Meeting MISSOURI State Science Standards with eCYBERMISSION

The eCYBERMISSION program gives students the chance to explore how science, technology, engineering, and mathematics work in their world. This emphasis on STEM and a chance for students to engage in inquiry practices makes eCYBERMISSION an excellent addition to your classroom. Below you can find the Missouri state science standards that align with eCYBERMISSION. Also, based on the direction you give your students their specific investigations can meet content standards (not listed here).

From 2015-2016 Missouri Learning Standards

Grade	GLE_Code	GLE_Description
6	a	Formulate testable questions and hypotheses
6	b	Identify and describe the importance of the independent variable, dependent variables, control of constants, and multiple trials to the design of a valid experiment
6	c	Design and conduct a valid experiment
6	d	Evaluate the design of an experiment and make suggestions for reasonable improvements or extensions of an experiment
6	e	Recognize that different kinds of questions suggest different kinds of scientific investigations (e.g., some involve observing and describing objects, organisms, or events; some involve collecting specimens; some involve experiments; some involve making observations in nature; some involve discovery of new objects and phenomena; some involve making models)
6	a	Make qualitative observations using the five senses
6	b	Determine the appropriate tools and techniques to collect data
6	c	Use a variety of tools and equipment to gather data (e.g., microscopes, thermometers, computers, spring scales, balances, magnets, metric rulers, graduated cylinders, stopwatches)
6	d	Measure length to the nearest millimeter, mass to the nearest gram, volume to the nearest milliliter, temperature to the nearest degree Celsius, force (weight) to the nearest Newton, time to the nearest sECd
6	e	Compare amounts/measurements
6	f	Judge whether measurements and computation of quantities are reasonable
6	a	Use quantitative and qualitative data as support for reasonable explanations (conclusions)
6	b	Use data as support for observed patterns and relationships, and to make predictions to be tested
6	c	Determine the possible effects of errors in observations, measurements, and calculations on the formulation of explanations (conclusions)
6	d	Evaluate the reasonableness of an explanation (conclusion)
6	e	Analyze whether evidence (data) and scientific principles support proposed explanations (hypotheses, laws, theories)

6	a	Communicate the procedures and results of investigations and explanations through: oral presentations, drawings and maps, data tables (allowing for the recording and analysis of data relevant to the experiment, such as independent and dependent variables, multiple trials, beginning and ending times or temperatures, derived quantities), graphs (bar, single line, pictograph), writings
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7	f	Acknowledge there is no fixed procedure called “the scientific method”, but some investigations involve systematic observations, carefully collected and relevant evidence, logical reasoning, and imagination in developing hypotheses and other explanations
7	a	Make qualitative observations using the five senses
7	b	Determine the appropriate tools and techniques to collect data
7	c	Use a variety of tools and equipment to gather data (e.g., microscopes, thermometers, analog and digital meters, computers, spring scales, balances, metric rulers, graduated cylinders, stopwatches)
7	d	Measure length to the nearest millimeter, mass to the nearest gram, volume to the nearest milliliter, force (weight) to the nearest Newton, temperature to the nearest degree Celsius, time to the nearest sECd
7	e	Compare amounts/measurements
7	f	Judge whether measurements and computation of quantities are reasonable
7	g	Calculate the range and average/mean of a set of data
7	a	Use quantitative and qualitative data as support for reasonable explanations (conclusions)
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