

**COLORADO STATE UNIVERSITY**  
**Financial Procedure Instructions**  
**FPI 2-13**

1. **Procedure Title:** Inventories of Consumables and Merchandise
2. **Procedure Purpose and Effect:** The procedures for inventories of consumable material and merchandise for issue or sale are to ensure complete and accurate inventory data as required by the State of Colorado and Colorado State University.
3. **Application of Procedure:** All merchandise inventories and consumable inventories totaling \$100,000 or more per location must be properly reflected in the University accounts and the annual financial report at June 30. Consumable inventories totaling less than \$100,000 may also be recorded if circumstances dictate. Contact Campus Services in Business & Financial Services (BFS) for information about recording inventories under \$100,000.
4. **Exemptions:** Merchandise and consumables inventories do **not** include items issued from a storage area to a department for use or non-capital materials purchased for direct use or consumption.  
Examples:
  - Wastebaskets, staplers, general office supplies
  - Cylinders of gas or oxygen
  - Janitorial or similar supplies
  - Papers or magazines for non-library use
5. **Definitions:**
  - A. **Consumables:** All goods held for issue or sale, held in a warehouse or storeroom for transfer to the user, and all goods to be consumed as product or service which is to be issued to another department or outside agency. Examples:
    - Electrical, plumbing, custodial, etc., supplies in Facilities Management
    - Pharmaceuticals, medical supplies in medical storerooms
    - Livestock, hay, grain, and straw
  - B. **Valuation:** Recognized market values at June 30<sup>th</sup> may be utilized for pricing at market. Adjustments for unusual conditions or circumstances may be made to recorded book valuations with proper documentation.
6. **Procedure Statement:**
  - A. **Responsibilities** - The department head is responsible for the accuracy and completeness of inventories and for the operation of the inventory system in his/her department.

Safeguarding and segregation of duties: Inventories must be under the physical control of designated individuals who are held responsible for the quantities on hand. Inventories must be kept in storage areas properly safeguarded or controlled to prevent access to materials by unauthorized personnel. A record of keys to the storage areas must be kept. Inventory records must be maintained by individuals who are independent of the stores section personnel. Inventory counts must be verified by persons independent of those in charge of the inventory records.

Record retention and audits: The department responsible for the inventory must retain all records and reports in accordance with FPI 10-1 Record Retention and CSU Financial Policy 10 - Record Retention. Inventory records must be made available upon request for examination by internal, State, and Federal auditors and other authorized personnel.

- B. Inventory Tracking** - Due to the many different types and sizes of inventories and the different facilities and operating requirements of the departments, inventory tracking systems may vary. Campus Services in BFS is responsible for approving departmental inventory tracking systems. Such systems must provide reliable data for preparation of complete and accurate inventory reports.
- C. Inventory Count and Value** - The State of Colorado requires that all inventories recorded in CSU accounts be physically inventoried regardless of dollar amount. Inventories valued at \$100,000 or greater must be counted annually. Inventories less than \$100,000 must be counted at least biannually. Inventories under \$100,000 and not recorded in a university account may be counted for management purposes or at the discretion of Campus Services. Inventory valuation must be based on an actual physical count or from records of a perpetual inventory system that adequately reflects all receipts, issues and adjustments both in the perpetual records and in the general ledger. Estimates of changes in value should be booked in the year a physical count is not taken.

Inventories must be valued at the lower of cost or market. Cost must be based on the "First-In-First-out" (FIFO) method or a reasonable approximation of that method. Alternative methods of inventory cost valuation such as moving-average, weighted-average or retail inventory require approval by the Controller. See Section 8 "Forms and Tools" below for descriptions of inventory cost valuation methods.

The level of non-livestock inventories should not exceed one third of the annual usage. Exceptions will be approved by Campus Services only where it can be demonstrated that higher inventory levels are necessary for effective and efficient operations.

- D. Disposition of obsolete, surplus or damaged inventory** - The inventory system must provide a means of identifying slow moving, obsolete or overstocked items. Obsolete, surplus or damaged items must be removed from stock at least once a year prior to taking and reporting the June 30 inventory.

Central Receiving has responsibility for disposal of all University property which is obsolete, damaged or surplus to a department's needs regardless of the fund concerned or the method of acquisition (purchase, contracts and grants, donation, etc.). No other department is authorized to sell, salvage, donate or destroy such items without prior approval of the Central Receiving.

- E. Establishing New Inventory** - Contact Campus Services for advice and assistance before establishing new inventory of merchandise or consumables.
- F. Maintaining an Inventory Tracking System** - Campus Services has approved all existing inventory tracking systems. If a change in inventory tracking systems is desired, submit a written request to Campus Services for approval by the Controller.

