 46-47</li> <li>➤ p. 7-8</li> </ul> </li> <li>• Sciencosaur p. 300</li> <li>• Newton's Cradle</li> <li>• Rollercoaster interactive</li> </ul>	<ul style="list-style-type: none"> <li>• Electrical</li> <li>• Mechanical</li> <li>• Sound</li> <li>• Electromagnetic</li> <li>• Thermal</li> <li>• Nuclear</li> </ul>
14	11/21-11/25	<b>THANKSGIVING</b>			
15	11/28-12/2	<p><b>Conservation of Energy</b>  <b>Force, motion, and energy.</b> The student knows that the Law of <u>Conservation of Energy</u> states that energy can neither be created nor destroyed. It just changes form.</p> <p><b>6.9C</b> Demonstrate <u>energy transformations</u> such as energy in a flashlight battery changes from chemical energy to electrical energy to light energy.</p>	<p><b>6.2A</b> Plan and implement comparative and descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology.</p> <p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 1)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 60-61</li> </ul> </li> <li>• Sciencosaur p. 300-302</li> </ul>	<ul style="list-style-type: none"> <li>• Energy transformation</li> <li>• Law of Conservation of Energy</li> </ul>
16	12/5-12/9  12/7 Sem. Exam	<p><b>6.9B</b> Verify through investigations that <u>thermal energy moves in a predictable pattern from warmer to cooler</u> until all the substances attain the same temperature such as an ice cube melting.</p>	<p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lessons 2-3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 58-59</li> </ul> </li> <li>• Sciencosaur p. 301-303</li> </ul>	<ul style="list-style-type: none"> <li>• Thermal</li> <li>• Transfer</li> <li>• Temperature</li> <li>• Thermometer</li> <li>•</li> </ul>
17	12/12-12/16	<p><b>6.9A</b> Investigate methods of thermal energy transfer, including <u>conduction, convection, and radiation.</u></p>		<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 56-57</li> </ul> </li> <li>• Sciencosaur p. 304-305</li> <li>• YouTube video</li> </ul>	<ul style="list-style-type: none"> <li>• Thermal energy</li> <li>• Heat</li> <li>• Calorie</li> <li>• Conduction</li> <li>• Conductor</li> <li>• Insulator</li> <li>• Convection</li> <li>• Radiation</li> </ul>

18	12/19-12/23	*Continue with thermal energy *Beginning of Christmas Break			
19	12/26-12/30	CHRISTMAS BREAK			
20	1/2-1/6	CHRISTMAS BREAK/STAFF DEVELOPMENT			
21	1/9-1/13	<p style="text-align: center;"><u>Energy Resources</u></p> <p><b>Matter and energy.</b> The student knows that some of Earth's <u>energy resources</u> are available on a nearly <u>perpetual</u> basis, while others can be <u>renewed</u> over a relatively short period of time. Some energy resources, once depleted, are essentially <u>nonrenewable</u>.</p> <p><b>6.7A</b> Research and debate the advantages and disadvantages of using coal, oil, natural gas, nuclear power, biomass, wind, hydropower, geothermal, and solar resources.</p>	<p><b>6.1B</b> Practice appropriate use and conservation of resources.</p> <p><b>6.4A</b> Use appropriate tools to collect, record &amp; analyze information.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 5 (Lesson 1-3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 42-43</li> </ul> </li> <li>• Sciencsaurus p. 322-331</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Energy</li> <li>• Resources</li> <li>• Perpetual</li> <li>• Renewable</li> <li>• Nonrenewable</li> <li>• Advantage</li> <li>• Disadvantage</li> <li>• Coal</li> <li>• Oil</li> <li>• Natural gas</li> <li>• Solar</li> <li>• Geothermal</li> <li>• Turbine</li> <li>• Hydropower</li> <li>• Biomass</li> </ul>
22	1/16-1/20	<p><b>6.7B</b> Design a logical plan to manage energy resources in the home, school, or community.</p> <p>*Project</p>	<p><b>6.2E</b> Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 5 (Lessons 1-3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 44-45</li> <li>➤ p. 3-4</li> </ul> </li> <li>• Sciencsaurus p. 332-353</li> </ul>	<ul style="list-style-type: none"> <li>• Same as above</li> <li>• Debate</li> <li>• Research</li> <li>• Conservation</li> <li>• Green</li> <li>• Clean</li> </ul>
23	1/23-1/27	<p><b>6.8B</b> Identify and describe the changes in <u>position, direction, and speed</u> of an object when acted upon by unbalanced forces.</p> <p><b>6.8C</b> Calculate <u>average speed</u> using <u>distance and time</u> measurements.</p>	<p><b>6.1A</b> Demonstrate safe practices during lab &amp; field investigations</p> <p><b>6.2A</b> Plan and implement comparative and descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology.</p> <p><b>6.2C</b> Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings, writing, and graphic organizers.</p> <p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 4)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 48-49</li> <li>➤ p. 50-51</li> </ul> </li> <li>• Sciencsaurus p. 284</li> <li>• Stemsopes</li> </ul>	<ul style="list-style-type: none"> <li>• Position</li> <li>• Reference point</li> <li>• Motion</li> <li>• Speed</li> <li>• Vector</li> <li>• Velocity</li> <li>• Acceleration</li> <li>• Distance</li> <li>• Time</li> </ul>

			journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.		
