

**ITEC451**  
**Activity 1**  
**(As a group of two or three team members)**

**When an organization's problem is solved, the following seven-step model-building procedure should be followed:**

1. Formulate the Problem
  - ☐ Define the problem.
  - ☐ Specify objectives.
  - ☐ Determine parts of the organization to be studied.
2. Observe the System
  - ☐ Determine parameters affecting the problem.
  - ☐ Collect data to estimate values of the parameters.
3. Formulate a Mathematical Model of the Problem
4. Verify the Model and Use the Model for Prediction
  - ☐ Does the model yield results for values of decision variables not used to develop the model?
  - ☐ What eventualities might cause the model to become invalid?
5. Select a Suitable Alternative
  - ☐ Given a model and a set of alternative solutions, determine which solution best meets the organizations objectives.
6. Present the Results and Conclusion(s) of the Study to the Organization
7. Implement and Evaluate Recommendations