Philosophy of Positive Accounting Theory and Market Model in Chemical Sectors Companies

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Abstract. This research explains and describes the history and importance of positive accounting theory and market models, where this theory will assist in explaining accounting practices and making predictions about market conditions. As the beginning of this research, it will be complemented by previous studies on positive accounting theory and market models. This study uses a qualitative descriptive approach where previous literatures regarding the philosophy of positive accounting theory and how market models in chemical companies are collected and analyzed. Data obtained through journals, books. This study will provide an overview of the philosophy of positive accounting theory and how the market model for chemical companies is through theory and compared with previous research. In the findings of this study it was concluded that the application of positive accounting can have a very good impact on the continuity of the company both in objective financial information, and can be used as a company evaluation, transparency and accountability, and can be made as a reference for making good decisions for the survival of the company. And through market theory, which provides an overview regarding market conditions and conditions both from the past and present which provides an overview of predictions in the future, it will make it easier for chemical companies to determine targets and develop their business both in product marketing, bookkeeping and also being able to provide confidence in the company's stakeholders.
Keywords : *Positive Accounting Theory, Market Model, Chemical Sectors Companies*

1. Introduction

In the 21st century, world civilization is witnessing rapid progress and development in technology and industry. Similar to the chemical industry, the chemical industry can simply be described as an industry that uses and produces chemicals, but this definition is not entirely satisfactory as it raises the question of what is meant by chemicals. The definitions used for economic statistics purposes vary from country to country. Explosives and pyrotechnics are also part of the chemical section of the International Trade Standard Classification published by the United Nations (Rahman et al., 2022). However, this classification does not include man-made fibers, even if the raw materials for these fibers are chemically produced as industrially possible. The size of the chemical industry is partly determined by habit rather than logic. In the early days of the 19th century petroleum industry, the petroleum industry was usually thought of separately from the chemical industry, as oil only went through a simple distillation process. However, modern processes in the petroleum industry involve chemical transformations and some of the products of modern refinery complexes are by definition chemicals.

The development of the industrial world, including the chemical industry, cannot be separated from the development of financial management and management (Nasution et al., 2021 and Muda et al., 2022). Accounting, which is the basis of all financial reports, is important for managing a company's operations. The development of the science and research of finance or accounting is the development of the theories and hypotheses that have been studied so far, he one of the accounting theories that form the basis of accounting in industry today, empirical accounting theory.

Aggressive Accounting Theory is credited with emerging when Watts and Zimmerman (1978) published his 1978 paper entitled "Towards a Aggressive Theory of Accounting Standard Decisions." In this article, positive accounting theory is taken as the main accounting research paradigm, which has a qualitative basis and can be used to justify the various accounting techniques and techniques in use today. The purpose of positive accounting theory is to explain (explain) and predict (predict) accounting practices. Explanation means explaining the reason for the observed behavior. For example, positive accounting theory tries to explain why a firm continues to use his FIFO and why certain firms are changing their accounting practices. Predicting accounting practice, on the other hand, means that theory attempts to predict previously unobserved phenomena.

Watts and Zimmerman also explored in more detail the influence of economic variables on managers' motivations for choosing accounting techniques in their second book, Positive Accounting Theory, published in 1986, by Demsky. It's been reviewed. Therefore, this active accounting theory focuses on predicting management's behavior in choosing accounting methods and their reaction to new accounting standards. And positive accounting theory assumes that management rationally chooses accounting principles that they believe are good. Positive accounting theory is based on his three hypotheses that underlie managers' main motivations for profit management: bonuses (planned bonus hypothesis), debt commitments (debt commitment hypothesis), and political costs. (Hypothesis of the political process).

Market models are mathematical representations of various business situations and economic information (Ali et al., 2022). Businesses often use them to predict certain outcomes related to their business or to describe information received on economic markets. Different types of marketplaces are used in business environments. Organizations often choose a few specific types that best fit their business and provide an easy format for the information they analyze. This model is often divided into several groups such as: Accounting and corporate finance.

