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## **The Implementation of Activity-Based Costing Method in Determining Selling Prices**

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**Abstrak.** Penelitian ini bertujuan untuk mengetahui perbedaan perhitungan antara Harga Pokok Produksi Sepatu menggunakan metode tradisional dengan metode *Activity-Based Costing*. Penelitian dilakukan pada 5 industri Sepatu di Sentra Industri Sepatu Cibaduyut Kota Bandung dengan metode pengumpulan data menggunakan teknik observasi, wawancara, dan dokumentasi. Jumlah populasi sebanyak 76 industri dan metode penentuan sampel menggunakan teknik *purposive sampling*. Teknik analisis yang digunakan dalam penelitian ini adalah analisis beda dua rata-rata. Hasil dari penelitian ini menunjukkan bahwa terdapat perbedaan yang signifikan antara Harga Pokok Produksi sepatu metode tradisional dengan *Activity-Based Costing*. Setelah menerapkan metode penentuan biaya dengan metode tersebut, Harga Pokok Produksi adanya perbedaan yang cukup signifikan sehingga penentuan harga jual yang salah. Karena menetapkan harga jual dengan melakukan mark-up untuk menutupi biaya produksi. Penentuan harga jual dengan cara ini menyebabkan harga jual yang terlalu rendah, sehingga tidak dapat mengoptimalkan laba

**Kata Kunci.** activity-based costing; harga pokok produksi; harga jual.

**Abstract.** *This study aims to find out the difference between the calculation of shoe production cost using the traditional method as compared to that using the Activity-Based Costing method. The research was conducted on five shoes industries in the Shoes Industry Center in Cibaduyut Bandung, using such data collecting method as observation, interview and documentation studies. The population comprises of 76 industries, and the method used for determining the sample is purposive sampling technique. The analytical technique used in this study is the analysis of two different averages. The results of this study indicate that there is a significant difference between the shoe production cost calculated using the traditional method and that calculated using the Activity-Based Costing method. After applying the latter cost determining method, there turned out to be a significant difference in the shoe production cost resulted from the inaccurate price calculation in the former method, as here a selling price is fixed by marking-up efforts aiming to cover the production cost. Determining a selling price in this way causes the selling price to be too low; thus it cannot optimize the profit.*

**Keywords:** activity-based costing; production cost; selling price

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## INTRODUCTION

The development of the economic sector done by the Indonesian Government today aims to improve all Indonesian people's standard of living and welfare, especially to catch up with those of other countries'. To realize this very noble goal, of course the development of economic sector needs to be directed to improve people's business ability, especially that of weak economic entrepreneurs. As we know Micro Small and Medium Enterprises (MSMEs) have a strategic role in supporting the national economic development. MSMEs have proven able to contribute significantly in spurring the economic growth and providing employment opportunities to reduce unemployment and distribute development outcomes.

One success key for MSMEs is the availability of a clear market for MSME products (Lisnawati, 2012), such as the footwear industry or shoe and sandal industry. Most modern societies use footwear as a necessity in everyday life, whether shoes or sandals whose main purpose is to protect the health of the feet. The development of intercultural relationships also makes the footwear products to serve as an ever-evolving fashion with different kinds of models suitable for each time of the era.

Cibaduyut Shoes Industries Center is one of the local economic potential in Bandung that has qualities to be of national and international standard. As time goes by, the existence of Cibaduyut Shoe Industries is currently in a stagnant state, while the number of tourists or visitors visiting the Cibaduyut shopping or trade area stay stagnant as shown in Table 1.

