

Vol.5, No.2, 2022

Study of CoVD19 Pandemic, Financial Ratios, and Macroeconomic Impact on Financial Distress in Indonesian Manufacturing Firms Traded on the Indonesian Stock Exchange

Hafid Fitra Habibi¹, Wiwik Utami^{2*}

^{1,2}Faculty Economics and Business, Mercu Buana University, Jakarta, Indonesia *wiwik.utami@mercubuana.ac.id

ABSTRACT

The study examined CoV19, financial distress, and other macroeconomic and financial ratios to draw their conclusions. Profitability, liquidity, and leverage were used for financial measures, while inflation and currency exchange rates stood in for macroeconomic indicators. Companies in a financial crisis have lost money for two years, have negative equity, or have a debt-to-asset ratio of more than one. Included in this sample are all 186 manufacturing firms trading on the Indonesia Stock Exchange between 2017 and 2020. From 2017 to 2020, 482 businesses were observed during course time, and the sample was chosen randomly. Logit regression was used to analyze the data. No correlation was found between financial distress and variables like the COVID-19 epidemic, inflation, or currency exchange rates. profitability has a detrimental impact on distress. However, both liquidity and leverage can alleviate distress. Findings are consistent across all segments of the industrial industry. This research shows that financial distress are caused less by general economic conditions and the covid 19 epidemics than by profitability, liquidity, and debt issues.

Keywords: Covid-19 Pandemic, Profitability, Liquidity, Leverage, Inflation, Exchange Rates, Financial Distress

Copyright © 2022, International Journal of Economics, Business and Entrepreneurship | IJEBE | FEB-UNILA

INTRODUCTION

Companies of all sizes and industries must adapt to survive in today's global marketplace and contribute to economic growth. This analysis focuses on manufacturing firms trading on the Indonesia Stock Exchange (IDX). The research team settled on a manufacturer for their case study because of the sector's significance to the economy. Enterprises that lack distinctive qualities may fail in the face of unpredictable market shifts; nonetheless, practically all companies exhibit competitive advantages over each other to attain the competitiveness required by every nation to sustain economic conditions and avoid economic collapse. A firm in financial trouble is experiencing some warning signs of impending bankruptcy, such as a decline in financial performance due to issues like an overwhelming debt load. If a company's financial problems are not foreseen, they might result in bankruptcy. Management must regularly monitor and assess the company's financial statements using financial ratios to ensure the company's continued performance. According to Yuliana and Utami (2022), financial performance is a description of a company's financial status that reflects the outcomes of management's choices. Companies may experience unsteadiness due to the occurrence of financial difficulty. Things may only worsen if the corporation doesn't grasp the scope of the issue (Yati, S., & Patunrui, 2017).

Several different things may cause financial distress. The covid 19 epidemic is one of the potential causes of economic distress. The World Health Organization (WHO) formally classified the 2019 coronavirus disease pandemic (Covid-19) on March 9, 2020, caused by a novel coronavirus strain, severe acute respiratory syndrome coronavirus 2 (SARS- CoV-2) (Suhaidar et

al., 2020). Furthermore, both external and internal causes of the organisation might lead to the creation of financial distress. Rohiman & Damayanti (2019) find that inflation has a major impact on economic distress. Kurniasanti & Musdholifah (2018) provide contrasting results by concluding that inflation has little bearing on financial distress. The ratios of profitability (ROA), leverage (DER), liquidity (CR), and asset turnover (ATO) all affect financial distress. At the same time, only inflation is proven to affect financial distress at the macro level. In contrast, the exchange rate factor and economic growth do not affect financial distress, according to research by Ceylan (2021).

LITERATURE REVIEW

Stakeholder Theory

Stakeholder theory, as defined by Yusuf (2017), asserts that the corporation is fully responsible to all stakeholders. The theory's overarching goal is to help managers better comprehend their stakeholder environments and implement efficient methods of dealing with external factors that may affect their businesses (Khasanah et al., 2020). According to this view, everyone who might be affected by an organization's actions has a right to know how those actions will affect them, even if they don't want to know or can't do anything positive to help the organization succeed (Deegan, 2004 in Ulum, 2009).

Covid 19 Pandemic

Government attempts to halt the spread of the COVID-19 epidemic have put Indonesia's economy in a bind (Silalahi & Ginting, 2020). The effects of this epidemic are so severe that even Indonesia's economic growth, which had been forecast to reach 5.3% in 2020, is now only expected to reach 2%. (Hadiwardoyo, 2020). This problem may affect the company's bottom line. Moreover, the government's strategy of restricting community activities disturbs the company's economic operations, reducing its potential for profit and increasing the likelihood of its going bankrupt. According to earlier studies done by Syafrida & Suryani (2020), the effect of the COVID-19 pandemic has a beneficial influence on the forecast of company bankruptcy. Similarly, Hadiwardoyo's (2020) studies show that businesses that can't weather the effects of the COVID-19 epidemic would face the prospect of insolvency or bankruptcy.