An economic market model is a tool that companies can use to forecast future sales and changing market conditions. This analysis provides important information for companies to make business decisions about expanding their operations or accepting new business growth opportunities. Common economic models include decision trees, supply and demand calculations, or game theory calculations. Each market describes a specific opportunity or goal that a company can focus on and assigns each opportunity a probability of success. External factors such as competitors, consumer behavior and current political and monetary policies can affect economic markets. This market is highly complex depending on the size of the firm's business and the economic market it contains (Budiskj, 2023). Chemical companies are generally the same as profit-maximizing and profit-maximizing companies, so a positive accounting theory that accompanies that hypothesis will certainly affect chemical companies. Using the previous discussion, this study further explores the philosophy of positive accounting theory and market models applied by chemical companies.

2. Literature Review

2.1. Positive Accounting Theory

The development of PAT began with criticism and correction of several assumptions underlying normative accounting concepts during the late 1960s. There were two research groups conducted at that time. The first research group (Ball & Brown, 1968; Beaver et al., 1980; McNichols & Manegold, 1983 and others) investigated the relationship between accounting earnings figures and stock prices.

The results of these studies indicate that accounting numbers reflect several factors, such as cash flow and risk that are relevant to stock valuation. According to Watts and Zimmerman (1986), the findings from this research are able to provide corrections to the weaknesses of claims in the normative accounting literature which state that accounting profit figures are meaningless because they are calculated using multiple valuation bases. Meanwhile, the research group of the two studies (Kaplan & Roll, 1972; Biddle & Lindahl, 1982, etc.) attempted to distinguish between two conflicting hypotheses, namely the no-effects hypothesis and the mechanistic hypothesis. The empirical evidence found in the second group of studies is still contradictory and does not succeed in distinguishing the two contradictory hypotheses.

Godfrey et al. (2010) explains that positive accounting theory he can see on two levels. At the first level, positive accounting theory includes accounting research and capital market behavior. At the second level, positive accounting theory explains and predicts the accounting practices of all companies. Thus, positive accounting theory attempts to explain why firms make certain accounting decisions for reasons of convenience (Godfrey et al., 2010).

Empirical accounting theory predicts and explains the events that occur in accounting practice to help companies choose the accounting principles and methods they use (Watts and Zimmerman, 1990). Therefore, information and transaction costs should be presented by accounting researchers. Watts and Zimmerman (1990) divide positive accounting theory into three hypotheses, including the bonus plan hypothesis, the debt commitment hypothesis, and the political cost hypothesis.

1. Bonus plan hypothesis (bonus plan hypothesis)

   In the bonus plan hypothesis, company managers tend to choose accounting policies and methods that will increase the company's profits for the current period.

2. The debt covenant hypothesis

   The Debt Treaty Hypothesis asserts that the higher a company's debt-to-equity ratio, the more likely it is that its use of accounting principles and techniques will increase its earnings in the current period. This is because the higher the debt-to-equity ratio, the closer the company is to the limit of the covenant, which can result in breach of contract and technology costs.

3. The political cost hypothesis.

   The political cost hypothesis predicts that large companies tend to reduce or delay reported profits compared to small companies. This is due to the existence of political costs incurred by the company related to the laws and regulations that have been stipulated. The larger a company, the greater the political costs that must be incurred. One of the political costs incurred by the company is the payment of taxes. Taxes are paid by companies to fulfill obligations to the government. With the political cost hypothesis, companies tend to reduce or delay reported profits in the current period. One of the opportunistic actions taken by companies to reduce profits is by carrying out transfer pricing aggressiveness activities in the form of transferring company profits or expenses to tax havens or countries with higher or lower rates.

Positive accounting theory is based on several assumptions about individual behavior:

1. Managers, investors, lenders, and others who are reasonably regarded as Maximizers of Financial Utility Measures (REM).
2. Managers choose an accounting policy that directly maximizes their own utility (self-interest), or indirectly change the company's funding, investment, and production policies to maximize self-interest. reserves the right to exercise discretion.
3. Management takes action to maximize the value of the company.

Positive accounting theorists argue that proposed prescriptive accounting models need to be tested and validated to assess their impact before they become accounting standards. They refuse to use anecdotal evidence or accept political or academic prescriptions. Empirical theorists claim that their theories are more scientific in methodology (Watts and Zimmerman, 1990).