Table 1. The Economic Potential of Cibaduyut Shoe Industries Center

Potential	2006	2007	2008	2009	2010	2011	2012
Business Units	828	847	867	844	840	834	828
Work Force (People)	3.498	3.516	3.613	3.590	3.570	3.390	2.719
Annual Production (Ps)	3.310.800	4.546.300	4.952.780	4.091.200	4.091.200	4.081.375	4.046.700
Investment (Thousand Rp.)	14.507.160	14.507.168	14.669.123	23.970.675	28.970.565	26.970.555	23.720.675
Production Value (Thousand Rp.)	355.381.200	487.999.750	529.921.900	651.803.907	721.803.815	711.803.835	641.803.854

Source: Footwear/Shoe SMIs Development Office, 2012

Meanwhile, the fundamental weakness possessed by shoe and sandal industry entrepreneurs and other SMEs in Cibaduyut shoe industrial area is their low ability to calculate production costs. This will certainly lead to low ability of setting correct selling prices. Mistakes in calculating costs of manufactured goods lead to mistakes in determining selling prices and this in turn leads to the possibility that the selling prices will be too high or too low. Both possibilities may result in unfavorable circumstances for the companies. Over-pricing actually brings about bad image to the companies, which may make it difficult for their products to compete with similar products in the market. On the contrary, if the products are underpriced this will cause lower profits gained by the

companies.

According to Dicky and Martusa (2011) the inclusion of every incurred production cost in determining a product unit cost using a certain method can help management obtain information about the production cost of a single product unit more accurately. In management accounting, this method is called the Activity-Based Costing (ABC) method. Activity-Based Costing (ABC) method calculates each cost of every activity with different allocation basis for every activity. Not many companies in Indonesia have adopted this method in calculating the production cost incurred for each product. Ordinarily the method used by companies in Indonesia is the generalization of cost for each product. Yet each of these products, in fact,

does not use the same amount of resources. Generalization of costs may lead to fixing a production cost too low or too high. Companies whose products are underpriced may actually make sales which result in losses, even if the company considers the sale of the product to be profitable. So the sales bring revenue which is below the cost of resources used. While companies whose products are over-priced may lose competitiveness against similar products manufactured by other companies. Considering the above description it becomes clear that the right selling price is very important to prevent customers from turning away to other sellers. This can be overcome by carefully determining the production costs and the the right selling prices of the goods. That is why shoe and sandal industry entrepreneurs need to be equipped with the ability to calculate their production costs correctly to eventually set the right selling prices.

### STATEMENTS OF THE PROBLEMS

Production cost will be calculated in this research using the Activity-Based Costing Method with several research variables, such as activities, resources, cost objects, cost pools, cost elements, and cost drivers. The formulation of the problem in this study is based on the description stated in the background, thus the research problems are formulated as follows: (1) How is the production cost determined in the Cibaduyut Shoe Industries Center, which has not applied the Activity-Based Costing Method?, (2) How is the percentage of non-unit based costs significant with the overhead cost?, (3) How does each product absorb various unit and non-unit activities?.

### LITERARY REVIEW

#### *Cost*

Carter and Usri (2006: 29) defines cost as the exchange rate, expenditure, sacrifice to gain benefit. In financial accounting, expenditures or sacrifices at the time of acquisition are represented by current or future depreciation

in the form of cash or other assets. According to Widilestariningtyas, et al (2012: 2) cost has a different meaning from expense; the two cannot be exchanged. Mulyadi (2010: 22) reveals that cost is an object processed by cost accounting.

In a broad sense, cost is the sacrifice of economic resources, measured in units of money, which have occurred or are likely to occur for a particular purpose. Cost is cash or cash equivalent value sacrificed to obtain expected goods or services to provide current or future benefits for the organization (Hansen and Mowen, 2009: 47). Costs are divided into either fixed costs or variables related to changes in the volume of manufactured products (Hansen and Mowen 2009). Volume also relates to units produced, such as direct labor hours or machine working hours, and is the only reason for the emergence of costs that are considered important. The things that drive costs based on this unit are used for allocating unit-driven activities to charge the cost object.

#### *Factory Overhead Costs*

Basically, factory overhead costs can be defined as indirect resources, indirect labors, and all other factory costs which cannot be conveniently identified or charged directly to specific orders, products or other cost objects, according to Carter and Usri (2006: 29).

Warindrani (2006: 27) defines two stages of overhead charging with ABC method, that is: (1) Overhead costs which are charged over activities. In this stage, five steps are conducted, that is: (a) Identifying activities. (b) Defining costs in relation to each activity. (c) Grouping similar activities together.

