



SciGirls Explore
The Science of Living Things



NEXT GENERATION SCIENCE STANDARDS						COMMON CORE STATE STANDARDS FOR MATHEMATICS			
Grade 5		Grades 6-8				Grade 7		Grade 8	
Life Science	Engineering Design	Life Science		Engineering Design		Expressions & Equations	Statistics & Probability	Statistics & Probability	
5-LS2-1. Develop a model to describe the movement of matter among plants, animals, decomposers, and the environment.	3-5-ETS1-3. Plan and carry out fair tests in which variables are controlled and failure points are considered to identify aspects of a model or prototype can be improved.	MS-LS2-1. Analyze and interpret data to provide evidence for the effects of resource availability on organisms and populations of organisms in an ecosystem.	MS-LS2-3. Develop a model to describe the cycling of matter and flow of energy among living and nonliving parts of an ecosystem.	MS-LS2-5. Evaluate competing design solutions for maintaining biodiversity and ecosystem services.	MS-ETS1-3. Analyze data from tests to determine similarities and differences among several design solutions to identify the best characteristics of each that can be combined into a new solution to better meet the criteria for success.	MS-ETS1-4. Develop a model to generate data for iterative testing and modification of a proposed object, tool, or process such that an optimal design can be achieved.	7.EE.B.3 Solve multi-step real-life and mathematical problems posed with positive and negative rational numbers in any form (whole numbers, fractions, and decimals), using tools strategically.	7.SP.A.1 Understand that statistics can be used to gain information about a population by examining a sample of the population; generalizations about a population from a sample are valid only if the sample is representative of that population.	8.SP.A.1 Construct and interpret scatter plots for bivariate measurement data to investigate patterns of association between two quantities. Describe patterns such as clustering, outliers, positive or negative association, linear association, and nonlinear association.
Multitasking Mania	X					X	X		
Color Code	X					X	X		
Plants Count	X	X	X	X			X		
Breaking Point	X	X	X			X	X	X	
Workin' It Out	X				X	X	X	X	



SciGirls Explore
The Science of Living Things



	COMMON CORE STANDARDS FOR ENGLISH LANGUAGE ARTS & LITERACY IN SCIENCE AND TECHNICAL SUBJECTS				STANDARDS FOR TECHNOLOGICAL LITERACY			
	Grade 5			Grades 6-8	Grades 3-5	Grades 6-8		
	Speaking & Listening			Writing Standards	Relationships Among Technologies and Other Fields	Relationships Among Technologies and Other Fields	Engineering Design	
	SL.5.1 Engage effectively in a range of collaborative discussions with diverse partners on grade 5 topics and texts, building on others' ideas and expressing their own clearly.	SL.5.3 Summarize the points a speaker makes and explain how each claim is supported by reasons and evidence.	SL.5.4 Report on a topic or text or present an opinion, sequencing ideas logically and using appropriate facts and relevant, descriptive details to support main ideas or themes; speak clearly at an understandable pace.	W.6.7 Conduct short research projects to answer a question (including a self-generated question), drawing on several sources and generating additional related, focused questions that allow for multiple avenues of exploration.	Various relationships exist between technology and other fields of study.	A product, system, or environment developed for one setting may be applied to another setting.	Brainstorming is a group problem-solving design process in which each person in the group presents his or her ideas in an open forum.	Design involves a set of steps, which can be performed in different sequences and repeated as necessary
Multitasking Mania	X	X	X	X			X	X
Color Code	X	X	X	X			X	X
Plants Count	X	X	X	X			X	
Breaking Point	X	X	X	X	X	X	X	X
Workin' It Out	X	X	X	X			X	



and PPG Industries Foundation