H₁: The COVID-19 pandemic has a positive effect on financial distress

Profitability

The extent to which a business can profit from its operations may be defined as its profitability (Sudrajat & Setiyawati, 2021). The term "profitability" refers to the degree to which a business can turn a profit within a certain time frame via effectively managing its sales, assets, and capital. According to Herry (2015), a greater profitability ratio indicates that the company is less likely to run into financial trouble. Previous studies by Machmuddah (2019) & Christine et al. (2019) found that a low return on assets was correlated with financial difficulties in businesses. This is consistent with findings from a study by Nukmaningtyas and Worokinasih (2018) that found a negative correlation between ROA performance and financial stress.

H₂: Profitability has a negative effect on financial distress

Liquidity

Razak et al. (2020) define the current ratio as a benchmark for evaluating a company's short-term liquidity and solvency. According to agency theory, a company's agency expenses may be lowered if its liquidity levels are higher. If a firm has a lot of cash, it can easily pay its obligations, indicating that the business is doing well (signalling theory). Cahyani and Diantini

(2016) and Pawitri and Alteza (2020) discovered that liquidity negatively impacted financial distress as measured by the current ratio.

H₃: Liquidity has a negative effect on financial distress

Leverage

According to signal theory, corporations will provide information, such as financial statements, and investors and external parties may utilize that to make judgments. Potential investors may turn elsewhere if the financial statements don't appear good. The debt-equity ratio measures how well a corporation can pay back its debt. The higher this ratio is, the more dangerous it is for the company's finances (Sudana, 2015). According to Widiati and Pratama's (2015) research, the debt to equity ratio mitigates monetary stress. Consistent with the findings of Rani (2017) and Dewi & Dana (2017), who also found that DER mitigated financial distress,

H₄: Leverage has a positive effect on financial distress

Inflation

Inflation can be seen through a fenomena when prices keep going up without stopping. Instability in a country's economic system frequently leads to high inflation rates. When the economy is in a state where the demand for goods is higher than the supply, prices tend to rise. According to studies by Pamungkas et al. (2021), inflation significantly mitigates economic hardship.

H₅: Inflation has a positive effect on financial distress

Exchange Rate

Uncertainty in the currency rate is a risk that each investor in the global market must take into account. Any investor that deals in foreign currency must also factor in currency fluctuations' risk premium (Rodoni & Herni, 2014). It has been predicted by Widarjo and Setiawan (2009) that a fall in the value of the rupiah would harm business profits. There is a chance that the company's financial situation may worsen as a result of this drop. Afriyeni and Jumyetti's (2017) findings corroborate this observation; the magnitude of exchange rate swings greatly impacts struggling businesses.

H₆: Exchange rate has a positive effect on financial distress

METHODS

This study aims to ascertain the influence of independent factors on the dependent variable by using a quantitative strategy, a sort of explanatory research that explains the causal link between variables by testing hypotheses (Sugiyono, 2016). The Corona Virus pandemic, financial ratios (profitability, liquidity, and leverage), and macro factors are the independent variables (proxied by inflation and exchange rates). Financial distress is the criterion for this investigation. The following factors were measured during this study:

Financial Distress

According to Sehgal et al. (2021), a corporation is considered to be in financial distress if it exhibits at least one of the following symptoms.

- 1. Losses occurred for a consecutive two years at the company.
- 2. The value of the company's equity is negative.
- 3. The DER ratio of this company is more than one.

Covid 19 Pandemic

The Covid 19 pandemic is measured by a dummy variable, namely: Value 1 After Covid-19; Value 0 Before the Covid-19 pandemic

Profitability

In this study, profitability is measured by return on assets, namely:

$$ROA = \frac{Net\ Income\ After\ Tax}{Total\ Assets}$$

Liquidity

Measurement of current ratio (CR) proxy liquidity, namely:

$$CR = \frac{Current\ Assets}{Current\ Liabilities}$$

Leverage

The measurement of leverage is consistent with the debt to equity ratio (DER) proxy, namely:

$$DER = \frac{Total\ Debt}{Total\ Equity}$$

Inflation

According to Ceylan (2021) the exchange rate is used using the consumer price index (CPI). Calculation of Inflation:

CPI= Consumer Price Index

Exchange rate

The exchange rate can be calculated by the formula (Suriyani & Sudiartha, 2018):

$$\Delta ER_t = \frac{(ER_t - ER_{t-1})}{ER_{t-1}}$$

The population for this analysis consists of manufacturing businesses trading on the Indonesia Stock Exchange between 2017 and 2020. From 2017 through 2020, 482 businesses were observed, and the sample was selected using a random chance distribution. The information used in this analysis is secondary and was gathered from corporate performance reports made public by the Indonesia Stock Exchange between 2017 and 2020. Logit regression was used in computer statistics software to analyze the data.