1. **Perpetual inventory accounting system.** Under the perpetual inventory method, items are added or subtracted from the inventory totals immediately upon receipt or removal. This provides a running count of the inventory on hand. Basic records and procedures are outlined below.
  - a) **Inventory record.** Each item of inventory is recorded on some type of stock record card or computerized system. Minimum data includes item description, receipts, issues, quantity-on-hand, unit cost, vendor, and purchase document number.
  - b) **Issue and receipt.** To maintain an audit trail of transactions leading to the last recorded balance, record each issue and receipt, with adequate reference. Include a reference to the document that authorized the transaction. Record and note on the inventory record any items received on consignment, loaned, removed for repair, etc.
  - c) **Inventory verification.** Count and adjust (if necessary) perpetual inventory records at least annually. In the case of high value items and items where physical control is less than desirable, verification should be performed more frequently.
  - d) **Adjustments.** Report net dollar value of adjustments resulting from differences between actual count and perpetual inventory records plus value of items removed from inventory due to damage, spoilage, obsolescence or surplus monthly to Campus Services, or when counted, if verification takes place less frequently. Retain records to permit auditors to verify such adjustments.
2. **Periodic inventory accounting system.** Under the periodic inventory method, items are received and issued without being added to or subtracted from the inventory totals. A physical count is required at June 30<sup>th</sup> to provide the number of items in the inventory.

**G. Valuing inventory.** Inventories are to be recorded at the lower of cost or market.

1. **Value of "goods in process".** Include in inventory any materials processed (but not yet billed) and value to include cost of materials consumed, direct labor and a reasonable allowance for overhead.
2. **Value of farm and livestock inventories.**
  - a) **Farm inventories** - Purchased farm products will be valued at purchase price. Harvested crops on hand at inventory time (but not billed out) will be valued at cost if cost allocation can reasonably be accomplished. Where purchase price or cost allocation data is not available, market value less an estimated cost of delivery from farm to market may be used.
  - b) **Livestock inventories** - Value livestock inventories at the lower of cost or market. Methods described below are applicable to raised livestock, purchased animals raised to maturity, and to the valuation of different classes of animals. Animals purchased within 90 days of fiscal year-end must be included in the inventory at cost. If the purchase cost of animals is unknown, reasonable estimates are acceptable. Animals will be valued per head. At year-end, head count and estimated weight are used for valuation.

**H. Disposing of obsolete, surplus or damaged inventory items.** The methods of disposal, the coordination and approvals required, and the disposition of funds from property sale, depend in many cases on the source of the funds that initially purchased the property. Contact Surplus Property for disposition details. Complete an Equipment Accountability Change Request (EACR) form - <http://cr.colostate.edu/surplus-for-departments.html> for inventory to be disposed. The "type of disposition" is "other".

1. **Adjustment of department inventory records.** If perpetual inventory records are maintained, adjust the applicable inventory records to show the deletion of the items at the time they are released to Surplus Property. The EACR form is the authority to drop the item(s) from inventory. Retain a copy of the EACR as a backup document for a possible audit.
2. **Disposition of money received by Procurement and Contracting Services from sale or salvage.** The proceeds from the sale or salvage of obsolete, surplus or damaged inventory must be credited to the inventory account that originally purchased the inventory. Central Receiving will initiate a CSU deposit receipt crediting the funding shown on the EACR form. The income will be recorded as Other Sales and Services unless other disposition is approved by Campus Services.
3. **Department cost of goods.** The inventory must absorb the difference between the original cost of the items and the proceeds from the disposition. The department will prepare journal entries to delete obsolete, surplus or damaged items from the general ledger. These journal entries must be reviewed and approved by Campus Services.

I. **Verifying Inventory** - Year-end inventory count and valuation must be made as of close of business on June 30<sup>th</sup>. Procedures for verifying inventory can be found at the Business and Financial Services website under Guidelines and Manuals.  
[http://busfin.colostate.edu/Forms/Guides\\_Manuals/Procedures\\_Verifying\\_Inventory.docx](http://busfin.colostate.edu/Forms/Guides_Manuals/Procedures_Verifying_Inventory.docx).

J. **Review of Department Inventory** - Inventory Assets greater than \$100,000 are audited each year, and inventory assets valued less than \$100,000 are counted, at a minimum, biennial. Prior to year end, Campus Services will conduct inventory count verifications to ensure items were counted correctly. Verification reviews will include spot checking counts, verifying item locations, and checking invoices for proper pricing.

## 7. **Reference and Cross-References:**

Record Retention ([CSU Financial Policy](#) Rule 10)

[FPI 10-1 Record Retention](#)

Inventory forms: <http://busfin.colostate.edu/Resources/Forms.aspx>

Procedures for verifying inventory:  
[http://busfin.colostate.edu/Forms/Guides\\_Manuals/Procedures\\_Verifying\\_Inventory.docx](http://busfin.colostate.edu/Forms/Guides_Manuals/Procedures_Verifying_Inventory.docx)

## 8. **Forms and Tools: Cost Valuation Methods**

**First-In First-Out (FIFO) cost method:** A method of inventory valuation in which cost factors are assumed to flow in chronological order with the first item received being the first item issued. The costs remaining in inventory therefore bear close relationship to current replacement prices.

**Average Cost Method of Pricing:** prices items in the inventory on the basis of the average cost of all similar goods available during the period.

**Moving-average price:** A new average price per unit of issue is calculated by adding the cost of purchased items just received to the cost of present inventory (quantity on hand multiplied by present average unit cost) and then dividing the total value by the total number of units now in inventory.

**Weighted-average price:** Total cost of goods available for sale divided by the total number of units available (see example)

**Retail Inventory Method of pricing:** The inventory, priced at retail value, is converted to an estimate of cost by application of markup ratio and other applicable factors.