Science

Grade 11

Scoring Protocol

2017-2018

| Item 1	Option:	A	B	C	Correct	Scoring (0/1)
M - Here are three objects. (Point to answer choices.) Which can you use to send a digital text message: television, pencil, or smartphone?		television	pencil	smartphone	c	
Scoring: 0 = incorrect; 1 = correct						

Item 2	Option:	A	B	C	Correct	Scoring (0/1)
H - This is Ann. (Point to girl in prompt.) Which could she use to email her friends: laptop, radio, or microwave?		laptop	radio	microwave	a	
Scoring: 0 = incorrect; 1 = correct						

Item 3	Option:	A	B	C	Correct	Scoring (0/1)
M - Here are three plants. (Point to plants.) During photosynthesis, plants use light, air, and water to make food. Which of these plants will grow the tallest, the one given: water, soda, or salt?		water	soda	salt	a	
Scoring: 0 = incorrect; 1 = correct						

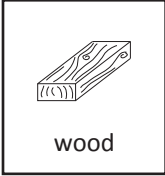| Item 4	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three pictures. (Point to answer choices.) Which gives the Earth light energy: the Sun, apple, or microwave?		Sun	apple	microwave	a	
Scoring: 0 = incorrect; 1 = correct						

Item 5	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a tree. (Point to tree in prompt.) Which animal has adapted to reach the leaves of tall trees: zebra, giraffe, or coyote?		zebra	giraffe	coyote	b	
Scoring: 0 = incorrect; 1 = correct						
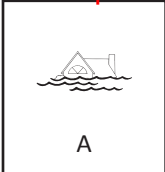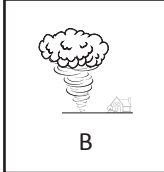
Item 6	Option:	A	B	C	Correct	Scoring (0/1)
L - Here is a gorilla. (Point to gorilla.) Which trait helps the gorilla pick and eat plants: beak, hands, or trunk?		beak	hands	trunk	b	
Scoring: 0 = incorrect; 1 = correct						

Item 7	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three objects. (Point to objects.) Which object is the hardest: wood, strawberry, or sock? *Scoring:* 0 = incorrect; 1 = correct		wood	strawberry	sock	a	
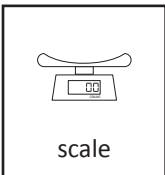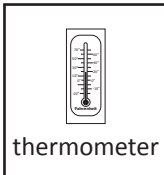
Item 8	Option:	A	B	C	Correct	Scoring (0/1)
M - Here are three natural disasters. (Point to answer choices.) Which shows a flood: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		A	B	C	a	

question omitted

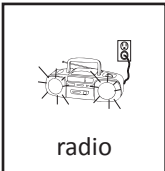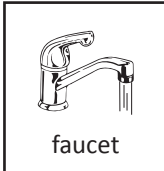| Item 9	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a lake at different times of the year. (Point to prompt.) At which time of the year is the temperature of the lake the coldest: spring, summer, or winter? *Scoring:* 0 = incorrect; 1 = correct		spring	summer	winter	c	

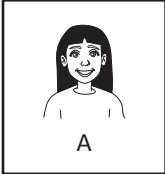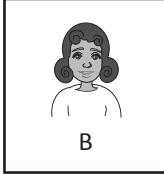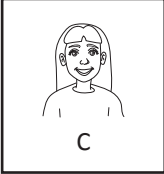| Item 10	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three tools. (Point to answer choices.) Which is used to measure temperature: scale, thermometer, or screwdriver? *Scoring:* 0 = incorrect; 1 = correct		scale	thermometer	screwdriver	b	

Item 11	Option:	A	B	C	Correct	Scoring (0/1)
M - Three schools wanted to help the Earth. Here is a graph showing school recycling. (Point to graph in prompt.) Which school recycled the most trash: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		A	B	C	a	
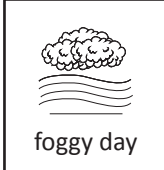
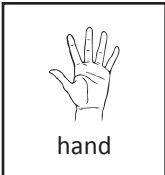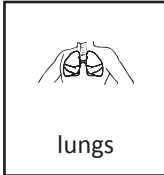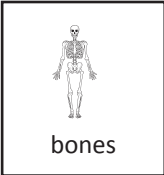| Item 12	Option:	A	B	C	Correct	Scoring (0/1)
H - Here are three pictures. (Point to answer choices.) Which shows electricity being converted to sound energy: radio, faucet, or light bulb? *Scoring:* 0 = incorrect; 1 = correct		radio	faucet	light bulb	a	

