

Textbook Alignment to the Utah 3rd Grade Science Core Curriculum Rubric

Title _____ ISBN# _____			
Publisher: _____			
Name of Person(s) conducting alignment and evaluation: _____			
Overall percentage of coverage of the Utah State Core Curriculum: _____%			
Standard I: Students will understand that the shape of the Earth and the moon are spherical and that Earth rotates on its axis to produce the appearance of the sun and moon moving through the sky.			
Percentage of coverage for Standard I: %			
Objectives	Indicators	If covered, appropriate page #'s	Comments on coverage
Objective 1.1: Describe the appearance of Earth and the moon.	a. Describe the shape of the Earth and the moon as spherical.		
	b. Explain that the sun is the source of light that lights the moon.		
	c. List the differences in the physical appearance of Earth and the moon as viewed from space.		
Objective 2.2: Describe the movement of Earth and the moon apparent	a. Describe the motions of Earth (i.e., the rotation [spinning] of Earth on its		

movement of other bodies through the sky.	axis, the revolution [orbit] of Earth around the sun).		
	b. Use a chart to show that the moon orbits Earth approximately every 28 days.		
	c. Use a model of Earth to demonstrate that Earth rotates on its axis once every 24 hours to produce the night and day cycle.		
	d. Use a model to demonstrate why it seems to a person on Earth that the sun, planets, and stars appear to move across the sky.		

Standard II: Students will understand that organisms depend on living and nonliving things within their environment.

Percentage of coverage for Standard II: %

Objectives	Indicators	If covered, appropriate page #'s	Comments on coverage
Objective 2.1: Classify living and nonliving things in an environment.	a. Identify characteristics of living things (i.e., growth, movement, reproduction).		
	b. Identify characteristics of nonliving things.		
	c. Classify living and nonliving things in an environment.		
Objective 2.2: Describe the interactions between living and nonliving things in a small	a. Identify living and nonliving things in a small environment (e.g., terrarium, aquarium,		

environment.	flowerbed) composed of living and nonliving things.		
	b. Predict the effects of changes in the environment (e.g., temperature, light, moisture) on a living organism		
	c. Observe and record the effect of changes (e.g., temperature, amount of water, light) upon the living organisms and nonliving things in a small-scale environment.		
	d. Compare a small-scale environment to a larger environment (e.g., aquarium to a pond, terrarium to a forest).		
	e. Pose a question about the interaction between living and nonliving things in the environment that could be investigated by observation.		
Standard III: Students will understand the relationship between the force applied to an object and resulting motion of the object.			
Percentage of coverage for Standard III: %			
Objectives	Indicators	If covered, appropriate page #'s	Comments on coverage
Objective 3.1: Demonstrate how forces cause changes in speed or direction of objects.	a. Show that objects at rest will not move unless a force is applied to them.		
	b. Compare the forces of		

	pushing and pulling.		
	c. Investigate how forces applied through simple machines affect the direction and/or amount of resulting force.		
Objective 3.2: Demonstrate that the greater the force applied to an object, the greater the change in speed or direction of the object.	a. Predict and observe what happens when a force is applied to an object (e.g., wind, flowing water).		
	b. Compare and chart the relative effects of a force of the same strength on objects of different weight (e.g., the breeze from a fan will move a piece of paper but may not move a piece of cardboard).		
	c. Compare the relative effects of forces of different strengths on an object (e.g., strong wind affects an object differently than a breeze).		
	d. Conduct a simple investigation to show what happens when objects of various weights collide with one another (e.g., marbles, balls).		
	e. Show how these concepts apply to various activities (e.g., batting a ball, kicking a ball, hitting a golf ball with a golf club) in terms of force, motion, speed,		

	direction, and distance (e.g., slow, fast, hit hard, hit soft).		
Standard IV: Students will understand that objects near Earth are pulled toward Earth by gravity.			
Percentage of coverage for Standard IV: %			
Objectives	Indicators	If covered, appropriate page #'s	Comments on coverage
Objective 4.1: Demonstrate that gravity is a force.	a. Demonstrate that a force is required to overcome gravity.		
	b. Use measurement to demonstrate that heavier objects require more force than lighter ones to overcome gravity.		
Objective 4.2: Describe the effects of gravity on the motion of an object.	a. Compare how the motion of an object rolling up or down a hill changes with the incline of the hill.		
	b. Observe, record, and compare the effect of gravity on several objects in motion (e.g., a thrown ball and a dropped ball falling to Earth).		
	c. Pose questions about gravity and forces.		
Standard V: Students will understand that the sun is the main source of heat and light for things living on Earth. They will also understand that the motion of rubbing objects together may produce heat.			
Percentage of coverage for Standard V: %			
Objectives	Indicators	If covered, appropriate page #'s	Comments on coverage

