

The Effect Of Green Accounting Implementation On Profitability In Manufacturing Companies Listed On The Indonesia Stock Exchange, 2018 – 2021

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Abstract. This Green accounting is defined as prevention, reduction, and avoidance of impacts on the environment, moving from several opportunities, starting from repairing incidents that have resulted in disasters for these activities. therefore this study aims to see the effect of green accounting on company profitability. which this research was conducted on Indonesian securities foam by taking samples for four years and using analysis and using the NPM net profit margin profitability measurement tool. and obtain the results that environmental reporting, environmental performance, environmentally friendly products provide less significant results on profitability, but environmental activities provide significant results. It is hoped that further research will add samples and research variables in order to obtain maximum results.

Keywords: Green Accounting, profitability, Net Profit Margin

1 Introduction

Technological developments in today's modern era are faced with environmental problems such as environmental pollution, even to the point of damage to the environment caused by irresponsible humans and low awareness of the importance of the environment and the large number of waste management companies that are not good for the environment. The company continues to strive to generate company profitability and improve company performance. One way to assess the performance of a company is to see whether a company's financial performance is good or not. Financial performance describes how business activities run and what the company has achieved. However, companies must also be concerned about conservation efforts by reporting environmental information disclosure and imposing environmental costs on the company's financial reports and annual reports, which are indicators of environmental accounting measurements.

By disclosing environmental expenses borne by businesses or costs related to the environment, accounting also contributes to initiatives to protect the environment. Green Accounting refers

to an accounting system that includes accounts for costs associated with the environment. Stakeholders like the government, creditors, and investors will scrutinize the financial statements' disclosure of environmental expenses. According to [8] the definition of "green accounting" is the prevention, reduction, and/or avoidance of impacts on the environment, moving from a variety of options, beginning with fixing occurrences that have led to disasters for these activities. The strain placed on the environment by company operations or other human activities that may make it more difficult to maintain a healthy environment is known as environmental impact. Green accounting is a tool that businesses may use to improve their effectiveness and efficiency. environmental business. In an effort to promote the establishment of businesses engaged in environmental management in Indonesia, the Ministry of Environment established the Company Performance Rating Assessment Program (PROPER). PROPER is intended to motivate businesses to comply with relevant laws and regulations through contributions made and to motivate businesses with strong performance to adopt cleaner production. The ranking in this Proper consists of 5 namely gold, green, blue, red, and the lowest rank is black. Companies listed in PROPER are mostly manufacturing companies, but also service industry companies and producers of raw materials or managers of natural resources. Manufacturing companies are more sensitive to every event that occurs within the company, both internal and external to the company. Investors are generally more interested in manufacturing companies because they promise bigger profits. Besides that, manufacturing companies also produce waste due to production processes that affect the environment and communities around the site.

To support the results of environmental performance, it means that the company has good corporate environmental activities as well. Because, for every environmental activity, every company must maintain the company's environmental management. As well as the operation of equipment so as to reduce pollution, waste disposal activities and so forth. These activities that focus on the environment and are eco-friendly must certainly be able to produce environmentally-based products as well, which are commonly referred to as environmentally friendly products. The raw materials are obtained from environmentally friendly natural resources and the products are designed ecofriendly with packaging that minimizes pollution and hazards. So, producing environmentally friendly products will have many benefits, one of which is creating a healthy environment. However, in reality, many companies think that producing environmentally friendly products will increase costs and the selling price will become expensive, which in the end the company becomes focused only on increasing product sales. Disclosure of environmental information is the responsibility of the company to report every activity and environmental performance in environmental reporting. Some of the existing companies think that this environmental reporting is not mandatory. Meanwhile, in the long term, if the company publishes an environmental report in which every environmental activity is included, it will gain a good reputation in environmental management.

As for the purpose of this study to find out

1. Is there an effect of environmental performance on the level of profitability of manufacturing companies listed on the IDX in 2018-2021?
2. Is there any effect of environmental reporting or disclosure on the level of profitability of manufacturing companies listed on the IDX in 2018-2021?
3. How will environmentally friendly products affect the level of profitability of manufacturing companies listed on the IDX in 2018-2021?
4. Is there an effect of environmental activities on the level of profitability of manufacturing

companies listed on the IDX in 2018-2021?

