

Technical Term Spotlight Answer Key

Sample Responses

Algorithm (Computer Science):

An *algorithm* is a step-by-step procedure used to solve a problem or complete a task in computing. It functions like a recipe, guiding a computer through a specific sequence of instructions. Algorithms are essential in computer programming because they determine how efficiently software operates. For example, a search engine uses a sorting algorithm to quickly organize millions of web pages by relevance. Understanding algorithms allows programmers to optimize code performance and solve complex data problems logically.

Teacher's Guide

- **Skill Focus:** Students learn to **define and contextualize technical terms** while applying them in **discipline-specific writing**, building both vocabulary precision and academic writing skills.
- **Differentiation Tips:**
 - For struggling writers, provide sentence starters such as "This term means...", "In this field, it is used to...", or "An example of this in real life is...".
 - For advanced learners, encourage comparison of related terms (e.g., *isotope* vs. *ion*) or inclusion of source citations.
- **Engagement Ideas:**
 - Have students pull terms from current events, research articles, or documentaries in their areas of interest.
 - Conduct a "Term Thesis Gallery Walk" where students post and read each other's paragraphs, voting on the clearest explanation.
- **Extension Activities:**
 - Ask students to expand their paragraph into a one-page mini essay with visuals or diagrams illustrating their chosen term.
 - Encourage cross-disciplinary exploration by having students apply one term (like *momentum* or *entropy*) metaphorically to art, history, or social science.