

THE EFFECT OF THIN CAPITALIZATION, CAPITAL INTENSITY, FINANCIAL DISTRESS ON TAX AGGRESSIVENESS WITH AUDIT QUALITY AS MODERATING VARIABLES

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ABSTRACT

This study examined factors affecting tax aggressiveness, such as thin capitalization, capital intensity, financial distress. It also examines the relationship between audit quality moderating tax aggressiveness with thin capitalization, capital intensity, and financial distress. The population in this study are companies in the industrial sub-sector in 2016-2020, with a total sample of 37 companies. The analysis technique uses the panel data regression method. Thin capitalization has a positive effect on tax aggressiveness, capital intensity and financial distress do not affect tax aggressiveness, audit quality can weaken thin capitalization on tax aggressiveness, audit quality can strengthen the capital intensity and financial distress on tax aggressiveness.

Keywords: Thin Capitalization, Capital Intensity, Financial Distress, Audit Quality, Tax Aggressiveness

INTRODUCTION

Year	Target Ratio	Realizati on Ratio	Tax Ratio
2015	70%	60%	11.6
2016	73%	61%	10.8
2017	75%	73%	10.7
2018	80%	71%	11.4
2019	85%	73%	11.1
2020	80%	78%	11.6

Ministry of Finance data

Tax is the most significant income received compared to other state income. Based on data obtained in the APBN Kita issued by the Ministry of Finance in 2020, in the last six years, tax revenue in Indonesia has not been able to meet the previously agreed. The tax ratio

is the impact of not achieving the tax revenue realization target. Indonesia has a tax ratio of 10-11% and is ranked 21 out of 24 countries in Asia and the Pacific (DDTC).

In taxation, the tax authorities, government, and companies have different interests. Fiskus and the government are trying to optimize taxes. However, on the one hand, agencies and taxes always try to suppress the taxes that must be paid for their benefits (Olivia, & Dwimulyani, 2019).

Frank et al. (2009) describe the notion related to tax aggressiveness as manipulating taxable income by carrying out a tax planning both legally, which is usually known as tax avoidance, or illegally, which is better known as tax evasion. The phenomenon of tax aggressiveness in Indonesia has occurred a lot. Based on the Tax Justice Network research, Indonesia ranks fourth with the highest level of tax aggressiveness. (DDTC, 2020).

In the sub-sector of various industries, two companies have been identified as carrying out tax aggressiveness. The first was PT Garuda Metalindo in 2016 due to an injection of funds from the bank for capital expenditure of IDR 200 billion. This caused short-term debt and in June 2016 short-term debt increased by IDR 200 billion so that the tax paid was smaller. (Rakhmawati & Prastiwi, 2021). Then PT. Toyota Motor Manufacturing Indonesia. reported to have taken aggressive tax actions to reduce corporate profits in 2008. Based on the Directorate General of Taxes inspection, the company recorded an understatement of 1.6 trillion. This causes the company to pay a tax shortfall of IDR 500 billion (Nasional.Konten, 2013).

Based on several cases above, thin capitalization is a factor that relates to tax aggressiveness. Thin capitalization is a funding structure that focuses on debt compared to share capital. Companies usually do this to avoid tax. Because in taxation, interest due to debt has special treatment. Because the interest expense arising from debt is a deductible expense, it is not subject to tax. So it reduces the tax paid by the company (Selistiaweni et al, 2020). However, the research by Selistiaweni et al. (2020) and Olivia & Dwimulyani (2019) explains that tax aggressiveness does not have a significant effect on thin capitalization. This is because after the Government Regulation No. 169/PMK.010/2015 was passed, limiting the 4:1 ratio between debt and capital of a company; the company complies to suppress the sanctions given.

The next factor that affects tax aggressiveness is the capital intensity with tax aggressiveness because the company's fixed assets cause a depreciation expense that can be used to reduce taxes owed. Capital intensity has many opportunities to implement tax planning (Ariefiara et al., 2020). However, in Monica & Noviari (2021) study, and Selistiaweni et al. (2021), capital intensity does not affect tax aggressiveness. This is because companies investing in fixed assets hope to increase the company's profit potential and operational interests compared to reducing tax payments.

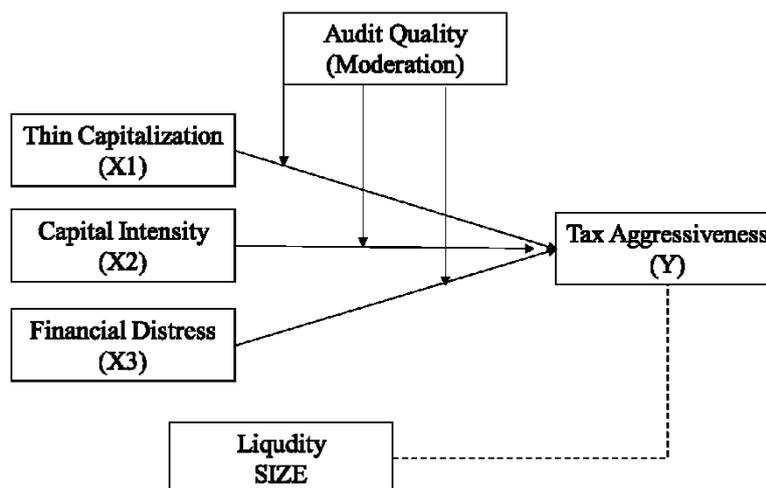
Financial distress also impacts tax aggressiveness because it can be a sign of bankruptcy for the company. According to the research results of Nadhifah & Arif (2020) companies that are in financial distress try not to implement tax avoidance in their companies to maintain the company's image. This is used so as not to give a negative signal to stakeholders. Then research Dhamara & Violita (2017), Ahdiyah & Triyanto (2021) explain

that financial distress does not affect tax aggressiveness. This is because a company is considered to reduce cash disbursements by saving the company's operational activities.