2 Literature Review And Hypothesis Development

2.1 Theoretical Concepts

2.1.1 Green Accounting Concept

In Indonesia, "environmental accounting" is referred to as "green accounting," and several additional terms are supplied by other professionals. Environmental accounting is defined by [8] as the prevention, mitigation, and/or avoidance of environmental consequences, commencing with the correction of events that have led to disastrous outcomes for these activities. Ningsih and Rachmawati (2017) cite this idea. The term "environmental accounting" refers to the process of avoiding, mitigating, and/or preventing negative effects on the environment by taking use of various chances, starting with the resolution of events that cause disasters. 2009's [8] In fact, the concept of green accounting has been gaining traction in Europe since the 1970s, when research on the subject started. Environmental issues are receiving more and more attention in wealthy nations like Japan and Europe. According to the definition of "green accounting" given above, it is possible to draw the conclusion that this type of accounting is one in which costs associated with business operations related to the environment and its social elements are disclosed. Accordingly, green accounting is a component of environmental and social management information that helps management identify expenses associated with business operations that have an impact on the environment and with the company's efforts to achieve sustainable development.

2.1.2 Application of Green Accounting in Indonesia

The environmental law that was passed in 1982 marked the beginning of the use of green accounting in Indonesia. Subsequently, the Statement of Financial Accounting Standards (PSAK) No. 32 pertaining to forestry accounting was developed in 1994 by the Indonesian Institute of Accountants (IAI) and included a standard for environmental accounting disclosures; however, during the PSAK's development, it was dropped. Next, PSAK No. 1 and PSAK No. 57 show how the company's operations have been accounting for the environmental effect.

Explanation regarding the presentation of environmental impacts in PSAK No. 1 revision 2009 paragraph 12 is as follows:

Entities can also present separate financial reports, reports on the environment and reports on value added, especially for industries where environmental factors play an important role and for industries that consider employees as a group of report users who play an important role. These additional reports are outside the scope of the Financial Accounting Standards.

In PSAK No. 57 of the 2009 revision, part of paragraph 19 reads as follows:

Provisional liabilities are recognized only for obligations that arise from past events that are separate from future actions of the entity (ie the future operations of the entity). An example of this Liability is a fine or the cost of remedying environmental pollution, resulting in an

outflow of resources to settle the obligation regardless of the entity's future actions. Likewise, the entity recognizes an estimated liability for decommissioning costs for oil installations or nuclear installations in the amount that must be borne by the entity to repair the damage that has been incurred.

2.1.3 Purpose of Green Accounting

Nowadays, a large number of the biggest industrial and service corporations in the globe are also using environmental accounting. By analyzing environmental operations from the perspectives of economic rewards and environmental costs, the aim is to improve the efficiency of environmental management.

Environmental accounting, according to [8], was created with the intention of serving as a tool for environmental management. It is utilized to evaluate the success of conservation efforts by compiling and categorizing the expenses associated with environmental conservation. The cost of environmental management facilities, the total cost of environmental conservation, and the needed investment for environmental management activities are all determined using environmental accounting data.

In addition, environmental accounting is also used to assess the level of output and achievements each year by the company to ensure continuous improvement of environmental performance. The next goal is as a means of communication with the public, environmental accounting is used to convey negative environmental impacts, environmental conservation activities which are then shown to the public. Responses and views on environmental accounting from parties, customers and the public are used as feedback to change the company's approach to environmental preservation or management.

In environmental accounting there are several financing components that must be calculated, according to [12], for example:

1. Business operational costs consisting of depreciation costs for environmental facilities, costs for repairing environmental facilities, services or contract fees for running environmental management facilities, labor costs for running environmental management facility operations and contract costs for waste management (recycling).
2. The cost of recycling sold which is referred to as "Cost incurs by upstream and downstream business operations" is the contract fee paid to the Japan Container and Package Recycling Association.
3. Research and development (R&D) costs, which consist of a total amount for materials and experts, other workers for the development of environmentally friendly materials, products and factory facilities.

2.1.4 Function of Green Accounting

The purpose of green accounting helps to clarify why it is so important for businesses and other organizations to use. Then, in line with [19], there are two roles for green accounting, specifically:

1. Internal Function

Green Accounting is applied as company management in managing environmental conservation costs in making financial reports for decision making. This concept provides a good overview of the application around the company's environment so that it is based on a

green environment.

2. External Functions

State the results of quantitative measurements of environmental conservation activities. A firm can influence the decisions of stakeholders, including consumers, business partners, investors, and local communities, by using its external role. In assessing environmental conservation, it is envisaged that the release of environmental accounting would satisfy corporate duty.

