

Science - a branch of knowledge or study dealing with a body of facts or truths systematically arranged and showing the operation of general laws

Observation – Using one or more senses to gather information and notice what occurs

Inference – A logical explanation of an observation that is drawn from prior knowledge or experience

Hypothesis - An educated guess about the solution to a problem

Prediction – A statement about what will happen next in a sequence of events

Technology – The practical use of scientific knowledge, especially for industrial or commercial use

Scientific Theory – An explanation of observations or events based on knowledge gained from many observations and investigations

Scientific Law – Describes a pattern or an event in nature that is always true

Critical Thinking - disciplined thinking that is clear, rational, open-minded, and informed by evidence

Description - a statement, picture in words, or account that describes; descriptive representation

International System of Units - an internationally accepted coherent system of physical units, derived from the MKSA (meter-kilogram-second-ampere) system, using the meter, kilogram, second, ampere, kelvin, mole, and candela as the basic units (SI units) respectively of the fundamental quantities of length, mass, time, electric current, temperature, amount of substance, and luminous intensity

Accuracy - the extent to which a given measurement agrees with the standard value for that measurement

Precision - the extent to which a given set of measurements of the same sample agree with their mean

Significant Digits - all the nonzero digits of a number and the zeros that are included between them or that are final zeros and signify accuracy

Variable - deviating from the usual type, as a species or a specific character

Dependent Variable – The response that is measured in an experiment

Independent Variable – The factor that is manipulated during an experiment

Constants - not changing or varying; uniform; regular; invariable

X-axis - Also called axis of abscissas. (in a plane Cartesian coordinate system) the axis, usually horizontal, along which the abscissa is measured and from which the ordinate is measured

Y-axis - Also called axis of ordinates. (in a plane Cartesian coordinate system) the axis, usually vertical, along which the ordinate is measured and from which the abscissa is measured