RESULTS AND DISCUSSION

Descriptive Statistics

Research samples (N) total 482 data from 2017-2020, all from the annual financial reports of manufacturing businesses traded on the Indonesia Stock Exchange. Table 1 displays the findings of a descriptive statistical study of manufacturing firms for 2017-2020.

Table 1. Descriptive statistics

Descriptive Statistics				Chemical & Basic Industry Sector Manufacturing Company		Multi-Industrial Sector Manufacturing Company			Manufacturing Companies in the Consumer Goods Industry Sector			
	N	Mean	Std. Deviation	N	Mean	Std. Deviation	N	Mean	Std. Deviation	N	Mean	Std. Deviation
COVID19 (Dummy)	482	0.2386	0.42666	216	0.2407	0.42853	132	0.2348	0.42552	134	0.2388	0.428
ROA (ratio)	482	0.0337	0.05823	216	0.0289	0.05169	132	0.0218	0.05202	134	0.0532	0.0687
CR (ratio)	482	21.365	145.653	216	20.079	137.692	132	19.815	151.08	134	24.964	147.587
DER (ratio)	482	10.077	108.926	216	11.277	115.825	132	10.574	124.701	134	0.7654	0.7111
Inflasi (%)	482	28.101	0.70868	216	28.13	0.71386	132	28.008	0.7009	134	28.148	0.7131
Exchange rate (Rp)	482	140.722	0.4402	216	140.694	0.44407	132	140.805	0.43292	134	140.684	0.4442
Not Experiencing Financial Distress	235			93			53			89		
Experiencing Financial Distress	247			123			79			45		
Valid N (listwise)	482			216			132			134		

Descriptive data revealed that across all production facilities for the pandemic variable COVID-19 (covid19), the mean value is 0.2386, and the standard deviation is 0.42666. There is a 0.0337 mean and a 0.05823 standard deviation for the profitability variable (ROA). While the standard deviation of the liquidity variable (CR) is 1.45653 and the mean is 2.1365. While the standard deviation of the leverage variable (DER) is 1.08926, the mean is 1.0077. There is also a mean of 2.8101 and a standard deviation of 0.70868 for the inflation variable (INFLATION). Whereas the average value of the exchange rate variable (EXCHANGE RATE) is Rp. 14,072,20, and the standard deviation is 0.4402. It is also known that out of the total number of manufacturing enterprises shown in the table above, 235 do not have financial statements that show signs of crisis, whereas 247 do.

According to the descriptive statistics, manufacturers in the basic and chemical industries had a mean value of 0.2407 for the pandemic variable COVID-19 (covid19) and a standard deviation of 0.42853. There is a 0.0289 mean and a 1.37692 standard deviation for the profitability variable (ROA). The liquidity variable, CR, has a mean of 2.0079 and a standard deviation of 1.37692. Additionally, the standard deviation of the leverage variable (DER) is 1.15825, with a mean of 1.1277. Additionally, INFLATION has a mean value of 2.8130 and a standard deviation of 0.71386. At the same time, the exchange rate variable (EXCHANGE RATE) has a mean of Rp. 14,069,40 and a standard deviation of 0.44407. Additionally, the data in the table above shows that out of the 123 financial reports submitted by manufacturing enterprises in the basic and chemical industry sectors, 93 do not show any signs of financial trouble.

Manufacturing firms across all industries were analyzed descriptively, and the findings revealed that the COVID-19 (covid19) pandemic variable had a mean value of 0.2348 and a standard deviation of 0.42552. The profitability variable (ROA) has a mean value of 0.0218, and its standard deviation is 0.05202. Also, the liquidity variable (CR) standard deviation is 1.51080, with a mean of 1.9815. Meanwhile, the leverage variable (DER) standard deviation is 1.24701, with a mean of 1.0574. The INFLATION variable has a mean of 2.8008 and a standard deviation of 0.70090. EXCHANGE RATE, meanwhile, has a mean value of Rp. 14,080,50 or a standard deviation of 0.43292. According to the data in the table above, out of the sample of manufacturing enterprises across industries, 53 do not encounter financial trouble, while the remaining 79 do.

A descriptive statistical study of enterprises in the consumer products manufacturing sector revealed that the COVID-19 (covid19) pandemic variable had a mean value of 0.2388 and a standard deviation of 0.42795. In addition, the profitability variable (ROA) typically ranges from 0.0532 to 0.06869, with a mean of 0.0532 and a standard deviation of 0.06869. While CR, a measure of liquidity, averages 2.4964 with a standard deviation of 1.47587. On the other hand, the standard deviation of the leverage variable (DER) is 0.71113, with a mean of 0.7654. Moreover, the inflation variable (INFLATION) has a mean of 2.8148 and a standard deviation of 0.71313. While the exchange rate variable (EXCHANGE RATE) has a mean of Rp. 14,068,40 and a standard deviation of 0.4442. The preceding data shows that among manufacturing enterprises in the consumer products industrial sector, 89 financial reports do not face financial trouble and 45 financial statements do.

