

PROCESS COSTING

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Comparing Job Costing and Process Costing

Job costing

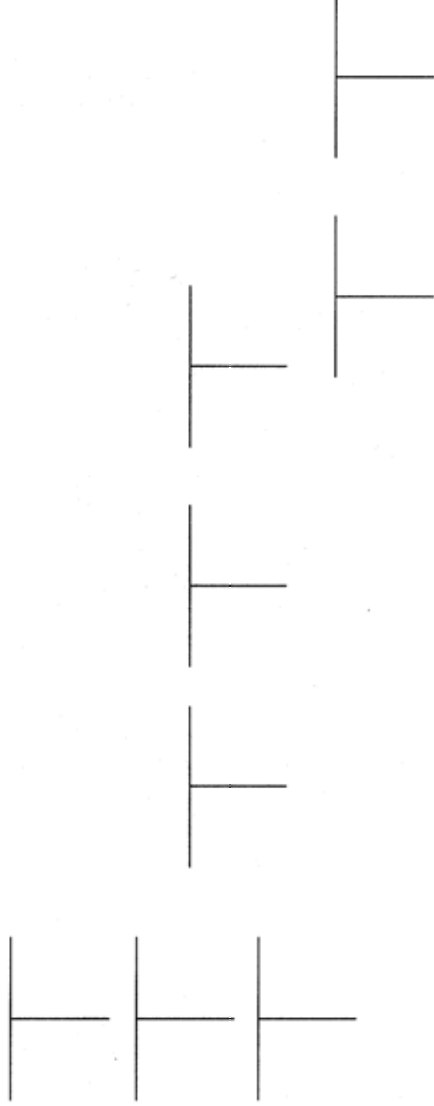
- ❖ Costs accumulated by
- ❖ Work in process has a
- ❖
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Process costing

- ❖ Costs accumulated by
- ❖ Work in process has a
- ❖
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1. Process Costing Flows



2. The Concept of Equivalent Units

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Builder Products, Inc., manufactures a caulking compound that goes through three processing stages prior to completion. Information on work in the first department, Cooking, is given below for May:

Production data:	
Units in process, May 1; 100% complete	
as to materials and 80% complete	
as to labor and overhead	10,000
Units started into production during May	100,000
Units completed and transferred out	95,000
Units in process, May 31; 60% complete	
as to materials and 20% complete	
as to labor and overhead	?

Cost data:	
Work in process inventory, May 1:	
Materials cost	\$ 1,500
Labor cost	1,800
Overhead cost	5,400
Cost added during May:	
Materials cost	154,500
Labor cost	22,700
Overhead cost	68,100

Materials are added at several stages during the cooking process, whereas labor and overhead costs are incurred uniformly. The company uses the weighted-average method.

Prepare a production report for the Cooking Department for May. Use the following three steps in preparing your report:

1. Prepare a quantity schedule and a computation of equivalent units.
2. Compute the costs per equivalent unit for the month.
3. Using the data from (1) and (2) above, prepare a cost reconciliation.

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PROCESS COSTING

Effort % Last Period			Physical Units	Effort % This Period			Equivalent Units		
DM	DL	MOH		DM	DL	MOH	DM	DL	MOH

DM	DL	MOH	WIP Costs \$

Weston Products manufactures an industrial cleaning compound that goes through three processing departments—Grinding, Mixing, and Cooking. All raw materials are introduced at the start of work in the Grinding Department, with conversion costs being incurred evenly throughout the grinding process. The Work in Process T-account for the Grinding Department for a recent month is given below:

Work in Process -- Grinding Department			
Inventory, May 1	21,800		
(18,000 lbs., 1/3 processed)		Completed and Transferred	
		to mixing (_____ lbs.)	<u>?</u>
<u>May costs added:</u>			
Raw materials (167,000 lbs.)	133,400		
Labor and overhead	226,800		
Inventory, May 31	?		
(15,000 lbs., 2/3 processed)			

The May 1 work in process inventory consists of \$14,600 in materials cost and \$7,200 in labor and overhead cost. The company uses the weighted-average method to account for units and costs.

Required: Prepare a production report for the Grinding Department for the month.

PROCESS COSTING

Effort % Last Period			Physical Units	Effort % This Period			Equivalent Units		
DM	DL	MOH		DM	DL	MOH	DM	DL	MOH

DM	DL	MOH	WIP Costs \$

Barker Inc. uses the weighted-average method in its process costing system. The following data concern the operations of the company's first processing department for a recent month.

Work in process, beginning:

Units in process	800
Stage of completion with respect to materials	50%
Stage of completion with respect to conversion	20%
Costs in the beginning inventory:	
Materials cost	\$2,440
Conversion cost	\$4,928

Units started into production during the month	15,000
Units completed and transferred out	15,600

Costs added to production during the month:

Materials cost	\$96,470
Conversion cost	\$476,362

Work in process, ending:

Units in process	200
Stage of completion with respect to materials	50%
Stage of completion with respect to conversion	

Required -- Using the weighted-average method:

- Determine the equivalent units of production for materials and conversion costs.
- Determine the cost per equivalent unit for materials and conversion costs.
- Determine the cost of units transferred out of the department during the month.
- Determine the cost of ending work in process inventory in the department.

PROCESS COSTING

Effort % Last Period			Physical Units	Effort % This Period			Equivalent Units		
DM	DL	MOH		DM	DL	MOH	DM	DL	MOH

DM	DL	MOH	WIP Costs \$

Quantity schedule and equivalent units

	<u>Quantity Schedule</u>
Units to be accounted for:	
Work in process, beginning	800
Started into production	<u>15,000</u>
Total units	<u>15,800</u>

		<u>Equivalent units</u>	
		<u>Materials</u>	<u>Conversion</u>
Units accounted for as follows:			
Transferred to next department	15,600	15,600	15,600
Work in process, ending	<u>200</u>	<u>100</u>	<u>180</u>
Total units	<u>15,800</u>	<u>15,700</u>	<u>15,780</u>

Costs per equivalent unit

	<u>Total Cost</u>	<u>Materials</u>	<u>Conversion</u>
Cost to be accounted for:			
Work in process, beginning ..	\$7,368	\$2,440	\$4,928
Cost added during the month .	<u>\$572,832</u>	<u>\$96,470</u>	<u>\$476,362</u>
Total cost (a)	<u>\$580,200</u>	\$98,910	\$481,290
Equivalent units (above) (b) ..		15,700	15,780
Cost per EU, (a) ÷ (b)		\$6.300	\$30.500
Combined cost per EU	\$36.800		

Cost reconciliation:

	<u>Total Cost</u>	<u>Equivalent Units (above)</u>	
		<u>Materials</u>	<u>Conversion</u>
Cost accounted for as follows:			
Transferred out	\$574,080	15,600	15,600
Work in process, ending:			
Materials	\$630	100	
Conversion	<u>\$5,490</u>		180
Total work in process, ending .	<u>\$6,120</u>		
Total cost	<u>\$580,200</u>		