24	1/30-2/3	6.8D Measure and graph changes in motion.	<p>6.2C Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings, writing, and graphic organizers.</p> <p>6.2D Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p>6.2E Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p> <p>6.4A Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 4)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 52-53</li> </ul> </li> </ul>	<ul style="list-style-type: none"> <li>• Speed</li> <li>• Velocity</li> <li>• Acceleration</li> <li>• Line graph</li> <li>• X axis</li> <li>• Y axis</li> <li>• Constant</li> <li>• Increase</li> <li>• Decrease</li> </ul>
25	2/6-2/10	Force & Motion		<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 6)</li> </ul> </li> <li>• Sciencsaurus p. 275-287</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Force</li> <li>• Motion</li> <li>• Inertia</li> <li>• Balanced</li> <li>• Unbalanced</li> <li>• Newton's Laws</li> </ul>
26	2/13-2/17	6.8E Investigate how inclined planes and pulleys can be used to change the amount of force to move an object.	<p>6.1A Demonstrate safe practices during lab &amp; field investigations</p> <p>6.2E Analyze data to formulate reasonable explanations, communicate valid conclusions supported by the data, and predict trends.</p> <p>6.3A In all fields of science, analyze, evaluate, and critique scientific explanations by using empirical evidence, logical reasoning, and experimental and observational testing, including examining all sides of scientific evidence of those scientific explanations, so as to encourage</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 4 (Lesson 7)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 54-55</li> </ul> </li> <li>• Sciencsaurus p. 289, 294</li> <li>• Edheads.org</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Inclined plane</li> <li>• Pulley <ul style="list-style-type: none"> <li>➤ Fixed</li> <li>➤ Movable</li> <li>➤ Block &amp; Tackle</li> </ul> </li> <li>• Fulcrum</li> <li>• Machine</li> <li>• Mechanical advantage</li> </ul>

			critical thinking by the student. 6.4A Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.		
27	2/20-2/24	<b>Rock Cycle</b> 6.10B Classify rocks as metamorphic, igneous, or sedimentary by the processes of their formation.	6.3B Use models to represent aspects of the natural world such as a model of Earth's layers. 6.3C Identify advantages and limitations of models such as size, scale, properties, and materials. 6.4A Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.	<ul style="list-style-type: none"> <li>Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 6 (Lessons 2-3)</li> </ul> </li> <li>Fusion Lab Manual</li> <li>Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 65-66</li> </ul> </li> <li>Sciencesaurus p. 180</li> <li>Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>Rock Cycle</li> <li>Sedimentary</li> <li>Igneous</li> <li>Metamorphic</li> <li>Weathering</li> <li>Erosion</li> <li>Deposition</li> <li>Sediment</li> </ul>
28	2/27-3/3  2/28 M 3/01 R	<b>Properties of Minerals Matter &amp; Energy</b> 6.6C Test the physical properties of minerals, including hardness, color, luster, and streak	6.2A Plan and implement comparative and descriptive investigations by making observations, asking well-defined questions, and using appropriate equipment and technology	<ul style="list-style-type: none"> <li>Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 6 (Lesson 1)</li> </ul> </li> <li>Fusion Lab Manual</li> <li>Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 40-41</li> </ul> </li> <li>Sciencesaurus p. 179</li> <li>Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>Minerals</li> <li>Streak</li> <li>Hardness</li> <li>Color</li> <li>Luster</li> <li>Moh's Hardness Scale</li> <li>Texture</li> </ul>
29	3/6-3/10	<b>Earth's Layers</b> <b>Earth &amp; Space</b> The student understands the structure of Earth, the rock cycle, and plate tectonics. 6.10A Build a model to illustrate the structural layers of Earth, including the inner core, outer core, mantle, crust, asthenosphere, and lithosphere.	6.3B Use models to represent aspects of the natural world such as a model of Earth's layers. 6.3C Identify advantages and limitations of models such as size, scale, properties, and materials. 6.4A Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the	<ul style="list-style-type: none"> <li>Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 7 (Lesson 1)</li> </ul> </li> <li>Fusion Lab Manual</li> <li>Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 62-64</li> <li>➤ p. 18-19</li> </ul> </li> <li>Sciencesaurus p. 175-178</li> <li>Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>Crust</li> <li>Mantle</li> <li>Inner/outer core</li> <li>Lithosphere</li> <li>Asthenosphere</li> <li>Mesosphere</li> <li>Convection currents</li> <li>Magma</li> </ul>

			curriculum.		
