# **EFFECTIVE COST MANAGEMENT THROUGH INVENTORY CONTROL**

## **Preservation of Acquired Products**

Once the proper products have been received by your program, it is essential that you preserve both the quality and the quantity of the product for your usage. To do so requires you to have storage areas that will secure the product under proper storage conditions. Without proper secure storage facilities, it is likely that you will not get the usage of all the product you purchased for your program. Product "shrinkage" can occur as a result of:

- 1. Product "walking" out your back door with your personnel on their way home
- 2. Production personnel using more of the product than is required in their preparation of menu items resulting in product waste via the trash can or garbage disposal or excessive portion amounts served to clients
- 3. Product spoilage as a result of improper storage conditions or improper inventory management and handling.

There are two categories of products:

- a) those products with a "short" shelf life that should be charged directly to food costs when received (i.e., bread, dairy products, produce, etc.) and
- b) the products with a "long" shelf life which are put into storage. These "long" shelf life products should not be charged to food costs until issued from storage (i.e. canned goods, paper products, staples such as flour, cleaning products, etc.)

When put into storage, these "long" shelf life items, or staples, are entered into inventory and tracked as assets for your program.

Meat, poultry, and fish could fall into either category, depending on how these products are purchased. Fresh items such as pieces of chicken or fish or ground beef cannot be stored for a long period and would need to be charged to food costs when received. However, these same items received as frozen items would be put into inventory and charged to food costs when issued as the frozen products would have a considerably longer shelf life.

### Avoiding the "shrinkage" of fresh items:

To avoid "shrinkage" of the fresh items charged to food costs when received, it is essential that personnel date these products when received and keep the products rotated in storage so that the oldest products are always used first. This rotation helps prevent product spoilage. While items such as a loaf of bread or a head of lettuce don't often "walk out the back door", protein items such as meat, poultry, or fish could "walk" if not carefully monitored. The theft of such items is best deterred by not having excessive amounts on hand, maintaining an inventory of these items even if they have already been charged to food costs and issuing amounts as needed, and by periodically checking personnel leaving the program site - especially if there is reason to believe items are missing from refrigerators. Since your meat, poultry, and fish products are likely to be the most expensive products used for the preparation of your menu items, spending the time necessary to monitor their storage and usage is usually time well spent in your cost management efforts.

#### Avoiding the "shrinkage" of inventoried (dry storage) items:

To avoid "shrinkage" of items put into inventory, the storage areas for these products should be kept locked at all times. Products should be issued from the storage areas only on the basis of a requisition approved by a supervisor or some other person with management authority. When issued from storage, such issue should be recorded on the requisition form. Then the issued items can be charged to food costs on the basis of the issues indicated on the requisition form. A frequent mistake made by many foodservice operations which adds to their food costs is to leave the storeroom open all day long, enabling personnel to go into the storeroom and take items that they want or need at any time. In theory, personnel record the items that they take from the storeroom as they take them; however, many mistakes are made in this "ad hoc" recording with resulting errors in food cost calculations and a lack of accountability for product usage. Or, in a "worst case scenario" employees just take items from the storeroom as they feel they are needed without any effort being made to record issues. Food costs are then presumed to be the cost of the items "missing" from the physical inventory count at the end of the time period.

Products are often used in excess in the production of menu items, resulting in product waste, as personnel often feel little responsibility for controlling the amount of product that they use in their production activities. Of course, unlocked freezers may be an open invitation for personnel to help themselves to expensive meat, fish, or poultry items. While it may seem to be an inconvenience to keep the storeroom locked and only issue products once or twice a day on the basis of completed requisitions, with standardized recipes (to be discussed later) and careful preparation of production estimates, it is usually possible to carefully control product issues and control product costs.

A further consideration that is important for avoiding "shrinkage" in products put into storage is careful product rotation. While poor product rotation may not have the immediate effect on product spoilage as was previously noted for perishable products, all products have a finite "shelf life" and will eventually spoil. Poor product rotation may also result in spoilage from infestation by insects or vermin. Spoilage from infestation can be further discouraged if staples that are purchased in unsealed containers (paper bags, sacks, boxes) are transferred to tight, insect-proof containers when they are purchased and put into storage. In addition to careful product rotation, it is important to have products stored in defined areas by category and not just put anywhere that there seems to be some space in the storeroom. Keeping each product in a designated location in the storeroom and storing like products together facilitates counting the amount of product on hand and helps avoid over-purchasing of products which can lead to both excessive amounts of money invested in inventory and product spoilage if product cannot be used for your menu in a reasonable amount of time.

