Class Activities

# Chapter 9s: Tools for Analyzing, Designing, and Selecting Processes and Layouts

**Activity 1: Individual Exercise**

Learning objective: Employ tools for process selection, analysis and design

Prepare an example of break-even analysis that involves three processes of various fixed and unit variable costs. Draw two axes on the board with total costs as the vertical axis and production volume as the horizontal axis. Have each student graphs the three total costs lines and determines the range of production volume at which each of the processes would be the most economical. Walk through the whole solution process with the entire class afterwards to reinforce the understanding of using the break-even analysis for process selection.

**Activity 2: Activity for Small Groups**

Learning objective: Employ tools for process selection, analysis and design

Explain the four levels of service blueprint and the four steps involved in creating a service blueprint using a service example. Ask each student in the class to find a service of interest to him/her. Create a service blueprint for the service of his/her choice and share the blueprint with another student. Select several students to explain their blueprint to the whole class.

**Activity 3:** **Activity for Small Groups**

Learning objective: Employ tools for process selection, analysis and design

Have students form into eight groups and assign each group one of the eight tools: assembly drawings, assembly charts, assembly drawings, assembly charts, route sheets, process mapping, value stream mapping, and process simulation. Have each group discuss among one another the key features, purpose, pros and cons of the tool assigned. Present a summary of the group discussion to the whole class.