Scientific Research Planner

GENERAL SOLIETAL DECISION MAKING

Goal • Learn to find and use scientific information and refer to sources.

What to Do

- Use the checklist below to help you search for information during a scientific inquiry.
- Share approaches, ideas, or obstacles with a classmate or friend.

Checklist

- 1. Make the assignment manageable.
 - Plan how much time you need to:
 - research the assignment
 - prepare a presentation of your findings and conclusions by the assigned due date.
 - Decide how much research you can do in the time you have available.
 - Make sure your topic can be covered well in the time you have available. If not, consider narrowing your topic to something you can cover.
 - Think about a suitable approach for communicating your results. Look for a technique you can develop in the time allowed.
- 2. Consider what you already know about the topic, and how to learn more about it.
 - List key words for what you already know about this topic. Use a written list, a concept map, flow chart, or other organizer to arrange your key words.
 - List gaps in your knowledge for which you need to find information.
 - Use your key words to search for information in the library, in book indexes, on the Internet, and anywhere else you think you can find information on your topic.
- 3. Research your topic, and record the information you find.
 - When reading or listening to information, decide if the source is authoritative and objective and if the information is facts or opinions. Record your conclusions.
 - Keep detailed notes of information you find, including calculations, diagrams, and the full reference for each source. Get copies of complex diagrams or pictures.
 - Keep a record of your research process and methods, including interviews, Internet searches, library research, personal observations, and other methods.
 - Decide how you want to refer to information in your presentation.
- 4. Prepare to communicate your findings.
 - What method will you use? (Informal or formal written report, computer slide presentation, oral report with multi-media aids or some other method.)
 - Check your presentation for factual accuracy, grammar, spelling, and proper reference to sources.
 - For oral reports, practise making effective use of gestures and multi-media aids.
- 5. Think ahead to your next project. Assess what you did well and how you can improve.
 - Keep track of methods and information sources that worked well for you.
 - Think of ways you could have handled each research step more effectively.
 - List some strategies for doing better at your next scientific research assignment.
 - Check these ideas before starting your next assignment.