Activities are identified and put into four groups, namely: 1. Unit level activities. 2. Batch level activities. 3. Product sustaining activities. 4. Facility sustaining activities. (d) Combining costs of grouped activities. (e) Calculating tariff per activity group (homogeneous cost pool rate). (2) Charging activities costs onto the product. After the tariff of each activity group is known, calculation can be done to find out the

overhead cost charge onto the product, as follows:

$$\text{Overhead charged} = \frac{\text{Group Tariff} \times \text{Sum of Consumption per product}}{\text{Sum of Consumption per product}}$$

### ***Production Cost***

Garrison (2009) defines that Production Cost is the manufacturing cost related to goods completed within a certain period. With the description it is clear that calculating the correct production cost is very important for the company. Therefore, the company should first know the production cost of the goods before they can sell the products.

### ***Costing Calculation with Activity System***

Blocher, et al (2011: 206) describes that the ABC System is a way to determine how many resources are specified for a cost object, such as a service, as well as the book-closing done every month. Some companies mention this activity as a business or infrastructure support activity. Customers, and based on the activities undertaken for production. This system can overcome the distortion of determining production cost of goods manufactured calculated by the cost accounting system that has been previously applied.

### ***Activities Classification***

Blocher, at al (2011:210) classifies activities in the Activity-Based Costing Sytem as follows: (1) Unit-level activity is performed on each unit of a company's product or service. Examples of unit level activities include direct ingredients, direct labor hours, and component input as well as inspection of each unit. Unit-level activity is an activity by volume. The activities required vary in proportion to the number of cost objects. Cost drivers for resource consumption and cost drivers for activity consumption tend to be similar to unit-level activities. (2) Batch-level activity is performed on every batch or group of product or service units. Examples of batch-level activities are machine preparation, purchase order arrangement, production scheduling, batch inspection, raw material

handling, and production process acceleration. (3) Product level activity supports the production process of a specific product or service. Examples of product level activities include product design, parts purchases required by the product, and engagement in engineering changes to modify the product. (4) The facility-level activity supports general operations. This activity is not caused by product or customer service needs and can not be traced to a single unit, batch, or product. Examples of facility-level activities include the provision of security to maintain factory machines with general functions, plant management, payment of building taxes and factory insurance.

### ***Stages of Implementing Activity-Based Costing System***

The implementation of ABC according to Hansen and Mowen (2009:323) is as follows: (a) Initial Framework Determining. Production Cost based on activities has 4 (four) steps as follows: (1) Grouping various activities. Various activities are divided into groups that have some easily recognizable physical features and parts of the production process that can be classified or classified into general activities, unit level, batch, product, and facility.oleh pemicu biaya tunggal. Jadi suatu kelompok biaya yang homogen memiliki hubungan sebab akibat yang sama. Aktivitas- aktivitas tidak langsung harus memiliki korelasi secara masuk akal dan mempunyai rasio konsumsi pemakaian yang sama untuk seluruh produk. (2) Finding Relations between costs and activities. This step is done by finding out various costs that occur and then relating between the costs followed by the activities that trigger costs. (3) Classifying the same group costs. Homogeneous group cost is similar kinds of costs put into a group in which the costs can be caused by a single cost trigger. Thus a homogeneous cost group has the same causal relationship. The activities do not necessarily have direct correlation reasonably and have the same consumption usage ratio for all products. (4) Determining FOH group tariffs for a group of activities in which each group has a strong causal relationship. Group rates can be calculated by this formula:

$$\text{Pool Rate} = \frac{\text{Total overhead cost by activity group}}{\text{Activity group calculation base}}$$

Source: Hansen and Mowen, (2009)

(b) Second Framework. In this step, the cost of each group of overhead costs can be known for different types of products. This is done using the previously calculated pool rate consumed by each product. So the overhead selected from each class of cost of each product is calculated by using the formula:

$$\text{Fixed Overhead} = \text{pool rate} \times \text{usage}$$

Source: Hansen and Mowen, (2009)

### **Cost Driver**

Blocher (2011: 205) argues that cost drivers are something that leads to changes in the cost of various behaviors, because cost drivers are the cause or relation to changes in the amount of costs, in which the amount of costs that are changed and can be measured or calculated is a very good basis for determining cost to the cost object.