Logistics Regression Analysis

To determine whether or not an independent variable may explain a dependent variable, statisticians use a technique known as logistic regression. Standard normality and classical assumption checks on independent variables are unnecessary in modern logistic regression methods (Ghozali, 2011). Logistic regression testing may be broken down into steps (Ghozali, 2011).

a. Feasibility Test of Logistics Regression Model

As a measure of a regression mode's practicability, the table of Hosmer and Lemeshow's Goodness of Fit Test on the Chi-square value is useful. If Hosmer and Lemeshow's Goodness of Fit Test has a value greater than 0.05, then the model is suitable for predicting the observation value, and the mode I may be accepted.

Table 2 Hosmer and Lemeshow's Goodness of Fit Test Manufacturing companies by sector

	Chi-square	df	Sig.	
All Manufacturing Company Period 2017 - 2020	20.729	8	0.008	
Basic & Chemical Industry Sector	31.866	8	0.000	
Multi-Industrial Sector	8.898	8	0.351	
Consumer Goods Industry Sector	4.494	8	0.810	

Across all manufacturing firms in the study period 2017–2020, Hosmer and Lemeshow's Test found a significant level of 0.008 < 0.05. To sum up, it can be said that during the 2017-2020 manufacturing firm era, the model fails to forecast the observations' value or is accepted since it does not match the observation data. Since the significance level of the Hosmer and Lemeshow's Test for the basic and chemical industries was 0.000 < 0.05, the findings were disregarded. Therefore, it is argued that the model cannot forecast the observed value or that the model cannot be adopted since it does not match the observation data in the basic and chemical business. Meanwhile, Hosmer and Lemeshow's Test findings were accepted across various industries due to a significant level of 0.351 > 0.05. This means it can be put to use in analytical pursuits. Hosmer and Lemeshow's test findings for the consumer goods industry are also accepted due to their substantial value of 0.810 > 0.05. So, either the model may be used to forecast the observation's value, or the model can be accepted since it fits the observation data.

b. Classification Matrix Test

It is possible to measure the efficacy of a logistic regression model used to foretell a manufacturer's financial viability by looking at their classification matrix test score. Below is a table displaying the matrix used for categorizing things.

Table 3. Classification Matrix

Observed		М	Whole anufactu Compan	cturing Industry Sector			ctor	Multi-Industrial Sector Manufacturing Company			Manufacturing Companies in the Consumer Goods Industry Sector			
	ED	Not Experiencing Financial Distress	0	235	0	74	19	79.6	0	53	0	83	6	93.3
Step 1	FD	Experiencing Financial Distress	0	247	100	17	106	86.2	0	79	100	7	38	84.4
Overall Percentage				51.2			83.3			59.8			90.3	

For 2017-2020, this logistic regression model successfully predicts the categorization of 139 out of 482 manufacturing enterprises. The manufacturing industry has produced very poor accuracy results for the prediction model. Thus it is required to test the model per industrial sector. Logistic regression accurately predicts the presence or absence of 58 out of 216 data points for manufacturing enterprises in the basic and chemical industry, according to the categorization matrix. The lack of a statistically significant discrepancy between the projected data and the observed data is indicative of a solid regression model, which is supported by the high percentage of the correctness of the classification table. Of the 132 data points used to create a classification matrix for manufacturers across industries, 59.8% can be explained using this logistic regression model. This model was applied to 33 different firms. There is no statistically significant discrepancy between the projected and observed data, indicating that the regression model is accurate. This logistic regression model successfully predicts the presence or absence of 25 manufacturing enterprises (134 data) in the consumer products industry or 90.3% of the time.

Indicative of a successful regression model is the high proportion of correct classifications in the table.

c. Overall Fit Model Test

This is done by calculating the difference between the probabilities of -2 log-likelihood at the start of the experiment and -2 log-likelihood after the experiment. The value is -2 log-likelihood when the model contains just constants (Block Number = 0) and -2 log-likelihood when the model contains both dependent constants and variables (Block Number = 1). If the postulated model agrees with the data, the value of the probability of -2 log-likelihood will drop from Step 1 to Step 2. As can be seen below, both the study's initial and ending log-likelihood values (a measure of probability) were -2.

Table 4. Iteration History -2 Log likelihood

Whole Manufacturing Company			Indust	al & Basic ry Sector ring Company		ıstrial Sector ring Company	Manufacturing Companies in the Consumer Goods Industry Sector		
Iteration		-2 Log	Coefficients	-2 Log	Coefficients	-2 Log	Coefficients	-2 Log	Coefficients
iteration		likelihood	Constant	likelihood	Constant	likelihood	Constant	likelihood	Constant
Step 0	1	667.895	0.05	295.259	.280	177.836	.399	171.044	682
	2	667.895	0.05	295.259	.280	177.836	.399	171.044	682
Step 1	1	423.965	2.118	180.420	6.076	126.717	-2.624	72.601	-3.955
	2	379.966	2.483	176.145	5.840	116.687	-2.869	65.913	-9.075
	3	372.109	1.923	175.719	5.430	115.320	-3.670	64.559	-13.070
	4	371.707	1.560	175.714	5.375	115.278	-3.859	64.476	-14.313
	5	371.705	1.528	175.714	5.374	115.278	-3.866	64.475	-14.403
	6	371.705	1.528	175.714	5.374	115.278	-3.866	64.475	-14.404

a. Constant is included in the model.