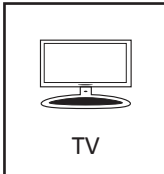| Item 13	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here are two parents. (Point to people.) Which is the parents' likely offspring: A, B, or C?		question omitted A	B	C	b	
Scoring: 0 = incorrect; 1 = correct						

Item 14	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here are three pictures. (Point to answer choices.) Which is a natural disaster that can harm humans and their property: sunny weather, foggy day, or a forest fire? *Scoring:* 0 = incorrect; 1 = correct		sunny weather	foggy day	forest fire	c	

Item 15	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - The respiratory system helps humans breathe. (Point to prompt picture.) Which is part of the respiratory system: hand, lungs, or bones? *Scoring:* 0 = incorrect; 1 = correct		hand	lungs	bones	b	

Item 16	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here is a person who cannot speak out loud. (Point to prompt.) Which technology could help people who cannot speak: book, TV, or talking computer? *Scoring:* 0 = incorrect; 1 = correct		book	TV	"Hello" talking computer	c	

Item 17	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - This oven is transferring heat energy to a pizza. (Point to pizza in oven.) What will happen to the temperature of the pizza, will it get: hotter, colder, or stay the same? *Scoring:* 0 = incorrect; 1 = correct		hotter	colder	stay same	a	

Item 18	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here is a person who cannot see very well. (Point to prompt.) Which technology could help people who cannot see well: radio, hearing aid, or glasses? *Scoring:* 0 = incorrect; 1 = correct		radio	hearing aid	glasses	c	

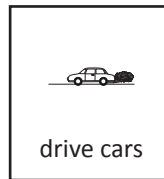| Item 19	Option:	A	B	C	Correct	Scoring (0/1)
H - Megan kicks a soccer ball and it moves 10 meters. (Point to girl in prompt). If Megan kicks the ball with more force, how many meters will the ball probably go: 5, 10, or 15? *Scoring:* 0 = incorrect; 1 = correct		5 meters	10 meters	15 meters	c	

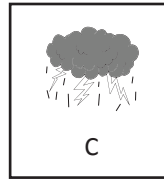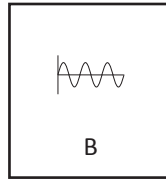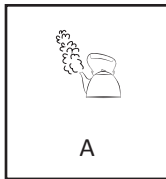| Item 20	Option:	A	B	C	Correct	Scoring (0/1)
M - Here are three activities. (Point to prompt.) What is one way to keep the air clean: ride bicycles, light campfires, or drive cars? *Scoring:* 0 = incorrect; 1 = correct		ride bicycles	light campfires	drive cars	a	

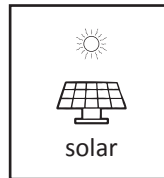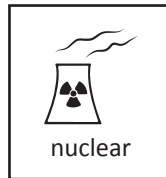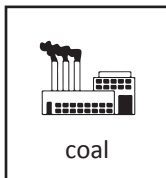| Item 21	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three pictures. (Point to answer choices.) Which shows a sound wave: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		A	B	C	b	

question omitted

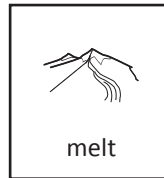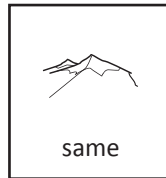| Item 22	Option:	A	B	C	Correct	Scoring (0/1)
H - Oil creates energy, but also pollutes the Earth. (Point to prompt.) Which is an energy resource that creates less pollution: coal, nuclear, or solar? *Scoring:* 0 = incorrect; 1 = correct		coal	nuclear	solar	c	

Item 23	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a mountain covered with snow. (Point to prompt.) When it gets warm outside what will happen to the snow, will it: freeze, stay the same, or melt away? *Scoring:* 0 = incorrect; 1 = correct		freeze	same	melt	c	

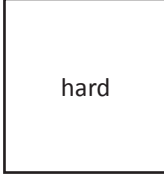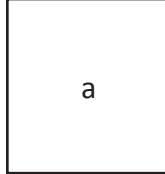| Item 24	Option:	A	B	C	Correct	Scoring (0/1)
H - This is a graph of the amount of food three dogs eat each week. (Point to prompt.) Which dog will likely grow the most: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		A	B	C	c	