Examples of positive accounting theories include common accounting practices such as creative accounting, revenue management, public baths, and income leveling. Scott (2006) states that yield management measures can be divided into he four areas: bathing, income minimization, income maximization, and income smoothing. The action that managers usually take is the practice of income smoothing. According to Wulandari and Purwaningsih (2007), smoothing of reported income can be achieved by two methods: true smoothing and artificial smoothing.

Profit smoothing is not a method of matching the profit of the current period with the level of profit of the previous period, but a method of keeping the profit from fluctuating. One of his ways to limit earnings volatility is for management to pay attention to the level of earnings growth the company wants to achieve. Income-smoothing measures include efforts to reduce the level of reported earnings when actual earnings are higher than normal earnings, and to lower the level of reported earnings when actual earnings are lower than ordinary earnings. Efforts to raise are included.

In the background of the income leveling phenomenon, there is fierce competition in the business world. It becomes a trigger to try to demonstrate the performance of Withdrawal of corporate investment.

The practice of income smoothing is a common phenomenon and is practiced by many countries. Not all countries consider income smoothing to be illegal work (Harahap, 2011: 249). However, this income smoothing practice is done intentionally which can cause the disclosure of earnings to be inadequate or misleading. As a result, investors may not obtain accurate information about earnings to evaluate the results of their portfolios.

2.2. Market Models

According to Sudarman (2004), a market is a place where buyers and sellers come together to buy and sell goods, services and factors of production. In everyday parlance, a market is usually defined as a place in a geographical sense. But from the point of view of microeconomic theory, it is even broader. A market in economics is a place where transactions take place between sellers and buyers.

In economics, the market can be divided into four forms/organizations called market structures. Market structure is understood to mean classifying market forms based on characteristics such as the types of products manufactured, the number of companies in the industry, the ease of entry and exit from the industry, and the role of advertising in industrial activity. It has been. . The market structure is divided into four types: Perfectly competitive market, monopoly competitive market, monopoly market, oligopoly market.

1. Perfect Competition Market

   The perfectly competitive market is the oldest and most frequently used market model in economics. This market model has been considered as a theory and is widely used to predict the state of the economy.

2. Oligopoly market.

   A market is said to be oligopoly if there are only a few sellers, so that the actions of a producer will encourage other producers to react.

3. Monopoly market.

   The form of a monopoly market is when in the market there are only sellers who control the market, there are no other sellers who sell monopolies and there are entry barriers for other companies to enter the market.

4. Monopolistic Market

   Companies in monopolistic competition sell products that are similar but not exactly the same, so the prices are different.

There are several theories related to market models in the context of economics and finance, here are some of these theories:

1. Market efficiency theory

In this case, it is argued that financial markets efficiently reflect all available information. In an efficient market, asset prices accurately reflect their intrinsic value, and it is impossible to make consistent profits through publicly informed trading strategies. This information has three forms, namely: weak efficiency, semi-strong efficiency, and strong efficiency.

2. Portfolio theory

This theory focuses on diversification and risk management in investments. This theory states that investors can achieve a lower level of risk by allocating their portfolios to a number of different assets that have a low correlation.

3.Price-benefit ratio choice theory

This theory relates the value of the company with the profit price ratio. In this theory, a higher profit price indicates that investors are more optimistic about a company's growth prospects and are prepared to pay a higher premium for every dollar of profit generated. Conversely, if the profit price is lower, it will indicate lower expectations of the company's profit growth.

4. Size Effect Theory

In this theory, small company stocks tend to outperform large company stocks in the long run. This could be due to a number of factors, including greater flexibility in decision making, higher growth potential, and superior efficiency levels in small companies.

5. Economic Cycle Theory

This theory says that financial markets and asset prices are influenced by economic cycles. The market has expansionary and contractionary phases which are reflected in stock performance, bond prices and overall economic activity. This theory argues that investors can make wise investment decisions by understanding the phases of the economic cycle and adjusting their portfolio to conditions that may occur.

3. Methods

This study uses a qualitative descriptive approach to collect and analyze prior literature on the philosophy of positive accounting theory and methods of researching market models in chemical companies. Data from in-house magazines, books and annual reports. This study provides an overview of the philosophy of positive accounting theory and what the market model for chemical companies looks like through a comparison of the theory and previous research, and what accounting principles chemical companies implement. increase. Compare hypotheses of empirical accounting theory and analyze how chemical companies apply market models. The methodology used is based solely on the analysis of the existing literature, after which conclusions are drawn through theoretical and in-depth analysis to fully understand the issues addressed in this study.

