



Involves selecting strategies and resources to move from what is known to what is sought. Students analyze situations, create plans of action and implement solutions. They evaluate alternatives and their consequences. Students approach challenges with creativity, flexibility, and determination.

**Alberta students:**

*Clarify, identify, analyze, explore, create, implement, and evaluate*

**Alberta students value:**

*Resourcefulness, creativity, flexibility, and determination*

**PROBLEM SOLVING INDICATORS:**

- ✓ Identifying what is known and what is required to clarify a problem
- ✓ Exploring problem-solving strategies using relevant information, resources or criteria
- ✓ Assessing options to generate courses of action
- ✓ Evaluating the impact of possible solutions to carry out the most viable option
- ✓ Approaching challenges with creativity, flexibility, and determination

**GUIDING STUDENTS TO DEVELOP PROBLEM SOLVING SKILLS:**

Teachers design learning opportunities in which students ...

- review a situation to identify or clarify a problem to be solved.
- engage with open-ended, student-driven, experiential and meaningful real-world problems.
- gather, sort and apply key information in an insightful manner to solve a problem.
- apply logic and the ability to break complex problems into manageable parts.
- analyze and select from multiple options to arrive at the best solution to a problem.
- creatively think about obstacles to generate a variety of solutions, some of which may be inventive or unconventional.
- approach complex problems with determination and optimism.
- collaborate to generate solutions and adapt known solutions to solve new problems.
- reflect on their problem-solving processes and assess the effectiveness of their chosen strategies and solutions, considering the impact of their own biases and preconceptions.

Source: [www.researchcollaboration.org/uploads/Teacher%20Guide%20-%20Problem-Solving.pdf](http://www.researchcollaboration.org/uploads/Teacher%20Guide%20-%20Problem-Solving.pdf)