2.1.5 Environmental Performance

Environmental performance, according to [17], is the ability of a business to foster a sustainable environment. The Republic of Indonesia's Ministry of Environment (KLH) developed the PROPER (Performance Rating Rating Program) program, which rates environmental performance. Management of the Environment A tool called PROPER rates each firm according to its environmental performance, allowing comparison and rectification for the individual companies.

Barry and Rondinelli in [18] indicated that there were several factors that pushed companies to take environmental management actions, such as regulatory demand, corporate responsibility for the environment that emerged after the public increased their pressure on the government to implement government regulations as a result of widespread pollution. The company feels it is important to get an award in the environmental field. Then, cost factors, complaints about products produced by the company will have consequences for the emergence of high quality control costs, because all activities involved in the production process need to be properly prepared. Then stakeholder forces, companies will always try to satisfy the interests of various stakeholders by finding various needs for proactive environmental management. And competitive requirements, the growing global market and the emergence of various trade agreements have influenced the emergence of the environmental quality management standardization movement.

The Ministry of Environment, conducts an assessment of the company's environmental performance in the Company Performance Rating Program (PROPER). PROPER is one of the programs that supervises the industry to encourage industry compliance with the environment. So with PROPER it is expected that companies will care more about the environment. Given the results of this PROPER assessment can be known by the public, especially stakeholders.

2.1.6 Environmental Reporting

Sustainability reports and annual reports are often where businesses report on their social and environmental initiatives. Gond and Herrbach (2006) contend in [18] that firms can gain from environmental reporting in addition to external stakeholders. The business will evaluate itself in order to determine its advantages and disadvantages with regard to its social and environmental initiatives. Therefore, the report serves as a tool for organizational learning that may lead to dynamic changes in the person or the business, which in turn promotes improved organizational performance.

[1] outlined the advantages of CSR for businesses, including improved staff recruitment and retention, enhanced internal decision-making and cost reductions, enhanced stakeholder interactions and reputation, and financial gains. greater financial standing. Therefore, it can be said that responsible and transparent environmental reporting will promote the adoption of

CSR initiatives, which will raise the company's worth and improve societal welfare. Information on CSR initiatives based on GRI standards is divided into three disclosure foci, according to [19]: economic, environmental, and social.

2.1.7 Environmentally Friendly Products

[19] lists the following qualities of green products: they don't contain toxins; they last longer; they use recycled raw materials instead of materials that can harm the environment; they use simple packaging and offer refills; they don't pose a health risk to humans or animals; they don't use a lot of energy or other resources during processing, use, and sale; and they don't produce needless waste from packaging quickly.

2.1.8 Environmental Activities

According to [6] Environmental activities are activities carried out in managing the company's environmental quality. Environmental activities can be classified based on environmental costs, namely there are four categories:

1. Activities that prevent the generation of garbage and/or waste that damages the environment are those that involve expenditures associated with environmental prevention. Environmental activities include, but are not limited to, assessing and choosing pollution control instruments, educating staff, researching environmental effects and hazards, developing environmental management systems, recycling products, and earning ISO 14001 certification.
2. Environmental detection activities based on environmental detection costs (Environmental detection costs) are actions taken to ascertain whether or not the company's processes, products, and other activities comply with relevant environmental requirements. Government legislation, voluntary standards (like ISO 14001) created by the International Standards Organization, and management-developed environmental policies are a few examples of the environmental standards and processes that businesses adhere to. Detection activities include, but are not limited to, monitoring environmental activities, ensuring environmentally friendly products and processes, creating environmental performance metrics, testing for pollution, verifying suppliers' environmental performance.
3. Based on internal environmental failure costs, or environmental internal failure costs, environmental internal failure activities are those that are carried out as a result of trash and garbage generation but are not disposed of outside of the environment. Thus, when garbage and trash are generated, there is an internal breakdown in the removal and treatment of it.
4. Following the release of trash or waste into the environment, activities from external environmental failures based on environmental external failure costs (environmental external failure costs) are conducted. Activities involving external failures can be further separated into realized and unrealized groups. The expenses incurred and paid by the business are known as realized external failure costs.