### **Advantages and Disadvantages of Activity-Based Costing System**

Rayburn (1999:154) states that the advantages are: (1) Improvement on the distortion found in the old system based on the provision of stages that only use the movers made by volume. (2) Companies with high indirect costs, diverse products, and various batch sizes of production operations are likely to benefit. This system generates a lot of information about the activities and resources that management needs to carry out these activities. (3) ABC information can help companies know and evaluate which activities are not important and can be lost. The disadvantages of Activity System according to Blocher, at all (2011:217) are: (a) Cost Allocation. Not all costs have the driving force of proper or non-duplicate consumption of resources or activities. A certain amount of costs may be allocated to products or departments according to a strong production unit because no real action can be found that may cause the cost. (b) Ignoring costs. The cost of a product or service that the ABC system identifies tends to not cover all costs

associated with that product or service. The cost of a product or service typically excludes costs for activities such as marketing, advertising, research, development, and product engineering. Although some of these costs can be traced to a product or service. Product costs do not include these costs because the generally accepted accounting principles for financial reporting require those costs to be treated as periodic costs. (c) Expensive and time consuming. The ABC system is not cheap and takes time to develop and implement. For companies and organizations that have used traditional cost calculation system based on volume, implementing a new ABC system tends to be very expensive. Moreover, like most innovative accounting and management systems, it usually takes a year or more to develop and implement ABC successfully.

### **Comparison between Traditional Product Cost and ABC Method**

The ABC method considers that overhead costs can be traced adequately to individual products. The cost incurred by the cost driver based on the unit is the cost that in the traditional method is referred to as variable cost.

The ABC method improves the accuracy of the cost of product cost calculation by recognizing that much of the overhead costs still vary in proportion to change other than by volume of production. By understanding what causes these costs to increase and decrease, these costs can be traced to each product. This causal relationship allows managers to improve the accuracy of product cost calculations that can significantly improve decision making (Hansen and Mowen, 2009).

### **Selling Price Determination Method**

Company policy in determining the selling price becomes one of the important factors in order to obtain profit in accordance with what is expected. The approach typically used to determine the selling price is to add a predicted profit (markup) to the cost of goods.

Product markup is the difference between the selling price (Krismiaji & Aryani, 2012: 17). The way the calculation as follows:

$$\text{Selling Price} = \text{Cost} + (\text{markup Percentage} \times \text{cost})$$

Source: Garrison (2009:531)

## RESEARCH METHODOLOGY

This research uses the descriptive research method and case study approach. A descriptive research according to Wiratha (2006: 154) is a study related to collected data aiming to tell something or affirm a phenomenon, a symptom, a concept, and also to answer questions related to the current status of research subjects, such as treatment or opinion of the individual, organization and so on. The Wiratha case study (2006: 144) is an in-depth study of a particular case whose outcome is a complete and organized picture of the subject.

### *Venue and Time of Research*

This research has been done in the location of Cibaduyut shoe industry center on Jl. Cibaduyut Bandung, along the corridor of Jl. Komp. TVRI until Jl. Soekarno Hatta, belonging to the administrative area of Cibaduyut Wetan Regency, Cibaduyut Kidul Urban-Village, Cibaduyut Urban-Village, and Bojong Loa Kidul Urban-Village. The study has been planned to take one year's time.

### *Sampel Determination*

The samples taken are shoe and sandal industries in the Cibaduyut Shoe industries Center in Bandung. The research was conducted by survey method with convenience sample selection. The reason for

using this approach is its simplicity and flexibility.

The number of samples is determined with a consideration that the exact number of population is unknown, so the number of samples is decided to be as many as five companies which have not used the Activity-Based Costing (ABC) method in calculating their Production Cost and Selling Price. It is expected that this number may represent the population.

## FINDINGS

These are the five shoe companies that become the objects of this research: (1) "Danniel" Shoe Workshop. (2) "Pepen" Shoe Workshop. (3) "Ko Akin" Shoe Workshop. (4) "Mamat" Shoe Workshop. (5) "Fanlung" Shoe Workshop.

