

# Heffelfinger Electronics

Olga Bonemarrow was hired as chief executive officer (CEO) in late November by the board of directors of Heffelfinger Electronics, a company that produces a state-of-the-art CD-ROM drive for personal computers. The previous CEO had been fired by the board due to a series of questionable business practices, including prematurely recording revenues on products that had not yet been shipped to customers.

Olga felt that her first priority on the job was to restore employee morale – which had suffered during the previous CEO’s reign. She was particularly anxious to build a sense of trust between herself and the company’s employees. Her second priority was to prepare the budget for the coming year, which the board of directors wanted to review in their December 15 meeting.

After hammering out the details in meetings with key managers, Olga was able to put together a budget that she felt the company could realistically meet during the coming year. That budget appears below:

## **Basic Budget Data**

Units in beginning inventory .....	0
Units produced.....	200,000
Units sold.....	200,000
Units in ending inventory .....	0
Variable costs per unit:	
Direct materials.....	\$ 50
Direct labor .....	40
Variable manufacturing overhead.....	20
Variable selling and administrative .....	<u>10</u>
Total variable cost per unit .....	<u>\$120</u>
Fixed costs:	
Fixed manufacturing overhead .....	\$ 8,400,000
Fixed selling and administrative.....	<u>3,600,000</u>
Total fixed costs.....	<u>\$12,000,000</u>

**HEFFELFINGER ELECTRONICS  
Budgeted Income Statement  
(Absorption Costing Method)**

Sales (200,000 units) .....		\$40,000,000
Cost of goods sold:		
Beginning inventory .....	\$	0
Add cost of goods manufactured (200,000 x \$152 per unit) .....		<u>30,400,000</u>
Goods available for sale.....	30,400,000	
Less ending inventory.....	<u>0</u>	<u>30,400,000</u>
Gross margin.....		9,600,000
Less selling and administrative expenses:		
Variable selling and administrative .....	2,000,000	
Fixed selling and administrative.....	<u>3,600,000</u>	<u>5,600,000</u>
Net operating income.....		<u>\$ 4,000,000</u>

While the board of directors did not oppose the budget, they made it clear that the budget was not as ambitious as they had hoped. The most influential member of the board stated that “managers should have to really stretch to meet profit goals.” After some discussion, the board decided to set a profit goal of \$4,800,000 for the coming year. To provide strong incentives and a win-win situation, the board agreed to pay out bonuses to top managers of \$200,000 if this profit goal were met. Olga’s share of the bonus pool would be \$50,000. The bonus would be all-or-nothing. If actual net operating income turned out to be \$4,800,000 or more, the bonus would be paid. Otherwise, no bonus would be allowed.

QUESTION #1: How many units must be sold to meet the revised profit goal, assuming production equals sales?

Unfortunately, by October of the next year, it had become clear that the company would not be able to make the \$4,800,000 target profit. In fact, it looked like the company would wind up the year as originally planned, with sales of 200,000 units, no ending inventories, and a profit of \$4,000,000.

Several managers who were reluctant to lose their year-end bonuses approached Olga and suggested that the company could still show a profit of \$4,800,000. (These managers had graduated from Missouri State University in Springfield, Missouri and remembered something they learned in a cost accounting course they had taken there.) The managers argued that at the present rate of sales, there was enough capacity to produce tens of thousands of additional CD-ROM drives for the warehouse.

QUESTION #2: If sales are 200,000 units for the year and the selling price and cost structure remain the same, how many units would have to be produced to show a profit of at least \$4,800,000 under absorption costing?