

Grade 8	Min	Max	Grade 8	Min	Max
Physical Science, PE Total = 17	11	15	Discipline - Physical Science	11	15
DCI - Matter and Its Interactions	3	5	Discipline - Life Science	13	15
MS-PS1-1 : Structures of Matter	0	2	Discipline - Earth and Space Science	13	15
MS-PS1-2 : Structures of Matter; Chemical Reactions	0	2	Total OFT Items	40	
MS-PS1-3 : Structures of Matter; Chemical Reactions	0	2	Total EFT Items*	10	
MS-PS1-4 : Structures of Matter; Definitions of Energy	0	2	Total Items	50	
MS-PS1-5 : Chemical Reactions	0	2			
MS-PS1-6 : Chemical Reactions*	0	2			
DCI - Motion and Stability: Forces and Interactions	3	5			
MS-PS2-1 : Forces* and Motion	0	2			
MS-PS2-2 : Forces and Motion	0	2			
MS-PS2-3 : Types of Interactions	0	2			
MS-PS2-4 : Types of Interactions	0	2			
MS-PS2-5: Types of Interactions	0	2			
DCI - Energy	3	5			
MS-PS3-1 : Definitions of Energy	0	2			
MS-PS3-2 : Definitions of Energy	0	2			
MS-PS3-3 : Definitions of Energy; Conservation of Energy & Energy Transfer*	0	2			
MS-PS3-4 : Definitions of Energy; Conservation of Energy & Energy Transfer	0	2			
MS-PS3-5 : Conservation of Energy & Energy Transfer	0	2			
DCI - Waves and Their Applications in Technologies for Information Transfer	2	3			
MS-PS4-1 : Wave Properties	0	2			
MS-PS4-2 : Wave Properties; Electromagnetic Radiation	0	2			
MS-PS4-3 : Information Technologies and Instrumentation	0	2			
Life Science, PE Total = 19	13	15			
DCI - From Molecules to Organisms: Structures and Processes	3	6			
MS-LS1-1 : Structure and Function	0	2			
MS-LS1-2 : Structure and Function	0	2			
MS-LS1-3 : Structure and Function	0	2			
MS-LS1-4 : Growth and Development of Organisms	0	2			
MS-LS1-5 : Growth and Development of Organisms	0	2			
MS-LS1-6: Organization for Matter and Energy Flow in Organisms	0	2			
MS-LS1-7 : Organization for Matter and Energy Flow in Organisms	0	2			
DCI - Ecosystems: Interactions, Energy, and Dynamics	3	5			
MS-LS2-1 : Interdependent Relationships in Ecosystems	0	2			
MS-LS2-2 : Interdependent Relationships in Ecosystems	0	2			
MS-LS2-3: Cycles of Matter and Energy Transfer in Ecosystems	0	2			
MS-LS2-4 : Ecosystem Dynamics, Functioning, and Resilience	0	2			
MS-LS2-5 : Ecosystem Dynamics, Functioning, and Resilience	0	2			
DCI - Hereditary: Inheritance and Variation of Traits	2	3			

*10 EFT items distributed among the three disciplines.

MS based on possibly 3 subscores (could be below/at near/above)
 Could be marker on a line with Meets indicated



MS-LS3-1 : Inheritance of Traits	0	2
MS-LS3-2 : Growth and Development of Organisms; Variation of Traits	0	2
DCI - Biological Evolution: Unity and Diversity	3	5
MS-LS4-1 : Evidence of Common Ancestry and Diversity	0	2
MS-LS4-2 : Evidence of Common Ancestry and Diversity	0	2
MS-LS4-4 : Natural Selection	0	2
MS-LS4-5 : Natural Selection	0	2
MS-LS4-6 : Adaptation; Biodiversity and Humans	0	2
Earth and Space Science, PE Total = 14	12	15
DCI - Earth's Place in the Universe	3	5
MS-ESS1-1 : The Universe and its Stars; Earth and the Solar System	0	2
MS-ESS1-2 : The Universe and Its Stars; Earth and the Solar System	0	2
MS-ESS1-3 : The History of Planet Earth	0	2
DCI - Earth's Systems	3	5
MS-ESS2-1 : Earth Materials and Systems	0	2
MS-ESS2-2 : Earth Materials and Systems	0	2
MS-ESS2-3 : Plate Tectonics and Large-Scale System Interactions	0	2
MS-ESS2-4 : The Roles of Water in Earth's Surface Processes	0	2
MS-ESS2-5 : Weather and Climate	0	2
MS-ESS2-6 : Weather and Climate	0	2
DCI - Earth and Human Activity	3	5
MS-ESS3-1 : Natural Resources	0	2
MS-ESS3-2 : Natural Hazards	0	2
MS-ESS3-3 : Human Impacts on Earth Systems*	0	2
MS-ESS3-4 : Human Impacts on Earth Systems	0	2
MS-ESS3-5 : Global Climate Change	0	2
Total OFT Items	40	40
Total EFT Items*	10	10
Total Items	50	50