2.1.9 Profitability

According to Kasmir (2014), the profitability ratio is a metric used to evaluate a business's capacity for turning a profit. It also serves as a gauge for the efficiency of a business's management, as demonstrated by the profit margin on sales and investment income. Businesses can utilize all of the available profitability ratio kinds, or they can only employ some of them. Businesses that just employ a few types of ratios that are seen to be important

to know are said to be using partial usage of ratios (Sapitri, 2018).

NPM was the profitability metric employed in this investigation. NPM is a means of comparing sales and net profit. For operations managers, this ratio is crucial since it shows the company's capacity to control operational expenditures and the sales price strategy it has implemented.

$$\text{Net Profit margin} = \frac{\text{Earning After Interest Tax}}{\text{Sales}} \times 100\% \quad (1)$$

2.2 Hypothesis

The hypothesis is a provisional solution to the research issue formulation, which is presented as a question. It is considered to be provisional since the solutions are based solely on pertinent ideas and not on empirical facts gathered via data gathering. [15]. The following hypothesis is based on the framework that has been explained and the literature review: can green accounting affect profitability.

2.2.1 Environmental Performance

According to the theory of legitimacy, businesses typically utilize environmental performance and information disclosure to support or legitimize their operations in the eyes of the public. This is because the community at large can have a significant impact on how financial and economic resources are allocated. Liquidity theory, environmental performance, and financial performance are related in that if a company's values do not align with those of the community (legitimacy gap), the company may lose its legitimacy and face bankruptcy as a threat to its survival (Lindblom, 1994) in [16]. As a result, a company's financial performance and profitability, which represent the company's yearly rate of return relative to industry returns, are influenced by its environmental performance. Therefore, researchers want to test the profitability ratios, namely Net Profit Margin (NPM)

H1 : Environmental performance has a significant influence on profitability.

2.2.2 Environmental Reporting

Andreas (2010) revealing Companies that engage in corporate social responsibility initiatives or other types of social responsibility can gain a competitive edge and improve environmental accountability. Consequently, the social data included in the annual report piques the attention of investors. Furthermore, the components of environmental responsibility will impact the profitability of the organization; one measure of this is Earnings Per Share (EPS), which will draw in investors. Additionally, it can boost stakeholders' and shareholders' confidence in the company's ability to go on business as usual. The worth of the business will rise with the backing of the neighborhood and the surroundings.

The study's premise is based on earlier work by Fatin et al. (2016). It claims that environmental reporting affects profitability in a big way. Consequently, using the ratio, researchers want to reevaluate how environmental reporting affects profitability.

H2: Environmental reporting has a significant effect on profitability.

2.2.3 Environmentally Friendly Products

According to [13], the public will react to environmental disclosures made by businesses because buyers will be more inclined to purchase ecologically friendly goods, which will boost the business's revenues.

According to a study by Bilal et al. (2016), environmentally friendly items have a big impact on financial success. Considering this viewpoint, the third supposition is

H3 : Environmentally friendly products have a significant effect on profitability.

2.2.4 Environmental Activities

As per reference [3], environmental activities pertain to the management of a firm's environmental quality. The more activities a corporation does, the higher the expenses it bears. Thus, businesses that engage in environmental initiatives must be able to boost their revenue.

H4 : Environmental activities have a significant effect on profitability.

3 Research Methods

3.1 Place and Time of Research

The research location is on the Indonesia Stock Exchange (BEI) and can be accessed via their official website at www.idx.co.id to get information about the company's financial reports. The choice to research BEI as a source of information was made because this company is considered to be the first in Indonesia to provide complete and structured financial data and company information exchange facilities.

3.2 Population and Sample

According to [15] Population refers to a general area that includes entities/individuals with specific attributes and traits that have been determined by the researcher for the purpose of the study, and from which conclusions can be drawn. Population in this context refers to entities or groups that exist in a particular area that are relevant to the study being conducted. The subjects of this research are manufacturing companies that have been listed on the Indonesia Stock Exchange (BEI) and announced on the website www.idx.co.id in the period 2018 to 2021. In this series of research, these companies collaborate to work together to meet each other's needs. consumer. [15].

3.3 Operational Definition and Variable Measurement

The variables taken in this study consist of one variable that depends on other factors (dependent variable) and four variables that are not influenced by other factors (independent variables). The variable that is focused on as a dependent variable is profitability, while the independent variables include environmental performance, environmental reporting, environmentally friendly products and activities related to the environment.