The five companies are individual companies engaged in Home Footwear industries producing various types and models of Men's Loafers Shoes and Men's Casual Shoes. The products are finished products manufactured to meet consumers demand. The raw materials are leather with various shades and colors. In addition to the main raw materials, the production process is also supported by equipment and tools to support production activities such as pressing machines, sewing machines, coating materials, shoe accessories, adhesives, yarns, needles, and others.

To further analyze, below are the data collected for calculating production costs in the Cibaduyut Shoe Industries Center in July 2017 to produce Men's Loafers and Casual Shoes. The data are as follows:

Table 2. Total of Production and Machine Working Hours in July 2017

Types of Products	Total of Production (Unit)	Machine Working Hours (Hour)
Men's Loafers Shoes	3.059	917
Men's Casual Shoes	2.987	895
TOTAL	6.046	1.812

Table 3. Raw Material Cost

Types of Products	Total Cost (Rp)
Men's Loafers Shoes	75.226.800
Men's Casual Shoes	73.455.600

TOTAL	148.682.400
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Table 4. Direct Labors Cost

Types of Products	Total Cost (Rp)
Men's Loafers Shoes	33.026.400
Men's Casual Shoes	32.248.800
TOTAL	65.275.200

Table 5. Factory Overhead Cost

Types of Costs	Total Cost (Rp)
Cost of Supporting Material	3.830.313
Cost of Indirect Labor	22.434.688
Cost of Utility (Electricity, Water, and Fuel)	9.849.375
Cost of Telephone	4.377.500
Cost of Equipment Depreciation	2.735.938
Cost of Machines Depreciation	9.083.313
Cost of Building Depreciation	2.188.750
Cost of Vehicle Rent	9.849.375
Cost of Research and Development	2.735.938
Cost of Equipment Service and Maintenance	1.094.375
Cost of Machines Service and Maintenance	1.641.563
Cost of BPJS Insurance	547.188
Other Costs	601.906
TOTAL	70.970.219

The calculation of Production Cost (PC) based on Traditional (Conventional) System:

$$\text{Factory Overhead Cost Tariff} = \frac{70.970.219}{1.812 \text{ hours}}$$

Factory Overhead Cost Tariff  
 =  $\frac{\text{Total of Factory Overhead Cost}}{\text{Machine Working Hour}}$  = Rp 39.167/hour

Table 6. Men's Loafers Shoes Cost

Types of Costs	Total Cost (Rp)	Total Production (Unit)	Cost per Unit (Rp)
Cost of materials	75.226.800,00	3.059	24.591,96
Cost of Direct Labors	33.026.400,00	3.059	10.796,47
Cost for Factory Overhead: 917 hours @ Rp 39.167	35.915.944,04	3.059	11.741,07
Production Cost (PC) per Unit (Rp)			47.129,50

Table 7. Men's Casual Shoes Cost

Types of Costs	Total Cost (Rp)	Total Production (Unit)	Cost per Unit (Rp)
Cost of materials	73.455.600,00	2.987	24.591,76
Cost of Direct Labors	32.248.800,00	2.987	10.796,38
Cost of Factory Overhead	35.054.275	2.987	11.735,61
Production Cost (PC) per Unit Rp)			47.123,76

The Calculation of Production Cost (PC) based on Activity-Based Costing (ABC) System *First Stage* (a) Grouping of various activities and associating various costs with various activities. (b) Deciding homogeneous cost group. (c) Deciding group tariff. *Second Stage*

Table 8. Identifying Factory Overhead Cost into Activities Category

Factory Overhead Costs	Activities Category
Cost of Supporting Materials	Unit Level
Cost of Indirect Labors	Unit Level
Cost of Utility (Electricity, Water, and Fuel)	Unit Level
Cost of Telephone	Unit Level
Cost of Equipment Service and Maintenance	Batch Level
Cost of Machines Service and Maintenance	Batch Level
Cost of Research and Development	Product Level
Cost of Equipment Depreciation	Facility Level
Cost of Machine Depreciation	Facility Level
Cost of Building Depreciation	Facility Level
Cost of Vehicle Rent	Facility Level
Cost of BPJS Insurance	Facility Level

