Computer Science Content Alignment Planning Kindergarten



Integrating the K5 Computer Science Standards Across the Curriculum D L L Beazley 2019 - 2020

VDOE Computer Science Page		All K – 12 th CS Standards PDF		CS SOL Curriculum Framework Draft PDF	
		Algorithms av	nd Programming		
CS Standard	Related Core Cont	ent Area Standard	How could you integrate the CS Standard?		Tools needed to integrate CS standards?
K.1 The student will construct sets of step-by-step instructions (algorithms) either independently or collaboratively including sequencing, emphasizing the beginning, middle, and end. [Related SOL: Math K.13]					
CS Standard	Related Core Cont	ent Area Standard	How could you integra	ate the CS Standard?	Tools needed to integrate CS standards?
K.2 The student will construct programs to accomplish tasks as a means of creative expression using a block based programming language or unplugged activities, either independently or collaboratively, including sequencing, emphasizing the beginning, middle, and end.					
CS Standard	Related Core Cont	ent Area Standard	How could you integra	ate the CS Standard?	Tools needed to integrate CS standards?
K.3 The student will create a design document to illustrate thoughts, ideas, and stories in a sequential (step-by-step) manner (e.g., story map, storyboard, and sequential graphic organizer).					

CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?
K.4 The student will categorize a group of items based on one attribute or the action of each item, with or without a computing device. [Related SOL: Math K.12, Science K.1d]			

Computing Systems				
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?	
K.5 The student will identify components of computing systems (e.g., keyboard, mouse, desktop computer, laptop computer, tablet, and printer).				
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K.6 The student will identify, using accurate terminology, simple hardware and software problems that may occur during use (e.g., app or program is not working as expected, no sound is coming from a device, device will not turn on).				

Cybersecurity					
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?		
K.7 The student will identify what is allowed and what is not allowed at school when using technology.					
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?		
K.8 The student will identify personal information (e.g., address, telephone number, and name) and the importance of protecting personal information online.					
Data and Analysis					
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?		
K.9 The student will gather and display data and organize it in a chart or graph in order to answer questions about the data, with or without a computing device. [Related SOL: HSS K.16]					

Impacts of Computing				
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?	
K.10 The student will identify responsible behaviors associated with using information and technology. [Related SOL: HSS K.10]				
	Networking an	d the Internet		
CS Standard	Related Core Content Area Standard	How could you integrate the CS Standard?	Tools needed to integrate CS standards?	
K.11 The student will discuss, in a whole class setting, how information can be communicated electronically (e.g., email, social media)				