4. Results and Discussions

4.1. Result

4.1.1. Positive Accounting Theory

The existence of empirical accounting theory has greatly contributed to the development of accounting. The contribution of positive accounting theory to the development of accounting is to generate systematic patterns in accounting decisions, to provide concrete explanations for these patterns, to provide a clear framework for understanding accounting, It demonstrates the primary role of contract cost in accounting theory, explains why such accounting is used, and provides a framework for predicting decision making. Accounting Choice encourages relevant research that focuses on predicting and explaining accounting phenomena.

The primary purpose of positive accounting theory in accounting is to explain and predict standard managerial decisions through an analysis of the costs and benefits of specific financial disclosures associated with different people and allocations of economic resources. . Positive accounting theory rests on the premise that managers, shareholders, and regulators are rational and seek to maximize their utility, which is directly related to their compensation and, of course, their well-being. I'm here. The choice of accounting policy by such groups depends on comparing the relative costs and benefits in a way that maximizes the benefits of alternative accounting policies.

Empirical theory is now focused on explaining the reasons for current practices and making predictions about the role of accounting and related information in the economic well-being of individuals, firms, and other actors involved in capital markets and economic activity. Focused. Nonetheless, the assumptions underlying the positivity research project have been widely criticized because proponents of positivity theory use a different denial, a different way of thinking. In other words, empirical theory is not free from value judgments and normative implications. This is because implicit value judgments often underlie or influence the form and content of research conducted.

Researchers cannot avoid elements of bias in any research they do. Thus, the element of bias clearly shows the agreement of researchers in Dwitayanti and Wijaya (2018).

According to Godfrey et al. (2010), the development of TAP can be classified into two stages. The first stage is research on the relationship between earnings announcements and stock market responses. Research at this stage states that accounting reports prepared using the historical cost method can provide information used to evaluate stocks. The Efficient Markets Hypothesis (EMH) and Capital Asset Pricing Models (CAPM) proposed by Fama (1991) are included in this stage. EMH states that the capital market is called efficient if stock prices truly reflect all relevant information. The research included in the second stage focuses more on the literature that can explain and predict organizational practices. The development of theory in this stage is closely related to the goals of the organization to be able to maximize the welfare of owners and shareholders. Popular research in this second stage is about agency theory put forward by Jensen and Meckling (1976).

In terms of positive accounting philosophy, chemical sector companies are expected to follow generally accepted accounting principles, namely GAAP and relevant financial reporting standards. This includes the use of consistent accounting methods, proper recording of transactions, and full disclosure of business activities, risks and liabilities of the company. The purpose of this application is that companies, in this case the chemical sector, can increase their transparency and accountability to stakeholders, such as investors, employees, government, and other related parties. With the application of positive accounting, it can have a very good impact on the continuity of the company as explained earlier in the results section, namely: objective financial information, can be used as a company evaluation, transparency and accountability, and can be made as a reference for making good decisions for survival company.

4.1.2. The Bonus Plan Hypothesis

According to Godfrey (2010), bonus motivation states that management will receive a bonus if the company's performance reaches certain targets. This bonus promise will motivate managers to manage their profits at a certain level according to the required limits. Through the bonus plan hypothesis, the company through its managers formulates how to achieve company targets through bonuses that will be given to its staff to become motivation in order to achieve company targets. In this case the company determines the targets to be achieved in a certain period by involving resources in return in the form of bonuses provided that if the targets are met, this becomes motivation for employees or managers to develop plans and strategies to achieve company targets. Likewise with chemical industry companies, this can be applied as a basic motivation for their staff to achieve the targets of the company.

4.1.3. Debt covenant hypothesis

The second motivation is the motivation of debt contracts. Defond and Jiambalvo (1998) show evidence that managers practice earnings management by increasing profits to avoid violating debt restrictions. Every company will definitely do and try to increase profits or profits from their company, with the impact that it will make it easier for companies to apply for loans with large limits. The second hypothesis of positive accounting theory has now been implemented by many companies, inseparable from chemical companies, the higher the company's profit, the more it will be a consideration for investors or creditors to provide confidence in providing long-term investment to chemical companies.

