

Financial distress analysis uses the modified Altman z-score method at PT. Prasadha Aneka Niaga Tbk for the 2019-2021 period

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ABSTRACT

The purpose of this study was to determine the financial condition of Perum Perumnas Regional-1 Medan using the Altman Z-score method. The data analysis technique used in this study was descriptive analysis technique, namely collecting data, classifying data, explaining data and analyzing data. The results of the study show that with the Altman Z-score method, companies experience financial distress every year.

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1. INTRODUCTION

A company is an entity founded by individuals or institutions with the main aim of generating profits. Basically, the purpose of establishing a company is to maximize the company's profits and prosperity. Therefore, companies must be able to generate optimal profits (George et al., 2023).

Financial Distress is a stage of decline in a company's financial condition before liquidation or bankruptcy occurs. Indications of financial distress can be seen from the financial performance reflected in a company's financial reports (Moch et al., 2019). Financial distress begins with the company's inability to fulfill its obligations, especially short-term obligations such as liquidity obligations and also includes obligations in the solvency category. This is the biggest factor in companies experiencing bankruptcy. Financial Distress and early signs of bankruptcy can be identified through analysis of the data contained in financial reports (Ashraf et al., 2019). The factors that cause financial distress are economic factors, errors in management, and natural disasters. The company PT Prasadha Aneka Niaga Tbk is a company that produces coffee and crumb rubber. This company has a very long experience in this field, namely 45 years, but in 2019 this company experienced a decline because the price of rubber on the international market was still decreasing. This was caused by weakening demand from China, which is the largest demand for rubber from PT Prasadha Aneka Niaga Tbk. China's slowing economic conditions due to the trade war with the United States (US) have influenced the decline in rubber prices which has affected companies. Then, in

2020, the rubber and coffee commodity industry faced the challenge of uncertain conditions, compounded by the COVID-19 pandemic. This had an impact on decreasing the performance of processed coffee production where sales quantity decreased by 27% and sales value decreased by 30%. Meanwhile, for crumb rubber production, sales quantity decreased by 36% and sales value decreased by 41%. From a financial perspective, the Company experienced a net loss of IDR 52.31 billion, greater than in 2019 which experienced a net loss of IDR 25.76 billion (Macchiavello & Morjaria, 2022). This situation is greatly influenced by global and national factors related to the COVID-19 pandemic. PSDN may not be able to achieve the projected target set for 2021 because it is still under pressure due to the COVID-19 pandemic. PSDN's business in the field of processed coffee production also experienced a decrease in sales quantity of approximately 35% and a decrease in sales value of 38%.

2. RESEARCH METHOD

In the Altman model formula, the modification is made simpler, by eliminating one of the assessment elements (Mansournia et al., 2021). So the Altman model is very flexible to use for various types of company business fields, both public and non-public (Munira et al., 2021).

3. RESULTS AND DISCUSSIONS

Table 1. X1 Ratio (Working Capital to Total Assets)

No	Year	Working capital	Total Assets	X1
1	2019	-76,735,979,355	763,492,320,252	-0.10050655
2	2020	-6,561,020,862	765,375,539,783	-0.00857229
3	2021	-117,244,903,179	708,894,784,885	-0.165391121

Data Source: Data processed in 2023

The table above shows that in 2019-2021 the results of the X1 ratio were negative, which means the company was unable to generate working capital. The company's current assets are positive, but it is still unable to meet the company's current (Purba et al., 2020). Even though current assets are greater than current liabilities

Table 2. X2 Ratio (Retained Earnings to Total Assets)

No	Year	Retained earning	Total Assets	X2
1	2019	-192,893,888,909	763,492,320,252	-0.252646797
2	2020	-254,908,784,410	765,375,539,783	-0.333050602
3	2021	-341,779,154,397	708,894,784,885	-0.482129593

Data Source: Data processed in 2023

From the table above we can see that retained earnings to total assets where from 2019-2021 the value of the X2 ratio shows a negative number, which means the Company has not been able to meet retained earnings from the total assets owned and is unable to cover business expenses or costs (Dirman, 2020).

Table 3. X3 Ratio (Earnings Before Interest and Tax to Total Assets)

No	Year	Earnings Before Interest and Tax	Total Assets	X3
1	2019	4,341,114,728	763,492,320,252	0.005685866
2	2020	-33,306,278,579	765,375,539,783	-0.043516257
3	2021	-69,012,628,606	708,894,784,885	-0.097352428

Data Source: Data processed in 2023

Table 3 shows the ratio of earnings before interest and tax (EBIT) to total assets of PT Prasideha Aneka Niaga Tbk which can be interpreted as follows; In 2019 the X3 Ratio result was 0.005. In 2020 the X3 Ratio result is -0.043. In 2021 the X3 Ratio result is 0.009. It can be concluded that in 2019 the company was still able to generate profits before tax, which means the company was still able to balance its municipal profits and operational costs. However, in 2020 and 2021, the X3 ratio value is

negative, which means that in that year the company's operating profit was greater than its profit (Ledley et al., 2020).