Table 9. Production Cost Activities

Cost Pool	Types of Factory Overhead Costs	Cost Driver
I	Cost of Supporting Materials	Total of Production
	Cost of Indirect Labor	Total of Production
	Cost of Vehicle Depreciation	Total of Production
	Cost of Research and Development	Total of Production
	Cost of Equipment Service and Maintenance	Total of Production
	Cost of Vehicle Rent	Total of Production
II	Cost of Utility (Electricity, Water, and Fuel)	Machine Working Hours
	Cost of Telephone	Machine Working Hours
	Cost of Equipment Depreciation	Machine Working Hours
	Cost of Machine Depreciation	Machine Working Hours



III	Cost of Building Depreciation	Square area
	Cost of BPJS Insurance	Square area

Table 10. Calculating Allocation for Activity-Based Costing (ABC) System

Points	Men's Loafers Shoes	Men's Casual Shoes	Total
Total of Production (Unit)	3.059	2.987	6.046
Machine Working Hours (Hours)	917	895	1.812
Square area (m <sup>2</sup> )	125	125	250

Table 11. Group Tariff for Factory Overhead Cost with Activity-Based Costing (ABC) System

Cost Pool I	
Cost of Supporting Materials (Rp)	3.830.312,50
Cost of Indirect Labors (Rp)	22.434.687,50
Cost of Vehicle Rent (Rp)	9.849.375,00
Cost of Research and Development (Rp)	2.735.937,50
Cost Equipment Service and Maintenance (Rp)	1.094.375,00
Cost of Machine Service and Maintenance (Rp)	1.641.562,50
Total Cost (Rp)	41.586.250,00
Total of Production (Unit)	6.046
Cost Tariff of Factory Overhead Cost – Cost Pool I (Rp)	6.878,31

  

Cost Pool II	
Cost of Utility (Electricity, Water, and Fuel) (Rp)	9.849.375,00
Cost of Telephone (Rp)	9.849.375,00
Cost of Equipment Depreciation (Rp)	2.735.937,50
Cost of Machine Depreciation (Rp)	9.083.312,50
Total Cost (Rp)	31.518.000,00
Machine Working Hours (Hours)	1.812
Cost Tariff of Factory Overhead Cost – Cost Pool II (Rp)	17.394,04

Cost Pool III	
Cost of Building Depreciation (Rp)	2.188.750,00
Cost of BPJS Insurance (Rp)	547.187,50
Total Cost (Rp)	2.735.937,50
Square area (m <sup>2</sup> )	250
Cost Tariff of Factory Overhead Cost – Cost Pool III (Rp)	10.943,75

Table 12. Calculation of Production Cost (PC) Per Unit with Activity-Based Costing (ABC) System

Men's Loafers Shoes		
Cost of Materials (Rp)		75.226.800,00
Cost of Direct Labors (Rp)		33.026.400,00
Factory Overhead Cost:		
Cost Pool I	3.059	
	6.878,31	21.040.744,09
Cost Pool II	917	
	17.394,04	15.950.334,44
Cost Pool III	125	
	10.943,75	1.367.968,75
Total of Factory Overhead Cost (Rp)		38.359.047,27
Total of Production Cost (Rp)		146.612.247,27
Total of Products Manufactured (Unit)		3.059
Production Cost (PC) per Unit (Rp)		47.928,16
Men's Casual Shoes		
Cost of Materials (Rp)		73.455.600,00
Cost of Direct Labors (Rp)		32.248.800,00
Factory Overhead Cost:		
Cost Pool I	2.987	
	6.878,31	20.545.505,91
Cost Pool II	895	
	17.394,04	15.567.665,56
Cost Pool III	125	
	10.943,75	1.367.968,75
Total of Factory Overhead Cost (Rp)		37.481.140,23
Total of Production Cost (Rp)		143.185.540,23
Total of Products Manufactured (Unit)		2.987
Production Cost (PC) per Unit (Rp)		47.936,24

Table 13. Calculation of Factory Overhead Cost with Activity-Based Costing (ABC) System per Product per Unit

Points	Men's Loafers Shoes	Men's Casual Shoes
Total Factory Overhead Cost (Rp)	38.359.047,27	37.481.140,23
Total of Production (Unit)	3.059	2.987
Factory Overhead Cost per Unit (Rp)	12.539,73	12.548,09

From the above calculation Factory Overhead Cost per unit for Men's Loafers Shoes can be known to be Rp 12.539.73 and Men's Casual Shoes to be Rp 12.548.09

Comparison of Analysis of Production Cost (PC) Calculation between Traditional (Conventional) System and Activity-Based Costing (ABC) System Per Product Per Unit.

