How Does It Work is aligned to Reading/Language Arts and Science TEKS for Kindergarten through Grade 6.

Kindergarten, Reading/Language Arts

- communicate ideas effectively through speaking and discussion
  - K.1(A) listen actively and ask questions to understand information and answer questions using multi-word responses
  - K.1(B) restate and follow oral directions that involve a short, related sequence of actions
  - K.1(C) share information and ideas by speaking audibly and clearly using the conventions of language
  - K.1(D) work collaboratively with others by following agreed-upon rules for discussion, including taking turns
  - K.1(E) develop social communication such as introducing himself/herself, using common greetings, and expressing needs and wants

- use research skills to plan and present in written, oral, or multimodal formats
  - K.12(A) generate questions for formal and informal inquiry with adult assistance
  - K.12(B) develop and follow a research plan with adult assistance
  - K.12(C) gather information from a variety of sources with adult assistance
  - K.12(D) demonstrate understanding of information gathered with adult assistance
  - K.12(E) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results

Kindergarten, Science

- Scientific investigation and reasoning
  - K.2(A) ask questions about organisms, objects, and events observed in the natural world
  - K.2(B) plan and conduct simple descriptive investigations
  - K.2(C) collect data and make observations using simple tools
  - K.2(E) communicate observations about simple, descriptive investigations
  - K.3(B) make predictions based on observable patterns in nature

- Force, motion, and energy
  - K.6(A) use the senses to explore different forms of energy such as light, thermal, and sound
  - K.6(B) explore interactions between magnets and various materials
  - K.6(C) observe and describe the location of an object in relation to another such as above, below, behind, in front of, and beside
  - K.6(D) observe and describe the ways that objects can move such as in a straight line, zigzag, up and down, back and forth, round and round, and fast and slow
First Grade, Reading/Language Arts

- communicate ideas effectively through speaking and discussion
  - 1.1(A) listen actively, ask relevant questions to clarify information, and answer questions using multi-word responses
  - 1.1(B) follow, restate, and give oral instructions that involve a short, related sequence of actions
  - 1.1(C) share information and ideas about the topic under discussion, speaking clearly at an appropriate pace and using the conventions of language
  - 1.1(D) work collaboratively with others by following agreed-upon rules for discussion, including listening to others, speaking when recognized, and making appropriate contributions
  - 1.1(E) develop social communication such as introducing himself/herself and others, relating experiences to a classmate, and expressing needs and feelings

- use research skills to plan and present in written, oral, or multimodal formats
  - 1.13(A) generate questions for formal and informal inquiry with adult assistance
  - 1.13(B) develop and follow a research plan with adult assistance
  - 1.13(C) identify and gather relevant sources and information to answer the questions with adult assistance
  - 1.13(D) demonstrate understanding of information gathered with adult assistance
  - 1.13(E) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results

First Grade, Science

- Scientific investigation and reasoning
  - 1.2(A) ask questions about organisms, objects, and events observed in the natural world
  - 1.2(B) plan and conduct simple, descriptive investigations
  - 1.2(C) collect data and make observations using simple tools;
  - 1.3(B) make predictions based on observable patterns

- Force, motion, and energy
  - 1.6(A) identify and discuss how different forms of energy such as light, thermal, and sound are important to everyday life
  - 1.6(B) predict and describe how a magnet can be used to push or pull an object
  - 1.6(C) demonstrate and record the ways that objects can move such as in a straight line, zig zag, up and down, back and forth, round and round, and fast and slow.
Second Grade, Reading/Language Arts

- communicate ideas effectively through speaking and discussion
  - 2.1(A) listen actively, ask relevant questions to clarify information, and answer questions using multi-word responses
  - 2.1(B) follow, restate, and give oral instructions that involve a short, related sequence of actions
  - 2.1(C) share information and ideas that focus on the topic under discussion, speaking clearly at an appropriate pace and using the conventions of language
  - 2.1(D) work collaboratively with others by following agreed-upon rules for discussion, including listening to others, speaking when recognized, making appropriate contributions, and building on the ideas of others
  - 2.1(E) develop social communication such as conversing politely in all situations

- use research skills to plan and present in written, oral, or multimodal formats
  - 2.13(A) generate questions for formal and informal inquiry with adult assistance
  - 2.13(C) identify and gather relevant sources and information to answer the questions
  - 2.13(E) demonstrate understanding of information gathered
  - 2.13(G) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results

Second Grade, Science

- Scientific investigation and reasoning
  - 2.2(A) ask questions about organisms, objects, and events during observations and investigations
  - 2.2(B) plan and conduct descriptive investigations
  - 2.3(B) make predictions based on observable patterns; and

- Matter and energy
  - 2.5(D) combine materials that when put together can do things that they cannot do by themselves such as building a tower or a bridge and justify the selection of those materials based on their physical properties.