3.3.1 Dependent Variable

The dependent variable is a factor that is influenced by the independent variable. In the context of this research, the dependent variable for measuring a company's financial performance is profitability, which is measured through the NPM ratio. Net Profit Margin (NPM) is an indicator used to describe the extent of a company's ability to generate net profits. According to the definition put forward by Bastian and Suhardjono (2006) in [3], Net Profit Margin is a comparison between the amount of net profit obtained and total sales revenue. The higher the net profit value, the more efficient the company is in managing costs related to its operations.

3.3.2 Independent Variables

Independent variables refer to variables that do not depend on other factors. In this research, some examples of independent variables used are:

1. Environmental Performance (X1)

This variable refers to the company's achievements in efforts to produce a positive environment. This assessment of environmental performance is carried out through the use of a company rating scheme (PROPER) in managing environmental issues. PROPER is a form of supervision that aims to increase company participation in environmental management.

2. Environmental Reporting(X2)

Environmental reporting refers to company actions in informing their commitment and responsibility towards environmental aspects. Usually, companies also share information about environmental issues with the government, shareholders and other interested parties. In this research, various environmental performance indicators will be used in accordance with the Global Reporting Initiative (GRI) standards, which were introduced in May 2013.

This research aims to analyze the indicators that have been set by companies in their sustainability reports. The steps to be taken are: Calculate the number of GRI items disclosed by each company..

3. Environmentally Friendly Product(X3)

[11] Environmentally friendly products are those that do not cause pollution, do not use excessive resources, and can be reprocessed. Products classified as "green" have a role in reducing energy consumption, as well as maintaining and increasing the sustainability of natural resources. This is done by even eliminating the use of toxic materials, pollution and waste in the production and use processes.

Products that pay attention to environmental impacts are regulated by regulations from the Ministry of Environment and Forestry of the Republic of Indonesia with number P.5/MENLKH/SETJEN/KUM.1/2/2019. The regulation outlines steps to provide environmentally friendly labels to goods and services, including technology, that have implemented the principles of environmental preservation, protection and management. In this study, a variable called "Environmentally Sustainable Products" will be evaluated using a

score scale of 0 and 1. A score of 1 will be given to products that meet the requirements for environmental sustainability, while a score of 0 will be given to products that do not meet the same criteria..

4. Environmental Activities (X4)

Environmental activities are actions carried out by organizations with the aim of managing environmental quality. This process includes prevention, detection, and internal and external activities,[11] said information regarding these activities is generally found in the company's financial reports and sustainability reports. In processing data regarding this variable, the steps include calculating the number of environmental activities recorded in the company report.

3.4 Data Collection Techniques

The type of information used in this research is secondary data according [15]. Secondary data is information or documentation that is not obtained directly by researchers through their own data collection, but is obtained through other sources such as other people or written documents. In this research, secondary information was obtained from online sources, such as company websites. This data includes financial reports, annual reports and ongoing reports from manufacturing companies for the period 2018 to 2021.

The method used to collect information for this research involves the use of available data and relevant documents. Accessible data is obtained from various sources such as financial reports, annual reports and company sustainability reports. Meanwhile, the documentation approach includes the process of collecting, recording and analyzing secondary data, which includes company financial reports that have been published during the research period..

4 Results And Discussion

4.1 Results of Descriptive Statistics

Descriptive statistics is a statistical approach used to process data with the aim of describing the characteristics of the data that has been collected, without intending to draw general conclusions or make generalizations. (Sugiono 2015:207). Below are the results of descriptive statistical analysis of this study:

Table 1. Results of Descriptive Statistics

	N	Minimum	Maximum	Mean	Std. Deviation
Environmental Performance	60	2.00	4.00	3.2667	.48246
Environmental Reporting	60	1.00	18.00	6.3167	4.47021
Environmentally Friendly Product	60	.00	1.00	.8667	.34280
Environmental Activities	60	3.00	11.00	6.6833	2.34695
Net Profit Margin	60	-3.74	21.79	8.2123	4.96294
Valid N (listwise)	60				

Based on table 1, we can see that the amount of data used is 60 which is shown in table N, this data is obtained from the number of samples that have been selected according to the research

object

which proxies the environmental performance variable, showing a maximum value of 4 and a minimum value of 2 with a mean of 3.2667 and a standard deviation of 0.48246. And this means that the lowest rank obtained by the manufacturing companies that became the research sample for this study during 2018-2021 was blue and the highest rank obtained was green.