All manufacturing firms for 2017-2020 have a -2 Log-likelihood value of 667,895, as shown in both tables. After including six independent variables, the final value of -2 Log probability was 371,705. The regression mode I fit the data is revealed by decreasing the value of -2 Log-likelihood. In addition, the initial workforce count for the basic & chemical industry was 295,259. After including all six independent variables, the final value of -2 Log probability was 175,714. The regression mode I fit with the data is indicated by a drop in the value of -2 Log-likelihood. Value -2 At the outset, the log-likelihood of manufacturing firms in the multi-industrial sector is 177,836. After including all six independent variables, the final value of -2 Log probability was 115,278. If the value of the -2 Log likelihood goes down, the regression mode I fit with the data becomes more probable. Value -2 In the beginning, the log-likelihood of a manufacturing company in the consumer products sector is 171,044. The final value of -2 Log likelihood after including all six independent variables was 64,475. The regression mode I fitted with the data shows the drop in value of -2 Log-likelihood.

d. Coefficient of Determination Test (Nagelkerke's R Square)

This analysis is performed to determine the extent to which the independent factors explain the variance in the dependent variable. Nagelkerke's R Squared test outcomes are listed below.

Table 5. Nagelkerke R Square

	-2 Log likelihood	Cox & SneII R Square	Nagelkerke R Square
All Manufacturing Company Period 2017-2020	371.705a	.459	.612
Chemical & Basic Industry Sector Manufacturing Company	175.714a	.425	.570
Multi-Industrial Sector Manufacturing Company	115.278a	.377	.510
Manufacturing Companies in the Consumer Goods Industry Sector	64.475a	.549	.761

Source: Results of Data Processing with SPSS 24 (2022)

b. Initial -2 Log Likelihood: 667.895

c. Estimation terminated at iteration number 2 because parameter estimates changed by less than .001.

Nagelkerke's r square is 0.612 for the 2017–2020 manufacturing industry. These findings indicate that the covid19 epidemic, profitability, liquidity, leverage, inflation, and currency rates together account for 61.2% of the variance in financial hardship factors; the remaining 38.8% are explained by additional variables not included in this study. Nagelkerke's r-squared is 0.570 in the basic and chemical manufacturing sector. These findings indicate that the covid19 epidemic, profitability, liquidity, leverage, inflation, and currency rates may account for 57.0% of the variance in financial hardship factors; the remaining 43.0% is explained by variables not included in this study.

Also, Nagelkerke's r square is 0.510 across various manufacturing organisations in different industries. Based on these findings, we may deduce that the covid19 pandemic, profitability, liquidity, leverage, inflation, and currency rates all contribute to differences in financial hardship by a combined 51.0%. The remaining 49.0% are explained by variables not included in this study. If so, then 0.761 is Nagelkerke's r square. Results show that the covid19 epidemic, profitability, liquidity, leverage, inflation, and currency rates can explain 76.1% of the variance in financial distress factors, while other variables explain the remaining 23.9%.

Hypothesis test

The results of the logistic regression test can be seen below:

Table 6. Hypothesis Testing Results

	Table 6. Hypothesis Testing Results							
		В	Sig.	Information				
Covid-19	All Manufacturing Company Period 2017-2020	-0.150	0.856	Rejected				
	Basic & Chemical Industry Sector	0.281	0.813	Rejected				
	Multi-Industrial Sector	-1.428	0.330	Rejected				
	Consumer Goods Industry Sector	1.868	0.410	Rejected				
ROA	All Manufacturing Company Period 2017-2020	-28.418	0.000	Received				
	Basic & Chemical Industry Sector	-24.925	0.000	Received				
	Multi-Industrial Sector	-29.755	0.000	Received				
	Consumer Goods Industry Sector	-35.646	0.000	Received				
CR	All Manufacturing Company Period 2017-2020	-0.480	0.000	Received				
	Basic & Chemical Industry Sector	-0.345	0.086	Rejected				
	Multi-Industrial Sector	-0.373	0.015	Received				
	Consumer Goods Industry Sector	-0.598	0.109	Rejected				
DER	All Manufacturing Company Period 2017-2020	1.462	0.000	Received				
	Basic & Chemical Industry Sector	1.915	0.000	Received				
	Multi-Industrial Sector	1.045	0.000	Received				
	Consumer Goods Industry Sector	3.179	0.003	Received				
INFLATION	All Manufacturing Company Period 2017-2020	0.101	0.893	Rejected				
	Basic & Chemical Industry Sector	0.219	0.840	Rejected				
	Multi-Industrial Sector	-0.315	0.810	Rejected				
	Consumer Goods Industry Sector	1.468	0.462	Rejected				
EXCHANGE RATE	All Manufacturing Company Period 2017-2020	-0.078	0.911	Rejected				
	Basic & Chemical Industry Sector	-0.437	0.668	Rejected				
	Multi-Industrial Sector	0.434	0.728	Rejected				
	Consumer Goods Industry Sector	0.668	0.701	Rejected				