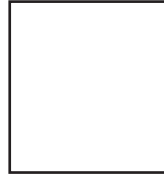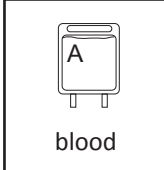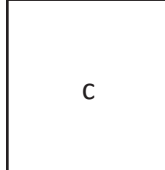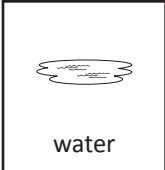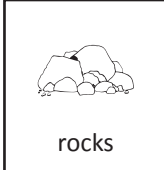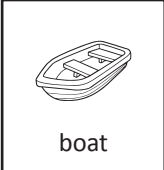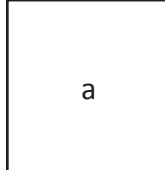| Item 25	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is some yarn and a feather pillow. (Point to the prompt.) Which property do the yarn and pillow share: soft, hard, or metallic?		soft	hard	metallic	a	
Scoring: 0 = incorrect; 1 = correct						
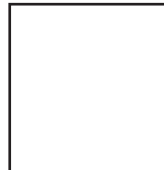
Item 26	Option:	A	B	C	Correct	Scoring (0/1)
H - This is the human skeleton. (Point to prompt.) What is the skeletal system made of: skin, blood, or bones?		skin	blood	bones	c	
Scoring: 0 = incorrect; 1 = correct						

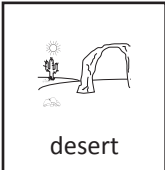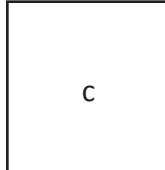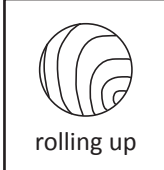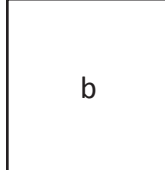| Item 27	Option:	A	B	C	Correct	Scoring (0/1)
L - This is a tiger. (Point to tiger.) What do tigers need to survive: water, rocks, or boat?		water	rocks	boat	a	
Scoring: 0 = incorrect; 1 = correct						
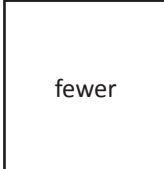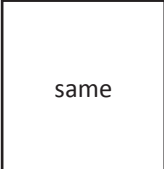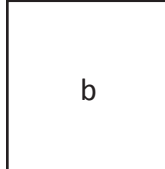
Item 28	Option:	A	B	C	Correct	Scoring (0/1)
H - Here are three places. (Point to prompt.) Which might have been formed by a volcano: a desert, a river, or an island?		desert	river	island	c	
Scoring: 0 = incorrect; 1 = correct						
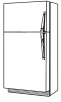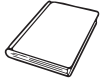
Item 29	Option:	A	B	C	Correct	Scoring (0/1)
L - This is a potato bug. (Point to prompt.) Which helps a potato bug survive: sharp teeth, rolling up in a ball, or long legs?		sharp teeth	rolling up	long legs	b	
Scoring: 0 = incorrect; 1 = correct						

Item 30	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a food chain. (Point to food chain in prompt.) What would happen to the number of foxes if there were no more plants for the rabbits to eat, would there be: more, fewer, or the same number of foxes?		more	fewer	same	b	
Scoring: 0 = incorrect; 1 = correct						

Item 31	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three objects. (Point to answer choices.) Which takes the most force to move: pillow, refrigerator, or book? *Scoring:* 0 = incorrect; 1 = correct		pillow	refrigerator	book	b	

Item 32	Option:	A	B	C	Correct	Scoring (0/1)
H - This is the water cycle. (Point to the prompt.) Which shows liquid water falling to Earth: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		A	B	C	b	

question omitted

Item 33	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three objects. (Point to answer choices.) Natural resources are helpful things that come from the Earth. Which is a natural resource: trees, cars, or plastic? *Scoring:* 0 = incorrect; 1 = correct		trees	cars	plastic	a	

Item 34	Option:	A	B	C	Correct	Scoring (0/1)
H - Here are three pictures. (Point to answer choices.) Which can destroy buildings and vehicles: riding bikes, earthquakes, or driving cars? *Scoring:* 0 = incorrect; 1 = correct		riding bikes	earthquakes	driving cars	b	
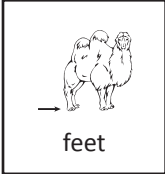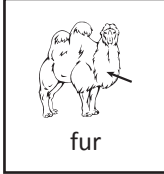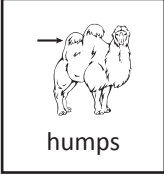
Item 35	Option:	A	B	C	Correct	Scoring (0/1)
H - The International Space Station orbits the Earth. (Point to picture of ISS in prompt.) Which force holds the space station in orbit around the Earth: gravity, wind, or electricity? *Scoring:* 0 = incorrect; 1 = correct		gravity	wind	electricity	a	