Based on table 1, we can also see that the maximum value of the environmental reporting variable is 18 and the minimum value is 1, with an average of 6,3167. This shows the number of companies reporting environmental aspects of the company in accordance with the GRI standards. And the environmental reporting variable gets a standard deviation result of 4,47021.

for environmentally friendly product variables, an average of 0.8667 is obtained and a standard deviation of 0.34280. And not all manufacturing companies that produce environmentally friendly products, from a sample of 60 obtained the result that there are more companies that produce environmentally friendly products than companies that do not produce environmentally friendly products.

environmental activity variables, companies carry out environmental activities at most 11 times and at least 3 times. And the average value is 6.6833, the average value of this variable is greater than the standard deviation, which is 2.3469, which means that there is not too big a data gap in this variable.

The dependent variable profitability which is proxied by the Net Profit Margin results in a maximum value of 21.79 and a minimum value of -3.74. it means that the NPM value in this study ranges from 21.79 to -3.74 with an average of 8.2135 and a standard deviation of 4.9620. The average value with a standard deviation shows how well the average is generated from the sample data obtained, can estimate the population mean. The average value of NPM is greater than the standard deviation, namely $8.2135 > 4.9620$, meaning that the distribution of NPM is good, which means that there is no gap between the highest and lowest values of the NPM variable during the study period.

4.2 Classical Assumption Test

Classical assumption testing is carried out before carrying out in-depth analysis of the data that has been collected. The purpose of testing this classic assumption is to ensure that the regression results meet the specified standards. The following are several stages of testing classical assumptions.

4.2.1 Normality Test

The normality test is carried out to identify whether the data from the dependent variable and the independent variable have a distribution pattern that follows normal or not. The performance of a regression model can be evaluated from the extent to which the residual distribution approaches the normal distribution. This normality testing process uses the Kolmogorov-Smirnov one sample analysis method (K-S test), and below are the results of carrying out the K-S test.

Table 2. Kolmogorov-Smirnov Normality Test for Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

		Value
N		60
Normal Parameters ^{a,b}	Mean	.0000000
	Std. Deviation	4.01714201
Most Extreme Differences	Absolute	.109
	Positive	.090
	Negative	-.109
Test Statistic		.109
Asymp. Sig. (2-tailed)		.074 ^c
a. Test distribution is Normal.		

When examining the Kolmogorov-Smirnov test method (K-S Test), the condition of conformity to a normal distribution is met if the Asymp.Sig (2-tailed) value of the variable residual has a value greater than 0.05. However, on the other hand, if the Asymp.Sig (2-tailed) value of the residual variable is smaller than 0.05, it can be interpreted that the data does not follow a normal distribution or does not meet the normality test requirements.

4.2.2 Multicollinearity Test

The multicollinearity test aims to find out whether the independent variables in a study have the same elements. The multicollinearity test in the regression model can be assessed with the tolerance value and variance inflation factor (VIF) value. The results of this multicollinearity test are:

Table 3. Multicollinearity Test of Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

Model	Unstandardized Coefficients		Standardized Coefficients	t	Sig.	Collinearity Statistics	
	B	Std. Error	Beta			Tolerance	VIF
(Constant)	-3.855	4.779		-.807	.423		
Environmental Performance	1.356	1.651	.132	.822	.415	.463	2.162
Environmental Reporting	.007	.185	.007	.041	.968	.431	2.320
Environmentally Friendly Product	.471	1.829	.033	.258	.798	.746	1.340
Environmental Activities	1.074	.270	.508	3.982	.000	.732	1.367

Based on the data in the table above, it can be seen that all independent variables, such as environmental performance, environmental reporting, environmentally friendly products, and environmental activities, have a tolerance level that exceeds 0.10 and a VIF value that is below 10. Therefore, it can be concluded that there is no indication of a multicollinearity problem between the independent variables in the two profitability metrics, namely NPM.

