

SIXTH GRADE SCIENCE
Content Outline and Pacing Guide 2009-10

Quarter	SOL #	Topic	*Suggested Timeframe
1	6.1 a-k	I. Scientific Investigation, Reasoning, and Logic <ul style="list-style-type: none"> • Observations • Measurement • Density • Experimental design • Plan and conduct investigations • Data collection, analysis and communication 	9 weeks / ongoing
		Total	9 wks.
2	6.8 a-i 6.3c	II. Interrelationships in Earth/Space Systems <ul style="list-style-type: none"> • Organization of the Solar System • Role of Gravity • Moon phases/ Day-Night • Seasons • Causes and effects of tides • History and technology of space exploration 	9 weeks
		Application of Scientific Investigation, Reasoning, and Logic <ul style="list-style-type: none"> • Observation • Scale models • classification • Measurement 	Integrated
	Total	9 wks.	
3	6.5 a, b, d, e, f, g	III. Earth's Fresh and Salt Water <ul style="list-style-type: none"> • Characteristics of water • Properties and states of water • Origin of water and its occurrence • Importance of water • Water resources • Characteristics of water 	4 weeks
		IV. Weather and Climate <ul style="list-style-type: none"> • Atmosphere • Physical and chemical weathering • Weather maps • Air and Air quality • Motion of the atmosphere • Cloud formation • Weather related phenomena 	5 weeks

	6.1 e-h	Application of Scientific Investigation, Reasoning, and Logic <ul style="list-style-type: none"> • Hypothesis development • Testing predictions • Manipulating variables • Collect, record and analyze data 	Integrated
	Total		9 wks.
4	6.2 a-e 6.3 a-b	V. Energy <ul style="list-style-type: none"> • Potential/kinetic energy • Role of the sun • Non-renewable energy sources • Renewable energy source • Energy transformations • Energy budget 	5 weeks
	6.9 a-d	VI. Resources <ul style="list-style-type: none"> • Management of renewable resources • Management of nonrenewable resources • Conservation • Land use 	4 weeks
	6.1 i-k	Application of Scientific Investigation, Reasoning, and Logic <ul style="list-style-type: none"> • Graphical representation • Models • Reinforce understanding of the nature of science 	Integrated
	Total		9 wks.

2003

Grade Eight Science Test Blueprint Summary Table

Reporting Categories	Number of Items	Grade Six SOL	Life Science SOL	Physical Science SOL
Scientific Investigation	10	6.1a-k	LS.1a-j	PS.1a-n
Force, Motion, Energy, and Matter	15	6.2a, e 6.4a-g 6.5a, b 6.6a		PS.2a-f PS.3 a, b PS.4a-c PS.5a-c PS.6a-c PS.7a-d PS.8a-d PS.9a-c PS.10a-d PS.11a-c
Life Systems*	7		LS.2a-d LS.3a, b LS.4a-c LS.5a-c LS.6a-c LS.13a-g LS.14a	
Ecosystems	7	6.7a-g	LS.7a-d LS.8a, b LS.9a-e LS.10a-c LS.11a-c LS.12a-e	
Earth and Space Systems*	11	6.2b-d 6.3a-e 6.5c-g 6.6b-g 6.8a-i 6.9a-d	LS.14b, c	
SOL Excluded From This Test		None		
Total Number of Operational Items	50			
Field Test Items**	10			
Total Number of Items	60			

*Standards from the Resources strand are incorporated in this Reporting Category.

**These field test items will *not* be used to compute students' scores on the test.