Table 4. X4 Ratio (Equity Book Value to Debt Book Value)

No	Year	Book Value of Equity	Book Value of Debt	X4
1	2019	175,963,488,806	587,528,831,446	0.299497624
2	2020	120,151,540,897	645,223,998,886	0.186216788
3	2021	48,717,502,312	660,177,282,573	0.073794575

Data Source: Data processed in 2023

Table 4 shows the results of X4, namely the ratio of equity to total debt, PT Prasadha Aneka Niaga Tbk from 2019 – 2021, explanation as follows; In 2019 the ratio of total equity to total debt resulted from the X4 ratio, namely 0.29. And in 2020 the X4 ratio result was 0.18, it can be seen that the X4 result decreased from 2020. In 2021 the ratio result was 0.07, this year the Tbk is able to meet its long-term debt/obligations with the company's total equity (Permada & Sari, 2024). However, it can also be seen that the value of the equity to total debt ratio continues to decline from 2019 - 2021. gross company. So it will cause losses.

Table 5. Calculation results of the Altman Z-score formulation for the 2019-2021 period

Year	6.56 X1	3.26 X2	6.72 X3	1.05 X4	Z
2019	-0.659322971	-0.823628557	0.038209017	0.314472505	-1.13027001
2020	-0.05623422	-1.08574496	-0.29242925	0.195527628	-1.23888081
2021	0.027354223	-0.482129593	-0.654208317	0.077484304	-1.03149938

Data Source: Data processed in 2023

It can be seen in table 5. From the calculation of 6.56, the multiplication of the X1 value produces a negative value in 2019, namely -0.659322971, with this value it can be interpreted that in 2019 the company was unable to produce net working capital and was unable to handle current debts/liabilities. short-term. However, from 2020 - 2021 this negative value shows that the company is unable to pay its short-term debt. This is because the company has a current debt value that is greater than the current assets it owns.

In the calculation results of 3.26, the multiplication of the value of . This can show that the company's retained earnings are negative. It can be interpreted that the company is unable to generate retained earnings and is experiencing difficult times, and is experiencing losses.

The calculation results of 6.72 multiplication of the X3 value show that 2019-2021 has a negative company value, namely 0.06, which can indicate that the company experienced a loss in 2015 because the working capital obtained was not optimal, making the company's EBIT also negative. In 2016 the value of X3 was 0.06. And in the last two years, 2017 and 2018, the X3 value was negative, where in 2017 the value was 0.06 and 2018 0.33. This can mean that the company experiences losses or is unable to generate profits from the assets it owns.

And the calculation result of 1.05 multiplication of the negative value of

From the calculations carried out in accordance with the Altman formulation to find the Altman Z – Score value for PT Prasadha Aneka Niaga Tbk, the Altman value in 2019 is -1.13027001, in 2020 the Altman value is -1.23888081, in 2021 the Altman value is -1.03149938 .

Table 6. Interpretation of the Predicted Z Value of PT Prasadha Aneka Niaga Tbk for the 2019-2021 Period

Year	Altman Z - Score	Z value	Note
2019	-1.13027001	<1.1	The company has the potential to experience bankruptcy
2020	-1.23888081	<1.1	The company has the potential to experience bankruptcy
2021	-1.03149938	<1.1	The company has the potential to experience bankruptcy

Data Source: Data processed in 2023

From the results of the calculations above, it can be seen that the company is experiencing financial difficulties which will result in financial distress. In 2020, the prediction of financial distress is greater than in previous years due to an increase in debt and an increase in expenses compared to the income generated, this affects the company and predicting financial distress. According to (Dirman, 2021) "Financial Distress" can be characterized by a decrease in assets, a decrease in sales, a decrease in profits and profitability levels, a decrease in working capital, and a continuous increase in debt." In this case, the company has entered the dangerous category because of predictions of financial distress or financial difficulties at the stage of potential bankruptcy. If this is not immediately handled seriously it will cause the company to go bankrupt. So management must work more seriously and be able to find a solution to this threat of bankruptcy. So that the company can continue to develop as it should and can compete with other plantation companies. Because this is very important for the sustainability of a company so that it remains in a healthy condition (Koval et al., 2021).

4. CONCLUSION

The research aims to analyze financial distress conditions at PT. Prasadha Aneka Niaga Tbk using the Altman Z-Score method. The conclusions that can be drawn from the results of this research are as follows. Results of analysis of the Altman Z-Score method in predicting financial distress at PT. Prasadha Aneka Niaga Tbk is experiencing predicted Financial Distress from 2019-2021.

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