



## Notes – Chapter 11

### Controlling Manufacturing Costs

- I. Types of Cost
  - a. Prime Costs
    - i. DM & DL
    - ii. Standard costing is usually used
  - b. Overhead
    - i. “Bugaboo”
    - ii. Problematic to develop standards
      - 1. “How much electricity should we use?”
      - 2. Not even remotely worth the effort it would take.
    - iii. Flexible Budgeting – The key to overhead control
- II. Static Budgets
  - a. Break costs into variable and fixed.
  - b. Compare budgeted amount to actual amount to find variances.
  - c. Doesn't yield any useful information.
  - d. To do any good, management needs to know what part of the variance is due to a lower activity level and what part is due to higher costs.
  - e. Lower activity levels certainly reduce costs, but that's independent of prices and other (more important) factors.
- III. Flexible Budgets
  - a. Define some activity levels
  - b. Choose an activity measure
    - i. Should pick an input factor rather than an output factor
      - 1. With a single product it doesn't matter.
      - 2. Almost all firms have more than one product, so using some common input makes it easier to do calculations.
    - ii. Avoid dollar-based (or currency-based) factors since prices can change
  - c. Apply cost-per-(factor) to the different activity levels defined earlier
  - d. The advantage is that activity-based and cost-based variances can be separated.
- IV. Overhead Cost Variances
  - a. Variable
    - i.  $\text{Actual Hours} \times \text{Actual Rate}$
    - ii.  $\text{Actual Hours} \times \text{Standard Rate}$
    - iii. Spending Variance
      - 1.  $\text{AH}(\text{AR} - \text{SR})$
      - 2. Results from paying more or less than expected
      - 3. Results from using more or less than expected
    - iv. Efficiency Variance
      - 1.  $\text{SR}(\text{AH} - \text{SH})$
      - 2. Results from a different level of activity.
      - 3. So it has nothing to do with efficiency, that's just its name.
    - v. They look just like MPV and MQV but are interpreted quite differently.
  - b. Fixed
    - i. Apply overhead using a predetermined fixed overhead rate
    - ii.  $\text{PFOHR} = \text{Budgeted Fixed Overhead} / \text{Planned Activity}$
    - iii. Budget Variance
      - 1.  $\text{Actual Overhead} - \text{Fixed Overhead Budget}$
      - 2. This is what's used primarily for control purposes.
    - iv. Volume Variance
      - 1.  $\text{Fixed Overhead Applied} = \text{PFOHR} \times \text{AH}$
      - 2.  $\text{Volume Variance} = \text{Budgeted Overhead} - \text{Applied Overhead}$

- V. Standard Costing & Overhead
  - a. Normal Costing
    - i. DR Manufacturing Overhead actual amount
    - ii. CR Manufacturing Overhead applied amount
    - iii. DR WIP, CR Manufacturing Overhead
  - b. Application to Standard Costing
    - i. Still DR Manufacturing Overhead, CR Expenses
    - ii. DR Manufacturing Overhead (standard allowed hours \* standard rate)  
CR WIP
    - iii. Difference in manufacturing overhead is the sum of Spending, Efficiency, Budget, and Volume variances.
    - iv. Variances are not treated separately (unlike MPV, MQV, LRV, LEV)
    - v. Just do the same as with Normal Costing and move the variance in the Overhead account directly to COGS at the end of the period.
- VI. ABC & Flexible Budgeting
  - a. The chosen volume factor may not reflect how costs should be applied to products.
  - b. Break variable overhead into cost pools just like with Activity-Based Costing.