4.2.3 Heteroscedasticity Test

The heteroscedasticity test aims to evaluate whether there is a difference in residual variance

between one observation and another in a regression model. In order to test heteroscedasticity, the Glejser method is used which determines that if the significance value between the independent variable and the absolute residual exceeds 0.05, then the heteroscedasticity assumption is considered not fulfilled. The following are the results of this heteroscedasticity test, namely:

Table 4. Heteroscedasticity Test of Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

Model	Unstandardized Coefficients		Standardized Coefficients		t	Sig.
	B	Std. Error	Beta			
(Constant)	5.296	2.981			1.777	.081
Environmental Performance	-1.359	1.030	-.251		-1.320	.192
Environmental Reporting	.002	.115	.003		.014	.989
Environmentally Friendly Product	.748	1.141	.098		.656	.515
Environmental Activities	.226	.168	.203		1.343	.185

a. Dependent Variable: ABS_res1

Based on the illustration in Table 4.8, it can be observed that for these variables NPM obtained environmental performance variables of 0.0192, environmental reporting variables of 0.989, environmentally friendly product variables of 0.515, and environmental activity variables of 0.185. so it can be concluded that there is no heteroscedasticity problem because sig > 0.05.

4.2.4 Autocorrelation Test

The autocorrelation test is used to check whether there is a correlation between the disturbance errors in the linear regression model at the current time and the previous period. If this relationship is detected, the condition is referred to as an autocorrelation problem. A good model should be free from autocorrelation.

In the research that the researchers conducted, linear regression experienced autocorrelation so that the sample could not describe the population variance, so the research became inaccurate. With this problem, researchers carried out Cochrane Orcutt with the aim of correcting research data that experienced autocorrelation so that the data became normal without autocorrelation occurring. The following are the results of this autocorrelation test, namely.

Table 5. Autocorrelation Test Results for Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

Model Summary ^b					
Model	R	R Square	Adjusted R Square	Std. Error of the Estimate	Durbin-Watson
1	.587 ^a	.345	.297	4.16066	1.614

in the table, the Durbin Watson value has a result of 1.614. The analysis of these results shows

that there are no signs of autocorrelation symptoms. This can be seen from the fact that the Durbin Watson coefficient value is between 1.4443 to 1.7266, while the Durbin Watson value in the table above is 1.614. Therefore, it can be concluded that there is no autocorrelation occurring. To further ensure that autocorrelation does not exist, an autocorrelation test was analyzed using the Run Test method approach.

4.3 Hypothesis Testing

Hypothesis testing aims to check whether the regression coefficient value obtained has significance or not in the research. In this research, there are three types of hypothesis tests used, namely Multiple Regression Test, Partial Test (T Test), and Adjusted R2. These three hypothesis tests are applied to each variable in the following way.

4.3.1 Multiple Regression Test

Multiple linear regression analysis is used to evaluate the extent of the impact of the independent variables on the dependent variable.

Table 6. Results of Multiple Linear Regression Tests on Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities on NPM

Model	Unstandardized		Standardize			Collinearity	
	B	Std. Error	Beta	t	Sig.	Tolerance	VIF
(Constant)	-3.855	4.779		-.807	.423		
Environmental Performance	1.356	1.651	.132	.822	.415	.463	2.162
Environmental Reporting	.007	.185	.007	.041	.968	.431	2.320
Environmentally Friendly Product	.471	1.829	.033	.258	.798	.746	1.340
Environmental Activities	1.074	.270	.508	3.98	.000	.732	1.367

a. Dependent Variable: Net Profit Margin

From the above equation it can be concluded that:

1. The constant value is -3.855, each variable does not act as an independent factor, so profitability as measured by NPM will decrease by 2.346.
2. The coefficient value of the Environmental Performance variable is 1.356, which means that if each environmental performance variable is added, the level of profitability as proxied by NPM will increase by 1.356.
3. The coefficient value of the Environmental Reporting variable is 0.007, which means that if each environmental reporting variable is added, the level of profitability as proxied by NPM will increase by 0.007.
4. The coefficient value of the environmentally friendly product variable is 0.055, which means that if each additional environmentally friendly product variable is added, the level of profitability as proxied by NPM will decrease by 0.055.
5. The coefficient value of the Environmental Activity variable is 1.156, which means that if each environmental performance variable is added, the level of profitability as proxied by NPM will increase by 1.074.