Objective 5.1: Provide evidence showing that the sun is the source of heat and light for the Earth.	a. Compare temperatures in sunny and shady places.		
	b. Observe and report how sunlight affects plant growth.		
	c. Provide examples of how sunlight affects people and animals by providing heat and light.		
	d. Identify and discuss as a class some misconceptions about heat sources (e.g., clothes do not produce heat, ice cubes do not give off cold).		
Objective 5.2: Demonstrate that mechanical and electrical machines produce heat and sometimes light.	a. Identify and classify mechanical and electrical sources of heat.		
	b. List examples of mechanical or electrical devices that produce light.		
	c. Predict, measure, and graph the temperature changes produced by a variety of mechanical machines and electrical devices while they are operating.		
Objective 5.3: Demonstrate that heat may be produced when objects are rubbed against one another.	a. Identify several examples of how rubbing one object against another produces heat.		
	b. Compare relative differences in the amount of heat given off or force		

	required to move an object over lubricated/non-lubricated surfaces and smooth/rough surfaces (e.g., waterslide with and without water, hands rubbing together with and without lotion).		
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General Rubric

Review Category	High Quality - 3	2	1	0	NA	Comments
Curriculum Content Coverage						
Content matches the standards and objectives of the Utah Core Curriculum.	80% of the Utah Core and objectives are covered. Objectives are clearly stated with measurable outcomes.	70% of the Utah Core and objectives are covered. Objectives are clearly stated with measurable outcomes.	50% of the Utah Core and objectives are covered.	Less than 50% of the Utah Core and objectives are covered		
Content is delivered in an appropriate sequence.	80% of the program content is covered in an appropriate sequence matching the Utah Core.	70% of the program content is covered in an appropriate sequence matching the Utah Core.	50% of the program content is covered in an appropriate sequence matching the Utah Core.	Less than 50% of the program content is covered in an appropriate sequence matching the Utah Core.		
Content is covered with appropriate depth.	The program provides 80% or more of the necessary depth needed for appropriate instruction.	The program provides 70% or less of the necessary depth needed for appropriate instruction.	The program provides 50% or less of the necessary depth needed for appropriate instruction.	The program lacks the necessary depth needed for appropriate instruction.		
Content endorses sound research-based practices.	The program utilizes 80% or more of current	The program utilizes 70% or less of current research-	The program utilizes 50% or less of current research-	The program does not utilize current research-based		

	research-based practices.	based practices.	based practices.	practices.		
Content is presented accurately and in an age-appropriate manner.	Materials reflect current content knowledge without content bias. Materials utilize cross-curricular references and experiences. Materials are age appropriate.	Materials have some content inaccuracies, but do not show content bias. Materials utilize some cross-curricular references. Materials are 70% age appropriate	Materials show many content inaccuracies and some content bias. Materials have very limited cross curricular references. Materials are approximately 50% age appropriate.	Materials have major content inaccuracies. Materials have no cross curricular references. Materials are not age appropriate.		
Content is engaging to the student.	80% or more of the materials and activities are interesting and engaging to the student promoting purposeful learning.	Less than 80% of the materials and activities are interesting and engaging to the student promoting purposeful learning.	50% or less of the materials and activities are interesting and engaging to the student promoting purposeful learning.	Very little, if any, of the materials and activities are interesting and engaging to the student promoting purposeful learning.		
Content is differentiated to meet different abilities and needs.	There are appropriate accommodations for various developmental levels acknowledging prerequisite skills and knowledge.	70% of the program provides appropriate accommodations for various developmental levels acknowledging prerequisite skills and knowledge.	50% of the program provides appropriate accommodations for various developmental levels acknowledging prerequisite skills and knowledge.	There are few or no appropriate accommodations for various developmental levels with little acknowledgment of needed prerequisite skills and knowledge.		
Review Category Physical Qualities	High Quality - 3	2	1	0	NA	Comments
Student materials provide appropriate	Student materials provide appropriate	70% of the student material provides	50% of the student material provides	The student materials lack		

print, illustrations and text features.	use of font, illustrations and text features, (e.g., illustrations, graphs, tables).	appropriate use of font, illustrations and text features, (e.g., illustrations, graphs, tables).	appropriate use of font, illustrations and text features, (e.g., illustrations, graphs, tables).	appropriate use of font, illustrations, and text features, (e.g., illustrations, graphs, tables).		
Student materials provide table of contents, glossary, index, and etc.	Student materials provide necessary table of contents, indices, glossaries, and other references to assist and guide students, parents, and teachers.	Student materials provide some table of contents, indices, glossaries, and other references to assist and guide students, parents, and teachers.	Student materials provide a limited amount of table of contents, indices, glossaries, and other references to assist and guide students, parents, and teachers.	Student materials provide very little, if any, table of contents, indices, glossaries, and other references to assist and guide students, parents, and teachers.		
Student materials are durable.	Student materials are securely bound and reinforced.	Student materials are adequately hardbound.	Student materials have secure bindings.	Student materials have inferior bindings.		
Teacher materials are easy to use.	Teacher materials are well organized with easy to read font and good correlation with student materials.	Teacher materials are organized with easy to read font, and follow correlation with student materials.	Teacher materials are somewhat organized with hard to read font and layout. Materials provide difficult to follow correlation with student materials.	Materials are disorganized with hard to read font for teachers. Layout provides little or no correlation to student materials.		
Teacher material is durable.	Teacher materials are securely bound and reinforced while staying open and flat for teaching.	Teacher materials are adequately hardbound while staying open and flat for teaching	Teacher materials have secure bindings but do not open and lay flat to facilitate teaching.	Teacher materials have inferior bindings but do lay flat to facilitate teaching.		
Review Category Technology Qualities	High Quality - 3	2	1	0	NA	Comments
Technology provided is user friendly.	Program provides menus that are easy to read and follow.	Program provides menus that are generally easy to	Program menus are easy to read. Manuals might have	Menus are not descriptive and hard to follow.		