Source: Results of Data Processing (2022)

Based on the data in the table above, it is clear that the manufacturing industry consistently rejects Covid-19, Inflation, and Exchange Rate factors. This study's findings on the Covid-19 variable are in contrary with those of Armadani et al. (2021) which suggested that the COVID-19 pandemic would impact the frequency with which company experience financial distress. However, this finding is similar to Pujianty and Khairunnisa (2021), which found that Inflation did not negatively impact firms that could foresee the effects of macroeconomic factors. Wafi et al.'s (2021) study revealed no correlation between inflation and financial distress is also consistent with these findings.

Exchange rate has never been correlated with economic distress. A corporation that receives a significant portion of its revenue from overseas sales is said to have a natural hedge by Pujianty & Khairunnisa (2021). Therefore, the state of financial distress is unaffected by the rise in the exchange rate. This finding is consistent with previous studies by Sulistyani (2018) and Pujianty & Khairunnisa (2021), which also revealed that currency exchange rates did not influence financial hardship.

Both ROA and DER are well recognized. Return on Assets (ROA) indicates how effective a firm is in managing its assets to cover all of its operating expenses and make substantial profits with little risk of going bankrupt. Consistent with the findings of Dewi et al. (2019), this study found that higher levels of profitability are associated with lower levels of financial distress. Leverage has a positive and persistent influence on financial distress, as measured by the DER variable. Any time a business relies heavily on debt financing to operate, it jeopardizes itself. Consistent with the findings of Bachtiar (2022), Heriyanto et al. research's demonstrate that leverage influences the incidence of financial distress.

While CR is widely accepted in the manufacturing sector and across many industries between 2017 and 2020, it is widely rejected in the basic and chemical industries and the consumer products sector. It demonstrates that liquidity is irrelevant in explaining economic downturns. Meanwhile, it demonstrates that liquidity influences financial distress in all industrial business areas and in many parts of the consumer sector. The findings are consistent with those of Sariroh (2021), who concluded that liquidity did not influence the incidence of a financial crisis. On the other hand, Septiani & Dana (2019) and Dewi et al. (2019) discovered that liquidity influences the incidence of financial distress.

CONCLUSION AND SUGGESTION

Conclusion

Manufacturing companies and the manufacturing sector are still experiencing financial problems. However, this is not attributable to the Covid-19 epidemic (basic & chemical industry sector, various industrial sectors, and the consumer goods industry sector). All manufacturing enterprises and the manufacturing sub-sector are negatively impacted by profitability. To varying degrees, manufacturing firms' ability to access liquid economic resources may contribute to financial stress. However, financial distress in the industrial sector is unaffected by liquidity. In both the overall manufacturing industry and the manufacturing industry itself, financial distress is influenced by leverage. All manufacturing enterprises and the manufacturing sub-sector are immune to financial distress from inflation and currency rate fluctuations.

Suggestion

Financial distress may be avoided if the company's management pays close attention to its debt and profitability to prevent, analyze, and optimize its performance. Investors are advised before investing in a manufacturing company to consider the DER ratio of the company, whether it is still reasonable when compared to the DER ratio of similar industries. Investors also need to pay attention to the profitability factor, because companies that have high profitability will find it easier to manage cash flow so as to avoid financial distress. Further researchers are advised to extend the research period until 2021 so that the impact of COVID-19 on financial distress can be analyzed in depth. The prediction capacity of the resultant model may be improved by using data from more than four years and studying objects outside of manufacturing, such as mining and finance (banking and insurance) organizations.

