

Coloma Community Schools Science Curriculum Summary for 7th Grade

The following benchmarks are to be taught by all 7th grade teachers in the Coloma Community School District. Required assessments are listed. All 7th grade teachers will assess all students using the format and scoring guides (rubrics) specified in the assessment descriptions.

Theme	Standard	Benchmark	Assessment Required
Organization of Living Things (Benchmarks from this theme are taught in the 7th grade Health Class.)	III.2.4 All students will analyze how parts of living things are adapted to carry out specific functions.	Explain how selected systems and processes work together in animals	
	III.3.1 All students will investigate and explain how characteristics of living things are passed on through generations.	Describe how the characteristics of living things are passed on through generations.	
	III.1.2 All students will apply an understanding of cells to the functioning of multicellular organisms, including how cells grow, develop and reproduce	Explain why and how selected specialized cells are needed by plants and animals.	
	III.3.2 All students will explain why organisms within a species are different from one another	Describe how heredity and environment may influence/determine characteristics of an organism	
Matter & Energy	IV.1.2 All students will measure and describe the things around us.	Explain when length, mass, weight, density, area, volume or temperature are appropriate to describe the properties of an object or substance.	Science Project
Electricity & Magnetism	IV.3.3 All students will describe how things around us move, explain why things move as they do, and demonstrate and explain how we control the motion of objects.	Describe the non-contact forces exerted by magnets, electrically charged objects and gravity.	
	IV.1.6 All students will explain how electricity (and Magnetism) interact with matter.	Investigate electrical devices and explain how they work, using instructions and appropriate precautions.	
	IV.1.5 “	Construct simple circuits and explain how they work in terms of the flow of current.	

Waves & Vibrations	IV.4.4 All students will explain shadows, color, and light phenomena	Describe ways in which light interacts with matter.	
	IV.4.5 All students will measure and describe vibrations and waves.	Describe the motion of vibrating objects.	
	IV.4.6 All students will explain how waves and vibrations transfer energy.	Explain how mechanical waves transfer energy.	
Hydrosphere	V.2.2 All students will describe how water moves.	Describe how surface water in Michigan reaches the ocean and returns.	Paw Paw River Watershed
Atmosphere and Weather	V.3.2 – All students will explain what causes different kinds of weather.	Describe the compositions and characteristics of the atmosphere.	
	V.3.3 “	Explain the behavior of water in the atmosphere.	
	V.3.1 All students will investigate and describe what makes up weather and how it changes from day to day, from season to season and over long periods of time.	Explain patterns of changing weather and how they are measured.	
Galaxy and Universe	V. 4. 2 All students will describe and explain how objects in the solar system move.	Describe, compare, and explain the motions of solar system objects.	
	V. 4. 3 “	Describe and explain common observations of the night skies.	
Earth Science (Geosphere)	V.1.2 All students will describe and explain how the earth’s features change over time.	Explain how rocks are formed.	Drifting Continent Theory
	V.1.3 “	Explain how rocks are broken down, how soil is formed and how surface features change	
	V.1.4 “	Explain how rocks and fossils are used to understand the age and geological history of the earth.	

	V.1.5 All students will analyze effects of technology on the earth's surface and resources.	Explain how technology changes the surface of the earth.	
Life Science (Evolution)	III.4.2 All students will compare ways that living organisms are adapted (suited) to survive and reproduce in their environments and explain how species change through time.	Explain how new traits might become established in a population and how species become extinct. (Taught with V.1.4)	
	III.4.1 All students will explain how scientists construct and scientifically test theories concerning the origin of life and evolution of species	Describe how scientific theory traces possible evolutionary relationships among present and past life forms.	