Table 14. Comparison of Factory Overhead Cost

Points	Men's Loafers Shoes	Men's Casual Shoes
Activity-Based Costing (ABC) System (Rp)	12.539,73	12.548,09
Traditional (Conventional) System (Rp)	11.741,07	11.735,61
Difference (Rp)	798,66	812,48
Difference (%)	6,80%	6,92%

Table 15. Comparison of Production Cost (PC) per Product per Unit

Points	Men's Loafers Shoes	Men's Casual Shoes
Activity-Based Costing (ABC) System (Rp)	47.928,16	47.936,24
Traditional (Conventional) System (Rp)	47.129,50	47.123,76
Difference (Rp)	798,66	812,48
Difference (%)	1,69%	1,72%

More advantageous Using

There are differences in the allocation of Factory Overhead Costs compared to the Production Cost (PC) because Activity-Based Costing (ABC) uses activities as a trigger to determine how much indirect overhead activities for each shoe product consumes. Traditional (Conventional) Systems allocate overhead only on one basis or allocation base (in this discussion only one allocation is used, i.e. Machine Working Hours), thus it fails to absorb the correct overhead consumption according to individual shoe production.

Activity-Based Costing (ABC) system produces more accurate production cost calculation than Traditional (Conventional) system. This level of accuracy is very important for companies in making decisions

related to company management, for example in determining selling price in order to face the ever increasing competitive market.

### CONCLUSIONS

Based on the discussion above it can be concluded as follows: (1) In the application of traditional (conventional) method for determining Production Cost (PC) in the Cibaduyut Industrial Center, the allocation is based on the number of machine hours and direct labor hours as a foundation for allocating Factory Overhead Costs. Using volume-based (machine working hours) cost drivers to charge the Factory Overhead Cost results in a distorted Production Cost (PC). Thus the Production Cost (PC) generated by

traditional (conventional) systems is inaccurate. The results of comparison in the above discussion show that the traditional (conventional) system overcosts Men's Loafers Shoes and Men's Casual Shoes. (2) Activity-Based Costing (ABC) method is capable of producing more accurate cost calculation compared to the traditional (conventional) method, because the traditional (conventional) method only uses one charging-base for Factory Overhead for each shoe product, ie machine working hours. Meanwhile, in Activity-Based Costing (ABC) system, each shoe product is charged with Factory Overhead Cost according to the consumption level of the shoe product. Therefore, the alternative implementation of Activity-Based Costing (ABC) system in the Cibaduyut Industrial Center needs to be considered by the company management to get more competitiveness. This in turn can spur activities to achieve a more efficient and higher output pattern. (3) The allocation of Factory Overhead Cost per unit for Men's Loafers Shoes calculated using Activity-Based Costing (ABC) System is of Rp 12,539.73 and Men's Casual Shoes is Rp 12,548.09, while based on the calculation using traditional method Men's Loafers Shoes is Rp 11,741.07 and Men's Casual Shoes is Rp 11,735,61, and this makes the calculated production cost to be too low, so that the cost of goods will be low, the selling price will be cheaper, and the company cannot achieve maximum profit.

### SUGGESTIONS

After being theoretically described, followed by an in-depth analysis and discussion, it is clear that many advantages can be obtained if Activity-Based Costing (ABC) system is used. Therefore the authors put forwards the following suggestions: (1) Shoe industries in the Cibaduyut Shoe Industry Center should use the Production Cost (PC) calculation system based on the Activity-Based Costing (ABC) system, since the traditional (conventional) cost systems lead to inaccurate cost calculation. (2) If the companies' management wants to implement the Activity-Based Costing (ABC) method, the design of Activity-Based Costing (ABC) system should

not be too complicated, too difficult to understand, and too expensive to maintain.

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