Item 36	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is an ice cube tray full of water. (Point to prompt.) If the tray is frozen, how will the mass change, will it be: more, less, or the same? *Scoring:* 0 = incorrect; 1 = correct		more	less	same	c	

Item 37	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - This is a camel. (Point to prompt.) Which adaptation do camels use to store food and water in the desert: feet, fur, or humps? *Scoring:* 0 = incorrect; 1 = correct		feet	fur	humps	c	

Item 38	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - These are melting ice cubes. (Point to prompt.) What type of change does this show: physical, chemical, or no change? *Scoring:* 0 = incorrect; 1 = correct		physical	chemical	no change	a	

Item 39	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here is a brick wall and a stone wall. (Point to prompt.) Which property do the walls share: wooden, metallic, or hard? *Scoring:* 0 = incorrect; 1 = correct		wooden	metallic	hard	c	

Item 40	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
L - This is the Sun, Earth, and Moon. (Point to prompt.) Which orbits the Sun due to gravity: the Earth, stars, or trees? *Scoring:* 0 = incorrect; 1 = correct		Earth	stars	trees	a	
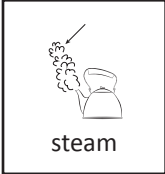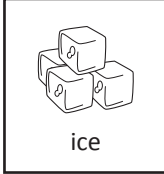
Item 41	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
M - Here are three Earth features. (Point to answers.) Which Earth feature is associated with volcanic eruptions: mountain, stream, or canyon? *Scoring:* 0 = incorrect; 1 = correct		mountain	stream	canyon	a	

Item 42	*Option:*	*A*	*B*	*C*	*Correct*	*Scoring (0/1)*
H - Here is a food chain. (Point to prompt.) What would happen to the number of different hawks if there were no rats: would there be the same, more, or fewer types of hawks? *Scoring:* 0 = incorrect; 1 = correct		same	more	fewer	c	

Item 43	Option:	A	B	C	Correct	Scoring (0/1)
L - Here are three objects. (Point to answer choices.) Which shows water as a vapor: steam, ice, or bicycle? *Scoring:* 0 = incorrect; 1 = correct		steam	ice	bicycle	a	

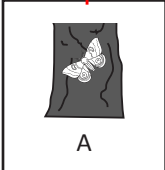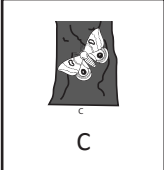| Item 44	Option:	A	B	C	Correct	Scoring (0/1)
M - Here is Raheem and his wagon. (Point to the prompt.) If we add rocks to the wagon, how much force will Raheem need to use to pull his wagon: more, less, or the same? *Scoring:* 0 = incorrect; 1 = correct		more	less	same	a	

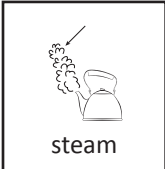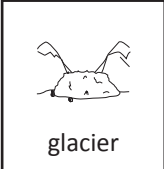| Item 45	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a food chain. (Point to food chain in prompt.) What would happen to the number of foxes if there were no more rabbits, would there be: fewer, more, or the same number of foxes? *Scoring:* 0 = incorrect; 1 = correct		fewer	more	same	a	

Item 46	Option:	A	B	C	Correct	Scoring (0/1)
H - Here is a forest. (Point to the forest.) Many different kinds of animals live in this forest. What would happen to the number of different animals in the forest if the trees were cut down, would there be: more, fewer, or the same kinds of animals? *Scoring:* 0 = incorrect; 1 = correct		more	fewer	same	b	

Item 47	Option:	A	B	C	Correct	Scoring (0/1)
H - These moths have three offspring in the forest. (Point to moths in prompt.) Which offspring would survive the best on trees with dark-colored bark: A, B, or C? *Scoring:* 0 = incorrect; 1 = correct		question omitted A	B	C	b	

Item 48	Option:	A	B	C	Correct	Scoring (0/1)
M - Here are three forms of water. (Point to answer choices.) Which shows water as a solid: steam, lake, or glacier? *Scoring:* 0 = incorrect; 1 = correct		steam	lake	glacier	c	