Class Activities

# Chapter 18: Master Scheduling and Material Requirements Planning

**Activity 1: Individual Exercise**

Learning objective: Compose a master schedule and identify its functions.

Provide students with a problem similar to Example 18.1. Have students keep a record of their process of solving the problem provided, including actual steps, time taken for each step, and a description of each step. Turn in the process analysis at the end of class[[1]](#footnote-1). Look over the analyses for areas where students spend the most time, need clarifications, etc.. Report back to the class the findings of the analyses and go over areas that need clarifications in the next meeting.

**Activity 2: Activity for Small Groups**

Learning objective: Explain the conditions under which MRP is appropriate, its inputs, processing, and outputs, as well as its benefits and limitations.

Have students find three or four students to form a group. Discuss among one another and agree upon a product that the group is going to make. Work with each other in the group to create a product structure tree and a bill of materials (BOM) for the product. Share the work of the group with the rest of the class. Collect the tree and BOM from the group at the end of class.

**Activity 3: Activity for Small Groups**

Learning objective: Explain the conditions under which MRP is appropriate, its inputs, processing, and outputs, as well as its benefits and limitations.

Gather students back to the group formed in activity 2. Return the tree and BOM from activity 2 to each group. Discuss among each other in the group to create an end-item master schedule for the product that the group makes (similar to Table 18.5). Keep a record of the process of generating the level one material requirements plans (MRPs), including actual steps, time taken for each step, and a description of each step. Turn in the end-item aster schedule and MRPs at the end of class1. Look over the group’s work for areas where students spend the most time, need clarifications, etc.. Report back to the class the findings of the analyses and go over areas that need clarifications in the next meeting.

1. Angelo T.A., and Cross, K.P. (1993). Classroom Assessment Techniques: A Handbook for College Teachers, 2nd Edition, Jossey-Bass Publisher, San Francisco, CA. [↑](#footnote-ref-1)