4.1.4. The political cost hypothesis.

The final motivation is political costs where larger companies will carry out more policies that will cause profits to decrease with the intention of reducing political effects. Milne further revealed that large companies tend to use accounting procedures by reducing profits for the purpose of reducing high tax burdens. One of the accounting practices carried out by the company will have a purpose. One of the desired goals is tax motivation. Based on political cost theory, Watts and

Zimmerman (1990) argue that high-income companies will be very vulnerable to political transfer of wealth in the form of laws and regulations. Where in the regulation, in this case the government, requires all companies to pay their taxes based on the profits earned by the company. This makes companies object because they have to pay taxes regularly to the state which can result in reduced profits. Therefore, company managers will tend to choose transfer pricing to their group or company entities in other countries so that the taxes paid by the company are as minimal as possible. In a straight line with reduced tax burden paid and continued increase in company revenue

4.1.5. Market Model Theory

Based on the theory previously stated, the market model helps companies understand and predict how market conditions will be faced, in the current era companies are faced with demand for goods including chemicals or basic chemical industries, this provides an inseparable market for companies. in chemical industry companies. With today's free market conditions, it provides opportunities and opportunities for producers to market their products to consumers with the convenience and many choices available today. By determining and analyzing market needs and demands, it will certainly have a good impact on companies, especially chemical industry companies. The market model theory is able to provide an overview to chemical companies in managing and fulfilling market demands and needs, a good level of management in reading current market conditions will provide good benefits for chemical industry companies.

4.2. Discussion

In this literature review, we present the positive accounting philosophy and market model as follows:

Related to the problem of positive accounting philosophy in the company. In implementing the positive accounting philosophy, each company has a different way. Can not be separated from the company in the chemical sector, the company will implement it by adjusting to the conditions that exist within the company. However, they will still refer to or still adhere to the rules that apply in accounting theory, only that they can make slight adjustments. With the application of positive accounting, it can have a very good impact on the continuity of the company as explained earlier in the results section, namely: objective financial information, can be used as a company evaluation, transparency and accountability, and can be made as a reference for making good decisions for survival company.

5. Conclussion

In this study, it has been explained how positive accounting theory and the market model are able to have an impact on companies, the philosophy of positive accounting theory and the market model is a theory that can be adapted by companies including chemical industry companies, with the advantages and also the fundamentals that exist in these theories. the company is able to carry out management objectively, effectively and efficiently in accordance with applicable standards.

Through positive accounting theory, this theory aims to enable companies, in this case the chemical sector, to increase their transparency and accountability to stakeholders, such as investors, employees, government, and other related parties. With the application of positive accounting, it can have a very good impact on the continuity of the company as explained earlier in the results section, namely: objective financial information, can be used as a company evaluation, transparency and accountability, and can be made as a reference for making good decisions for survival company.

Market theory is a conceptual framework used to understand how the price and quality of a product or service is determined in a market. This theory describes the interaction between supply and demand to determine the optimal equilibrium price and production level in a market.

The market consists of two main groups, namely Buying and selling. Buyers have certain needs or wants for a product or service, while sellers provide the product or service. Market theory tries to explain how the two parties interact with each other to reach an agreement. Market theory is based on several basic assumptions, including: rational assumptions, perfect competition assumptions, complete information assumptions, product homogeneity assumptions.

Based on these assumptions, market theory presents two main concepts, namely supply and demand.

a. Offer

Supply describes the number of products or services that will be sold by producers at various price levels. The higher the price, the more producers are willing to offer their products.

b. Request

Demand describes the desire and ability of buyers to buy a product or service. The higher the price, the fewer consumers are willing to buy the product.

Market theory also discusses the concept of price elasticity, market structure and other factors that affect supply and demand, such as consumer preferences, technology, production costs, and government policies. So it can be concluded that the relationship between positive accounting theory and the market model is that positive accounting theory can later be used to understand how accounting information is influenced and influences the market. In the market model, positive accounting theory can provide insight into how accounting information is used by market participants, such as investors and creditors in the decision-making process. So this accounting theory can be used as a reference for the application of the market model.

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