	Program is user-friendly to install and requires a minimal level of computer expertise. Manuals and directions are understandable.	read and follow. Installation requires little computer expertise. Manuals and directions are simple to understand.	to be read in detail to understand operation of technology, (e.g., laser remote, software). Installation might require some knowledge or expertise. Manuals are included.	Installation requires expertise. No manuals or written instructional materials are provided.		
Technology provided enhances the learning experience.	Technology provided is appropriate giving additional support for student learning.	Technology provided is appropriate giving some additional support for student learning.	Limited technology is provided giving little support for student learning.	No technology is provided.		
Technology has quality audio/visual attributes.	Program provides high quality audio and visual effects.	Program provides good audio and visual effects.	Program audio and visual effects are of poor quality.	No technology is available.		
Review Category Ancillary Materials	High Quality - 3	2	1	0	NA	Comments
Student ancillary materials provide appropriate supplemental instruction.	Program provides high quality student ancillary materials that enhance and supplement the delivery of instruction.	Program provides adequate student ancillary materials to enhance and supplement the delivery of instruction.	Program provides some student ancillary materials that are of limited value to supplement and enhance the delivery of instruction.	The program provides no student ancillary materials or student ancillary materials are of such poor quality and have little correlation to learning objectives that they are of no value.		
Student ancillary materials are easy to access and utilize.	Student ancillary materials are easy to access, are durable and easy to utilize.	Student ancillary materials are easy to access, are somewhat durable	Student ancillary materials are difficult to access and require modification to	Student ancillary materials are of such poor quality or difficult to prepare		

		requiring some modification to utilize.	utilize.	or access that they are of little or no value.		
Parent ancillary materials are appropriate and support desired student learning	Parent ancillary materials are appropriate providing good support for desired student learning through home activities, homework, and practice opportunities.	Parent ancillary materials are appropriate providing adequate support for desired student learning through a variety of opportunities and activities.	Parent ancillary materials are not always appropriate nor do they provide adequate support through a variety of opportunities for student learning.	There are no parent ancillary materials available.		
Review Category Assessment Materials	High Quality - 3	2	1	0	NA	Comments
A variety of assessment options are provided.	Program provides multiple assessment measures to monitor individual student progress at regular intervals.	Program provides some assessment measures to monitor individual student progress at regular intervals.	Program provides limited assessment measures to monitor individual student progress at regular intervals.	Program provides no assessment measures or measures are of such poor quality or correlation to student learning to be of any value.		
Assessment tools are appropriate to inform instruction and are aligned with the program, the Utah Core curriculum, and U-PASS.	Assessment tools are appropriate to inform the major areas of instruction and are aligned with the program and the Utah Core curriculum and U-PASS.	Assessment tools are appropriate to inform some areas of the instructional program and are adequately aligned with the program and the Utah Core curriculum and U-PASS.	Assessment tools are appropriate to inform limited areas of the instructional program and are poorly aligned with the program and the Utah Core curriculum and U-PASS.	Assessment tools are not appropriate to inform areas of the instructional program and are not aligned with the program and the Utah Core curriculum and U-PASS.		

Assessment tools are	Assessment tools are	Assessment tools	Assessment tools are	Assessment tools		
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easily accessible and utilized.	easily accessible with a limited amount of training or expertise.	are accessible with some amount of training or expertise needed.	difficult to access and require extensive training.	are not accessible.		
Category Universal Access	High Quality - 3	2	1	0	NA	Comments
Program content accurately reflects diverse populations.	Program provides ways to adapt curriculum for all students, (e.g., special learning needs, learning disabilities, ELL, and advanced learners).	Program provides some ways to adapt curriculum to meet special learning needs of students.	Program provides limited strategies to assist special learning needs of students.	Program provides no strategies to assist special learning needs of students.		
Program contents provides for the development of healthy attitudes and values.	Program accurately portrays and promotes understanding of cultural, racial, religious and diversity in society.	Program accurately portrays and promotes some understanding of cultural, racial, religious and diversity in society.	Program accurately portrays and promotes a limited understanding of cultural, racial, religious and diversity in society.	Program does not accurately portray or promote an understanding of cultural, racial, religious and diversity in society.		