- Force, motion, and energy
  - 2.6(B) observe and identify how magnets are used in everyday life
  - 2.6(C) trace and compare patterns of movement of objects such as sliding, rolling, and spinning over time.
Third Grade, Reading/Language Arts

- communicate ideas effectively through speaking and discussion
  - 3.1(A) listen actively, ask relevant questions to clarify information, and make pertinent comments
  - 3.1(B) follow, restate, and give oral instructions that involve a series of related sequences of action
  - 3.1(C) speak coherently about the topic under discussion, employing eye contact, speaking rate, volume, enunciation, and the conventions of language to communicate ideas effectively
  - 3.1(D) work collaboratively with others by following agreed-upon rules, norms, and protocols
  - 3.1(E) develop social communication such as conversing politely in all situations

- use research skills to plan and present in written, oral, or multimodal formats
  - 3.13(A) generate questions on a topic for formal and informal inquiry
  - 3.13(C) identify and gather relevant information from a variety of sources
  - 3.13(E) demonstrate understanding of information gathered
  - 3.13(H) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results

Third Grade, Science

- Force, motion, and energy
  - 3.6(A) explore different forms of energy, including mechanical, light, sound, and thermal in everyday life;
  - 3.6(B) demonstrate and observe how position and motion can be changed by pushing and pulling objects such as swings, balls, and wagons; and
  - 3.6(C) observe forces such as magnetism and gravity acting on objects.

Fourth Grade, Reading/Language Arts

- communicate ideas effectively through speaking and discussion
  - 4.1(A) listen actively, ask relevant questions to clarify information, and make pertinent comments
  - 4.1(B) follow, restate, and give oral instructions that involve a series of related sequences of action
  - 4.1(C) express an opinion supported by accurate information, employing eye contact, speaking rate, volume, enunciation, and the conventions of language to communicate ideas effectively
  - 4.1(D) work collaboratively with others to develop a plan of shared responsibilities
• use research skills to plan and present in written, oral, or multimodal formats
  o 4.13(A) generate and clarify questions on a topic for formal and informal inquiry
  o 4.13(B) develop and follow a research plan with adult assistance
  o 4.13(C) identify and gather relevant information from a variety of sources
  o 4.13(E) demonstrate understanding of information gathered
  o 4.13(H) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results

Fourth Grade, Science
• Force, motion, and energy
  o 4.6(A) differentiate among forms of energy, including mechanical, sound, electrical, light, and thermal;
  o 4.6(B) differentiate between conductors and insulators of thermal and electrical energy;
  o 4.6(C) demonstrate that electricity travels in a closed path, creating an electrical circuit; and
  o 4.6(D) design a descriptive investigation to explore the effect of force on an object such as a push or a pull, gravity, friction, or magnetism.

Fifth Grade, Reading/Language Arts
• communicate ideas effectively through speaking and discussion
  o 5.1(A) listen actively to interpret verbal and nonverbal messages, ask relevant questions, and make pertinent comments
  o 5.1(B) follow, restate, and give oral instructions that include multiple action steps
  o 5.1(C) give an organized presentation employing eye contact, speaking rate, volume, enunciation, natural gestures, and conventions of language to communicate ideas effectively
  o 5.1(D) work collaboratively with others to develop a plan of shared responsibilities

• use research skills to plan and present in written, oral, or multimodal formats
  o 5.13(A) generate and clarify questions on a topic for formal and informal inquiry
  o 5.13(C) identify and gather relevant information from a variety of sources
  o 5.13(E) demonstrate understanding of information gathered
  o 5.13(H) use an appropriate mode of delivery, whether written, oral, or multimodal, to present results
Fifth Grade, Science
  • Force, motion, and energy
    o 5.6(A) explore the uses of energy, including mechanical, light, thermal, electrical, and sound energy;
    o 5.6(B) demonstrate that the flow of electricity in closed circuits can produce light, heat, or sound;
    o 5.6(C) demonstrate that light travels in a straight line until it strikes an object and is reflected or travels through one medium to another and is refracted; and
    o 5.6(D) design a simple experimental investigation that tests the effect of force on an object.

Sixth Grade, Science
  • Force, motion, and energy
    o 6.8(A) compare and contrast potential and kinetic energy
    o 6.8(B) identify and describe the changes in position, direction, and speed of an object when acted upon by unbalanced forces
    o 6.9(C) demonstrate energy transformations such as energy in a flashlight battery changes from chemical energy to electrical energy to light energy