30	3/13-3/17	<b>SPRING BREAK</b>			
31	3/20-3/24 SD	<p style="text-align: center;"><b>Plate Tectonics</b></p> <p><b>6.10A</b> Continued <b>6.10C</b> Identify the major tectonic plates. <b>6.10D</b> Describe how plate tectonics causes major geological events such as ocean basins, earthquakes, volcanic eruptions, and mountain building.</p>	<p><b>6.3B</b> Use models to represent aspects of the natural world such as a model of Earth's layers. <b>6.3C</b> Identify advantages and limitations of models such as size, scale, properties, and materials. <b>6.3D</b> Relate the impact of research on scientific thought and society, including the history of science and contributions of scientists as related to the content.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 7 (Lesson 2)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 67-69</li> <li>➤ p. 22-23</li> </ul> </li> <li>• Sciencsaurus p. 181-187</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Pangaea</li> <li>• Plate tectonics</li> <li>• Tectonic plate</li> <li>• Sea-floor spreading</li> <li>• Convection</li> <li>• Fault</li> </ul>
32	3/27-3/31	<p style="text-align: center;"><b>Plate Tectonics</b></p> <p><b>6.10C</b> Identify the major tectonic plates. <b>6.10D</b> Describe how plate tectonics causes major geological events such as ocean basins, earthquakes, volcanic eruptions, and mountain building.</p>	<p><b>6.3B</b> Use models to represent aspects of the natural world such as a model of Earth's layers. <b>6.3C</b> Identify advantages and limitations of models such as size, scale, properties, and materials. <b>6.3D</b> Relate the impact of research on scientific thought and society, including the history of science and contributions of scientists as related to the content. <b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 7 (Lesson 3-5)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 70-71</li> </ul> </li> <li>• Sciencsaurus p. 188-193</li> </ul>	<ul style="list-style-type: none"> <li>• Ocean ridges</li> <li>• Boundaries <ul style="list-style-type: none"> <li>➤ Convergent</li> <li>➤ Divergent</li> <li>➤ Transform</li> </ul> </li> </ul>
33	4/3-4/7	<p style="text-align: center;"><b>Solar System &amp; Gravity</b></p> <p><b>Earth &amp; Space</b> The student understands the organization of our solar system. <b>6.11A</b> Describe the physical properties, locations, and movements of the <u>Sun, planets, Galilean moons, meteors, asteroids, and comets.</u> <b>6.11B</b> Understand that <u>gravity</u> is the force that governs the motion of our solar system.</p>	<p><b>6.2C</b> Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings, writing, and graphic organizers. <b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns. <b>6.3B</b> Use models to represent aspects of the natural world such as a model of Earth's layers. <b>6.3C</b> Identify advantages and limitations of models such as size, scale, properties, and</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 8</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 72-73</li> <li>➤ p. 74-75</li> </ul> </li> <li>• Sciencsaurus p. 238-248</li> <li>• Brainpop</li> <li>• Solar system leveled readers</li> </ul>	<ul style="list-style-type: none"> <li>• Solar system</li> <li>• Sun</li> <li>• Inner/outer planets</li> <li>• Gaseous</li> <li>• Terrestrial</li> <li>• Rotation</li> <li>• Revolution</li> <li>• Axis</li> <li>• Gravity</li> <li>• Meteor</li> <li>• Meteoroid</li> </ul>

			<p>materials.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>		<ul style="list-style-type: none"> <li>• Meteorite</li> </ul>
34	<p>4/10-4/13</p> <p>Holiday 4/14</p>	<p><b>Galilean Moons &amp; Space Exploration</b></p> <p><b>6.11A</b> Describe the physical properties, locations, and movements of the Sun, planets, <u>Galilean moons</u>, meteors, asteroids, and comets.</p> <p><b>6.11C</b> Describe the history and future of <u>space exploration</u>, including the types of equipment and transportation needed for space travel.</p>	<p><b>6.2C</b> Collect and record data using the International System of Units (SI) and qualitative means such as labeled drawings, writing, and graphic organizers.</p> <p><b>6.3D</b> Relate the impact of research on scientific thought and society, including the history of science and contributions of scientists as related to the content.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 8 (Lesson 5) p.516-517</li> <li>➤ Unit 9</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 77-78</li> </ul> </li> <li>• Nasa.gov</li> </ul>	<ul style="list-style-type: none"> <li>• Galilean moons</li> <li>• Satellite</li> <li>• Europa</li> <li>• Io</li> <li>• Ganymede</li> <li>• Callisto</li> </ul>