4.4.2 Partial Significance Test (T Test)

The t statistical test is intended to partially understand the impact of the independent variable on the dependent variable in the regression model. This step is taken by taking into account that other variables are considered constant. Detailed information regarding the results of this test is provided in the following table:

Table 7. Statistical Test T of Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

Model	Unstandardized Coefficients		Standardized Coefficients		Sig.
	B	Std. Error	Beta	t	
(Constant)	-3.855	4.779		-.807	.423
Environmental Performance	1.356	1.651	.132	.822	.415
Environmental Reporting	.007	.185	.007	.041	.968
Environmentally Friendly Product	.471	1.829	.033	.258	.798
Environmental Activities	1.074	.270	.508	3.982	.000

a. Dependent Variable: Net Profit Margin

Based on the data presented in Table, we can draw conclusions regarding hypothesis testing for each independent variable against the dependent variable. The hypothesis will be approved if the significance value (Sig.t) is less than 0.05, while the hypothesis will be rejected if the Sig.t value is more than 0.05. The recorded results are as follows:

1. The impact of environmental performance on gross profit value (NPM) is evaluated in this research. The hypothesis proposed for this variable is to test whether environmental performance has a significant influence on NPM. From the results listed in Table above, we can see that the significance value for environmental performance is 0.423, exceeding the significance limit of 0.05. Based on these findings, it can be concluded that environmental performance does not have a significant influence on profitability as measured by NPM. Therefore, the proposed hypothesis must be rejected.
2. The impact of Environmental Reporting on Operating Profit Value (NPM) is explored in this research. The hypothesis related to this variable is to test whether environmental reporting has a significant influence on NPM. Analysis carried out based on Table, shows that the significance value of environmental reporting is 0.968, exceeding the significance limit of 0.05. Therefore, it can be concluded that there is no significant effect of environmental reporting on profitability as measured through NPM. Thus, the hypothesis in this study cannot be accepted.
3. The influence of environmentally friendly products on the Income Margin Value (NPM) is explored in this hypothesis with the aim of testing whether environmentally friendly products have a real influence on a company's net profits. Based on the data listed in table, it can be concluded that the significance value of products that focus on sustainability is 0.798, which exceeds the limit value of 0.05. Based on this analysis, it can be interpreted that environmentally friendly products do not have a significant effect on profitability as measured by the company's net profit. Therefore, this hypothesis needs to be rejected.

4. Environmental Influence on NPM. The purpose of the hypothesis on this variable is to test whether environmental activities have a real impact on NPM. Based on the data listed, it can be stated that the significance level for environmental activities is less than 0.05, to be precise 0.00. Thus, it can be concluded that environmental activities have a significant influence on the level of profitability represented by NPM. Therefore, it can be suggested that this hypothesis is accepted.

4.4.3 Test the coefficient of determination (adjusted R2)

Adjusted R-squared, also known as the adjusted coefficient of determination (Adjusted R2), has the aim of measuring independent variables that can explain variations in the NPM variable. The coefficient of determination figures reflect the following:

Table 8. Adjusted R2 test for Environmental Performance, Environmental Reporting, Environmentally Friendly Products, and Environmental Activities against NPM

Model	R	R Square	Adjusted R Square	Std. Error of the Estimate
1	.587 ^a	.345	.297	4.16066

Based on the table above, we can conclude that the variables Environmental Performance, Environmental Reporting, Environmentally Friendly Products and Environmental Activities have an influence of 34.5% on NPM. Thus, the affected R square coefficient value is 0.345, or 34.5%. Other variables not discussed in this study also have an influence.

5 Conclusion

5.1 Conclusion

A study conducted from 2018 to 2021 regarding the use of green accounting on the profitability of manufacturing companies listed on the Indonesian stock exchange resulted in the following conclusions:

1. Environmental performance assessed through PROPER does not significantly affect profitability. The research results indicate that environmental performance assessed using PROPER does not have a significant impact on Net Profit (NPM).
2. Environmental reporting based on the number of elements in the GRI (Global Reporting Initiative) does not have a significant impact on company profitability. Although there is a significant relationship between the number of GRI Net Profit (NPM) reporting items.
3. There are important differences between companies that create goods that support the environment and those that do not, in terms of the effect on financial profits. Companies that produce environmentally friendly goods have this impact which is not very visible in Net Profit (NPM).
4. Environmental activities have a significant impact on profitability, both when measured by Net Profit (NPM)

Thus, this research shows that environmental factors in different variables influence company profitability.

5.2 Advice

In this study, there were several limitations encountered by researchers, including the limited use of only covering manufacturing companies. Because of this, the generalizability of the findings is limited. Besides that, this research also only considers 4 independent variables. Paying attention to the limitations in this research, there are several. Further research should increase the number of samples in measuring the effect of Green accounting, in order to obtain maximum results. Adding sectors that have a greater impact on the environment, such as the mining and industrial sectors that produce raw materials. And future researchers can add several other independent variables such as environmental cost reporting and environmental audits.

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