REFERENCES

- Afriyeni, E., & Jumyetti, J. (2017). Faktor-Faktor Makro Ekonomi Dalam Memprediksi Kondisi Financial Distress. *Jurnal Poli Bisnis*, 8(2), 1–8.
- Armadani, A., Fisabil, A. I., & Salsabila, D. T. (2021). Analisis Rasio Kebangkrutan Perusahaan pada Masa Pandemi Covid-19. *Jurnal Akuntansi*, 99–108.
- Bachtiar, A. (2022). Pengaruh Profitabilitas, Leverage, Capital Intensity, Dan Arus Kas Operasi Terhadap Financial Distress. *Jurnal Ilmu Dan Riset Akuntansi (JIRA)*, 11(1), 1–19.
- Cahyani, D. M., & Diantini, N. N. A. (2016). Peranan Good Corporate Governance Dalam Memprediksi Financial Distress. *Jurnal Manajemen, Strategi Bisnis Dan Kewirausahaan, 10*(2), 144–155.
- Ceylan, I. E. (2021). The Impact of Firm-Specific and Macroeconomic Factors on Financial Distress Risk: A Case Study from Turkey. *Universal Journal of Accounting and Finance*, *9*(3), 506–517.
- Christine, D., Wijaya, J., Chandra, K., Pratiwi, M., Lubis, M., & Nasution, I. (2019). Pengaruh Profitabilitas, Leverage, Total Arus Kas dan Ukuran Perusahaan terhadap Financial Distress pada Perusahaan Property dan Real Estate yang Terdapat di Bursa Efek Indonesia Tahun 2014-2017. *Jurnal Ekonomi & Ekonomi Syariah*, 2(2), 340–350.
- Dewi, N. K. T. S., & Dana, I. M. (2017). Pengaruh Growth Opportunity, Likuiditas, Non-Debt Tax Shield Dan Fixed Asset Ratio Terhadap Struktur Modal. *E-Jurnal Manajemen Unud*, 6(2), 772–801.
- Dewi, N. L. P. A., Endiana, I. D. M., & Arizona, I. P. E. (2019). Pengaruh RasioLikuiditas, Rasio Leverage Dan Rasio Profitabilitas Terhadap Financial DistressPada Perusahaan Manufaktur. *Kumpulan Hasil Riset Mahasiswa Akuntansi*, 1(1), 322–333.
- Ghozali, I. (2011). *Aplikasi Analisis Multivariate Dengan Program IBM SPSS 19, Edisi 5.* Badan Penerbit Universitas Diponegoro.
- Hadiwardoyo, W. (2020). Kerugian ekonomi nasional akibat pandemi Covid-19. *Journal of Business and Entrepreneurship*, *2*(2), 83–92.
- Heriyanto, S., Rohaida, I., & Guli. (2022). Pengaruh Profitabilitas, Likuiditas dan Leverage Terhadap Financial Distress (Studi Pada Perusahaan Pt. Krakatau Steel). *PUBLIK*, 18(2), 69–81.
- Herry. (2015). Analisis Laporan Keuangan. CAPS.
- Khasanah, U., Sulistyowati, R., Hirmantono, A., & Mas'adah, M. (2020). Pengaruh informasi akuntansi biaya terhadap nilai perusahaan serta implikasinya terhadap tanggungjawab perusahaan kepada stakeholder. *Jurnal Ekonomi Modernisasi*, *16*(2), 105–116.
- Kurniasanti, A., & Musdholifah, M. (2018). Pengaruh Corporate Governance, Rasio Keuangan, Ukuran Perusahaan dan Makroekonomi Terhadap Financial Dsitress. *Jurnal Ilmu Manajemen*, *6*(3), 197–212.
- Machmuddah, Z. (2019). Rasio Keuangan Dan Prediksi Financial Distress. *Jurnal Penelitan Ekonomi Dan Bisnis*, *2*(2), 58–67.
- Nukmaningtyas, F., & Worokinasih, S. (2018). Penggunaan rasio profitabilitas, likuiditas, leverage dan arus kas untuk memprediksi financial distress (Studi pada perusahaan sektor aneka industri yang terdaftar di bursa efek Indonesia periode 2013-2016). *Jurnal Administrasi Bisnis*, *61*(2), 127–135.
- Pamungkas, D. R. W., Hadiani, F., & Purbayati, R. (2021). Analisis Fakor Internal dan Eksternal yang Memengaruhi Financial Distress Bank Umum Syariah Periode 2014-2018. *Journal of Applied Islamic Economics and Finance*, 1(2), 446–457.
- Pawitri, A. I., & Alteza, M. (2020). Analisis Pengaruh Likuiditas, Profitabilitas, Leverage, Operating Capacity, dan Biaya Agensi Manajerial Terhadap Financial Distress. *Jurnal Fokus Manajemen Bisnis*, *10*(2), 149–168.
- Pujianty, I., & Khairunnisa, K. (2021). Pengaruh Likuiditas, Profitabilitas, Inflasi Dan Nilai Tukar Terhadap Financial Distress (studi Pada Perusahaan Sub Sektor Tekstil Dan Garmen Di Bursa Efek Indonesia Periode 2014-2018). *EProceedings of Management*, 8(5), 5219–5226.
- Rani, P. (2017). Pengaruh Ukuran Perusahaan, Financial Distress, Komite Audit, dan Komisaris Independen Terhadap Tax Avoidance (Studi Empiris pada Perusahaan Manufaktur yang terdaftar di Bursa Efek Indonesia Tahun 2012-2016). *Jurnal Akuntansi Dan Keuangan, 6*(2), 221–241.
- Razak, A., Nurfitriana, F. V, Wana, D., Ramli, R., Umar, I., & Endri, E. (2020). The Effects of Financial Performance on Stock Returns: Evidence of Machine and Heavy Equipment Companies in Indonesia. *Research in World Economy*, *11*(6), 131–138.
- Rodoni, A., & Herni. (2014). Manajemen Keuangan Modern. Mitra Wacana Media.