35	<p>Holiday 4/17</p> <p>4/18-4/21</p>	<p><b>Cells</b></p> <p><b>Organisms &amp; Environments</b> The student knows all organisms are classified into Domains and Kingdoms. Organisms within these taxonomic groups share similar characteristics which allow them to interact with the living and nonliving parts of their ecosystem.</p> <p><b>6.12A</b> Understand that all organisms are composed of one or more <u>cells</u>.</p>	<p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p> <p><b>6.3C</b></p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 10 (Lesson 1)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 79-81</li> <li>➤ p. 20-21</li> </ul> </li> <li>• Sciencsaurus p. 73-76</li> <li>• Cells Alive website</li> <li>• Microscope</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Cell</li> <li>• Organism</li> <li>• Cell membrane</li> <li>• Cytoplasm</li> <li>• Organelle</li> <li>• Nucleus</li> <li>• Mitochondria</li> </ul>
36	<p>4/24-4/28</p>	<p><b>6.12B</b> Recognize that the presence of a nucleus determines whether a cell is <u>prokaryotic or eukaryotic</u>.</p>	<p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 10 (Lesson 1)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 82-83</li> </ul> </li> <li>• Sciencsaurus p. 77-78</li> </ul>	<ul style="list-style-type: none"> <li>• Nucleus</li> <li>• Prokaryotic</li> <li>• Eukaryotic</li> </ul>
37	<p>5/1-5/5</p>	<p><b>Taxonomic Groups</b></p> <p><b>6.12C</b> Recognize that the broadest taxonomic classification of living organisms is divided into currently recognized <u>Domains</u></p>	<p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators,</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 10 (Lesson 2)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 84-85</li> </ul> </li> <li>• Sciencsaurus p. 150-151</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Organism</li> <li>• Species</li> <li>• Domain</li> <li>• Bacteria</li> <li>• Archaea</li> <li>• Eukarya</li> </ul>

			computers, timing devices, and other equipment as needed to teach the curriculum.		
38	5/8-5/12	<b>STAAR TESTING</b>			
39	5/15-5/18 Workday 5/19	<p><b>6.12D</b> Identify the basic characteristics of organisms, including prokaryotic or eukaryotic, unicellular or multicellular, autotrophic or heterotrophic, and mode of reproduction, that further classify them in the currently recognized <u>Kingdoms</u>.</p> <p style="text-align: center;"><b>Ecosystems</b></p> <p><b>6.12E</b> Describe <u>biotic and abiotic</u> parts of an ecosystem in which organisms interact.</p> <p><b>6.12F</b> Diagram the <u>levels of organization within an ecosystem</u>, including organism, population, community, and ecosystem.</p>	<p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p> <p><b>6.2D</b> Construct tables and graphs, using repeated trials and means, to organize data and identify patterns.</p> <p><b>6.4A</b> Use appropriate tools to collect, record, and analyze information, including journals/notebooks, beakers, Petri dishes, meter sticks, graduated cylinders, hot plates, test tubes, triple beam balances, microscopes, thermometers, calculators, computers, timing devices, and other equipment as needed to teach the curriculum.</p>	<ul style="list-style-type: none"> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 10 (Lesson 2)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 86-87</li> </ul> </li> <li>• Sciencosaur p. 152-164</li> <li>• Brainpop</li> <li>• Fusion Textbook <ul style="list-style-type: none"> <li>➤ Unit 10 (Lesson 3)</li> </ul> </li> <li>• Fusion Lab Manual</li> <li>• Fusion Student Booklet <ul style="list-style-type: none"> <li>➤ p. 88-89</li> <li>➤ p. 90-91</li> </ul> </li> <li>• Sciencosaur p. 129-137</li> <li>• Brainpop</li> </ul>	<ul style="list-style-type: none"> <li>• Kingdoms</li> <li>• Protista</li> <li>• Plantae</li> <li>• Fungi</li> <li>• Animalia</li> <li>• Dichotomous keys</li> <li>• Ecosystems</li> <li>• Ecology</li> <li>• Biotic</li> <li>• Abiotic</li> <li>• Population</li> <li>• Species</li> <li>• Community</li> <li>• Organism</li> <li>• Biome</li> <li>• Niche</li> <li>• Habitat</li> </ul>
40	5/22-6/2	<b>9 At-Risk Mandatory Instructional Days</b>			