LINKAGE TABLES FOR GLOBE ACTIVITIES AND NY CITY PERFORMANCE STANDARDS

Atm=Atmosphere; Hyd=Hydrology; Phe=Phenology (seasonal change); GPS=Global Positioning Satellite; Earth Syst=Earth Systems

Table 1: ELEMENTARY SCHOOL LINKAGES

New York City Performance Standards / Related GLOBE Activity		Atm	Soil	Hyd	Phe	Land Cover	GPS	Earth Syst.
S1	**Physical Sciences Concepts**							
S1a	Properties of objects and materials, such as similarities and differences in the size, weight, and color of objects; the ability of materials to react with other substances; and different states of materials		■	■		■		
S1b	Position and motion of objects, such as how the motion of an object can be described by tracing and measuring its position over time; and how sound is produced by vibrating objects							
S1c	Light, heat, electricity, and magnetism, such as the variation of heat and temperature; how light travels in a straight line until it strikes an object or how electrical circuits work	■	■	■	■			■
S2	**Life Sciences Concepts**							
S2a	Characteristics of organisms, such as survival and environmental support; the relationship between structure and function; and variations in behavior					■		
S2b	Life cycles of organisms, such as how inheritance and environment determine the characteristics of an organism, and that all plants and animals have life cycles.				■			■
S2c	Organisms and environments, such as the interdependence of animals and plants in an ecosystem, and populations and their effects on the environment.				■			■
S2d	Change over time, such as evolution and fossil evidence depicting the great diversity of organisms developed over geologic history				■	■		
S3	**Earth and Space Concepts**							
S3a	Properties of Earth materials, such as water and gases; and the properties of rocks and soils, such as texture, color, and ability to retain water	■	■	■	■			■
S3b	Objects in the sky, such as Sun, Moon, planets, and other objects that can be observed and described; and the importance of the Sun to provide the light and heat necessary for survival	■	■	■	■			■
S3c	Changes in Earth and sky, such as changes caused by weathering, volcanism, ….							
S4	**Scientific Connections and Applications**							
S4a	Big ideas and unifying concepts, such as order and organization; models, forms, and function; change and constancy; and cause and effect	■	■	■	■	■		■
S4b	The designed world, such as development of agricultural techniques and the viability of technological designs							

	Table 1: Elementary School Linkages (ctd)	Atm	Soil	Hyd	Phe	Land Cover	GPS	Earth Syst.
S4c	Personal health, such as nutrition, substance abuse, and exercise; germs and toxic							
	substances; personal and environmental safety							
S4d	Science as a human endeavor, such as communication, cooperation, and diverse input in scientific research; and the importance of reason, intellectual honesty, and skepticism	■	■	■	■	■	■	■
S5	**Scientific Thinking**							
S5a	Asks questions about natural phenomena; objects and organisms; and events and discoveries	■	■	■	■	■	■	■
S5b	Uses concepts from Science Standards 1 to 4 to explain a variety of observations and phenomena	■	■	■	■	■	■	■
S5c	Uses evidence from reliable sources to construct explanations	■	■	■	■	■		■
S5d	Evaluates different points of view using relevant experiences, observations, and knowledge; and distinguishes between fact and opinion				■	■		
S5e	Identifies problems; proposes and implements solutions; and evaluates the accuracy, design, and outcomes of investigations				■			■
S5f	Works individually and in teams to collect and share information and ideas	■	■	■	■	■	■	■
S6	**Scientific Tools and Technologies**							
S6a	Uses technology and tools (such as rulers, computers, balances, thermometers, watches, magnifiers, and microscopes) to gather data and extend the senses	■	■	■	■	■	■	
S6b	Collects and analyzes data using concepts and techniques in Mathematics Standard 4, such as average, data displays, graphing, variability, and sampling	■	■	■	■	■	■	■
S6c	Acquires information from multiple sources, such as experimentation and print and non-print sources	■	■	■	■	■		■
S7	**Scientific Communication**							
S7a	Represents data and results in multiple ways, such as numbers, tables, and graphs; drawings, diagrams, and artwork; and technical and creative writing	■	■	■	■	■		■
S7b	Uses facts to support conclusions	■	■	■	■	■		■
S7c	Communicates in a form suited to the purpose and the audience, such as writing instructions that others can follow							
S7d	Critiques written and oral explanations, and uses data to resolve disagreements							

Table 1: Elementary School Linkages (ctd)

S8 Scientific Investigation		Atm	Soil	Hyd	Phe	Land Cover	GPS	Earth Syst.
S8a	An experiment, such as conducting a fair test		■					
S8b	A systematic observation, such as a field study	■	■	■	■	■	■	■
S8c	A design, such as building a model or scientific apparatus	■		■		■		
S8d	Non-experimental research using print and electronic information, such as journals, video, or computers	■	■	■	■	■	■	■