- Rohiman, S. F., & Damayanti, C. R. (2019). Pengaruh Inflasi, Nilai Tukar dan Suku Bunga Terhadap Financial Distress (Studi pada Semua Perusahaan yang Terdaftar di Bursa Efek Indonesia Periode 2013-2017). *Jurnal Administrasi Bisnis*, 72(2), 186–195.
- Sariroh, H. (2021). Pengaruh Likuiditas, Leverage, Profitabilitas, dan Ukuran Perusahaan terhadap Financial Distress di Sektor Trade, Service, and Invesment. *Jurnal Ilmu Manajemen*, *9*(3), 1–14.
- Sehgal, S., Mishra, R. K., & Jaisawal, A. (2021). A search for macroeconomic determinants of corporate financial distress. *Indian Economic Review*, *56*(2), 435–461.
- Septiani, N. M. I., & Dana, I. M. (2019). Pengaruh likuiditas, leverage, dan kepemilikan institusional terhadap financial distress pada perusahaan property dan real estate. *E-Jurnal Manajemen*, 8(5), 3110–3137.
- Silalahi, D. E., & Ginting, R. R. (2020). Strategi Kebijakan Fiskal Pemerintah Indonesia Untuk Mengatur Penerimaan dan Pengeluaran Negara Dalam Menghadapi Pandemi Covid-19. *Jurnal Ekonomi Dan Ekonomi Syariah*, 3(2), 156–167.
- Sudana, I. M. (2015). Teori Dan Praktik Manajemen Keuangan Perusahaan. Erlangga.
- Sudrajat, J., & Setiyawati, H. (2021). Role of Firm Size and Profitability on Capital Structures and Its Impact Over Firm Value. *Dinasti International Journal of Economics, Finance, and Accounting,* 2(1), 13–27.
- Sugiyono. (2016). Metode Penelitian Kuantitatif, Kualitatif dan R&D. Bandung: PT Alfabet.
- Suhaidar, Rosalina, E., & Pratiwi, A. (2020). Faktor-Faktor Yang Mempengaruhi Penghindaran Pajak Dampak Sebelum dan Selama Covid-19 Pada Perusahaan Manufaktur. *Conference on Economic and Business Innovation*, 19(11), 3–16.
- Sulistyani, T. (2018). Dampak Nilai Tukar, Status Dan Metode RGEC Dalam Memprediksi Kondisi Financial Distress Perbankan Indonesia. *KREATIF: Jurnal Ilmiah Prodi Manajemen Universitas Pamulang*, 6(2), 18–36.
- Suriyani, N. K., & Sudiartha, G. M. (2018). Pengaruh tingkat suku bunga, inflasi dan nilai tukar terhadap return saham di Bursa Efek Indonesia. *E-Jurnal Manajemen Unud*, *7*(6), 3172–3200.
- Syafrida, S., & Suryani, R. (2020). Pemutusan hubungan kerja masa pandemi Covid-19 perusahaan terancam dapat dipailitkan. *Pamulang Law Review*, *3*(1), 19–30.
- Ulum, I. (2009). Intellectual Capital Konsep dan Kajian Empiris. Graha Ilmu.
- Wafi, A., Mardani, R. M., & Wahono, B. (2021). Pengaruh Inflasi, Nilai Tukar, Harga Minyak Dunia Dan Suku Bunga Terhadap Financial Distress (Studi Pada Perusahaan Manufaktur Yang Terdaftar Di Bei Tahun 2019-2020). *Jurnal Ilmiah Riset Manajemen*, 10(4), 1–14.
- Widarjo, W., & Setiawan, D. (2009). Pengaruh rasio keuangan terhadap kondisi financial distress perusahaan otomotif. *Jurnal Bisnis Dan Akuntansi*, 11(2), 107–119.
- Widiati, L. W., & Pratama, B. (2015). *Pengaruh Current Ratio, Debt To Equity Ratio, dan Return On Equity Untuk Memprediksi Kondisi Financial Distress*. Prosiding Seminar Nasional Multi Disiplin Ilmu & Call For Papers Unisbank.
- Yati, S., & Patunrui, K. I. A. (2017). Analisis Penilaian Financial Distress Menggunakan Model Altman (Z-Score) Pada Perusahaan Farmasi Yang Terdaftar di Bursa Efek Indonesia Periode 2013-2015. *Jurnal Akuntansi, Ekonomi Dan Manajemen Bisnis*, 5(1), 55–71.
- Yuliana, N., & Utami, W. (2022). The Effect of Sustainability Disclosure, Corporate Governance Mechanism and Intellectual Capital on Financial Performance. *Accounting Research Journal of Sutaatmadja (ACCRUALS)*, 06(01), 42–52.
- Yusuf, M. Y. (2017). *Islamic Corporate Social Responsibility (I-CSR) pada Lembaga Keuangan Syariah (LKS)*. Kencana.