# Taking appropriate actions to prevent product "shrinkage" through product loss, over-usage, and spoilage is a critical step in maintaining effective cost management.

#### Maintaining Inventory Records and Calculating Inventory Costs:

In today's high technology environment, inventory records are usually maintained on a computer. Products are entered into the computerized inventory when they are received (on the basis of the signed invoices); they are charged out of the computerized inventory when they are issues (on the basis of the completed requisition forms). Thus, at any time, you should be able to see what you have on hand in inventory and the value of that inventory (based on the prices you paid for the products). Effective inventory management, and standard accounting practices, will require you to also periodically take a physical count of your inventory. Usually, this physical inventory is taken monthly. It should be taken by two persons who have no regular access to your storeroom or any of your computerized inventory records.

When the count is completed, the cost of all the items in storage must be calculated and compared to your computerized inventory record. Your accounting personnel will likely have made a decision regarding the method they will use to calculate the value of your physical inventory. Ideally, the method they use will also be the method used when pricing the issues from the storeroom in the computerized inventory system. The most common methods used today are LIFO (Last In First Out), FIFO (First in First Out), and the Latest Purchase Price.

There will almost certainly be a differential between the calculated values of your physical inventory and your computerized inventory since it is generally impossible to make entries in either inventory without at least some error and/or the methods for costing issues/valuing the inventory on hand may be different for the two inventories. If this differential is determined to be insignificant, then an adjustment should be made to your computerized inventory to make the value the same as the value calculated for the physical inventory. If it is deemed significant, then you will need to undertake an investigation to determine what is happening to your products while in storage or if there is a problem with your computerized system. If/when a problem is identified, corrective action needs to be identified and implemented to better secure and manage your inventory. (See discussion of the control process, p. 1 of this handout)

## Your inventory is an investment and an asset of your program and must be treated as such.

Careful management of inventory investment and monitoring the flow of products placed in inventory is required to calculate actual food costs and effectively manage costs.

### Maintaining Proper Storage Conditions to Protect Product Quality:

In addition to proper rotation of all your products while in storage so that the oldest products are used first, product "shrinkage" can be minimized and retention of product quality optimized by maintaining the proper conditions in your storage areas. Such conditions include:

- 1. Not allowing any products to be stored on the floor in any storage areas (not allowed by local health regulations, as well)
- 2. Having shelving in your storeroom, refrigerators, and freezers that allows for air circulation around the stored products
- 3. Maintaining appropriate temperature in all storage areas. Appropriate temperatures are:
  - A. 65 70 degrees F in storage areas for staples (dry stores)
  - B. 34-36 degrees F for fresh meats, produce, and fresh dairy products
  - C. 30 34 degrees F for fresh fish
  - D. minus 10 to zero degrees F for frozen foods.
- 4. Insuring consistent compliance with all local health department regulations regarding storage areas for foods, beverages, and supplies.

# Proper storage conditions must be maintained in all storage areas at all times to maintain product quality and prevent undue costs as a result of product spoilage.

#### **PROGRAM SELF-EVALUATION:**

1. Is your storeroom for staples (dry stores) kept locked at all times? If not, why not? If not, how are you controlling the usage of product from the storeroom? How are you accounting for the cost of that product?

2. Are issues from your storeroom and other controlled storage areas (such as freezers) made on the basis of written requisitions? If not, do personnel write down products on a standard form when they take them from a storage area? How do you know if personnel are always writing down what they take from your storage areas?

3. Are high cost frozen or fresh items (such as meats) kept in a locked facility, inventoried, and only issued on the basis of a written request?

4. How are you tracking and accounting for the use of expensive items, such as meats, fish, or poultry?

5. Are you maintaining a computerized perpetual inventory record? If not, why not?

6. Do you periodically take a thorough physical inventory, calculate the value of that inventory, and compare that value to your computerized inventory value and/or to the value of your food purchases less your calculated food costs?

7. Do you regularly check storage areas to be sure that products are properly rotated so that the oldest products are used first?

8. Do you maintain all storage facilities in accord with your local health regulations (temperatures, shelving, etc.)?