In this study, audit quality is used as a moderating variable. Audit quality is the possibility of the auditor revealing violations in the financial statements because the auditor will assess the fairness and disclosure of the company's financial statements with generally accepted accounting principles so that it is expected to minimize the company's tax aggressiveness (Suyono, 2018).

The Covid-19 pandemic also strengthens the variables used in this research, during the pandemic, the Company experienced problems. After all, the source of funding through pandemic share capital was unreliable. Therefore, as many as 135 companies issued corporate debt securities not to aggravate the company's cash flow with an outstanding value of Rp 418.21 trillion. In addition, several issuers directly sell assets owned by the company; this is done by small issuers and even large issuers on the IDX. One example in the various industrial sectors is PT Astra International Tbk (ASII). The Covid-19 pandemic factor also caused the company to experience a decrease in income. Based on the Association of Indonesian Issuers (AEI), there are more than 50 issuers on the stock exchange experiencing financial distress due to the pandemic (CNBC, 2020)

. This study examined factors affecting tax aggressiveness, such as thin capitalization, capital intensity, financial distress. It also examines the relationship between audit quality moderating tax aggressiveness with thin capitalization, capital intensity, and financial distress.



Based on this description, the formulation hypothesis used are follows.

H1: Thin Capitalization Positively Affects Tax Aggressiveness

H2: Capital Intensity Positively Affects Tax Aggressiveness

H3: Financial Distress Negative Effect on Tax Aggressiveness

H4: Audit Quality Weakens the Effect Between Thin Capitalization and Tax Aggressiveness

H5: Audit Quality Weakens the Effect of Capital Intensity with Tax Aggressiveness

H6: Audit Quality Weakens the Effect Between Financial Distress and Tax Aggressiveness

METHOD

The research approach used is quantitative. The population used in this study are companies in the various industrial sub-sectors in 2016-2020 listed on the Indonesia Stock Exchange (IDX). The various industry sub-sectors were chosen because there were 2 cases of tax aggressiveness in the background, and the COVID-19 pandemic strengthened the variable factors that led to tax aggressiveness. This supporting the potential for tax aggressiveness in the various industrial sub-sectors. The source of the data for this research is the financial report data and the annual report used is obtained from the official website of the Indonesia Stock Exchange, namely www.IDX.co.id and the company's official website. The research sample is 36 companies from in the various industrial sub-sectors.

Tools

Tax aggressiveness

the measurement used in this research is using Abnormal Book Tax differences. According to Hutomo et al, (2021) ABTD is a regression result from the calculation of Book Tax Difference where the development of the ABTD value is absolute.

$$BTD_{it} = BI_{it} - \left(\frac{CTE_{it}}{STR_t} \right)$$

Abnormal BTD constitutes a residual regression as depicted in the following models

$$BTD_{it} = h_0 + h_1 \Delta INV_{it} + h_2 \Delta REV_{it} + h_3 NOL_{it} + h_4 TLU_{it} + \varepsilon_{it}$$

Thin Capitalization

to determine the value of thin capitalization an agency can use the debt-to-equity ratio (DER) formula because DER can assess the level of debt borne by the company to finance operational activities in the company (Marfu'ah et al, 2021)

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

Capital intensity

expressed as a ratio of the intensity of fixed assets. By comparing the strength between fixed assets and all assets owned by the company (Fatimah et al, 2021).

$$\text{Capital Intensity} = \frac{\text{Fixed Assets}}{\text{Total Assets}}$$

Financial Distress

Measurement of financial distress using the Zmijewski uses dummy data, if the results of the Zmijewski model calculation produce a value of $X > 0$ the company is considered to have financial problems then it is given a value of 1, while if $X < 0$ the company is considered not to have financial problems so it will be given a value of 0 (Octaviani & Sofie, 2018)

$$X - \text{score} = -4.3 - 4.5 \text{ ROA} + 5.7 \text{ DAR} - 0.004 \text{ CR}$$

Audit Quality

This study is audit quality using the earning surprise benchmark (ESB). Pamungkas & Gantowati (2021) explain that this measurement is used to determine the company's earnings management. An essential element in measuring audit quality is ROA. This measurement uses dummy data with the following criteria:

1. When $ROA - < ROA < +$, gets a dummy of 1 because the audit quality is high because it does not provide management opportunities to take earnings management actions.
2. When $ROA > +$ or $ROA < -$ audit quality will be assessed as low because an auditor is considered to provide an opportunity for company management to conduct earnings management. So that a dummy value of 0 was given.

Methods of Data

Analysis Data analysis in this study used panel data regression. Linear regression analysis of panel data is used to test H1, which is thin capitalization H2, capital intensity, and H3 is financial distress on tax aggressiveness. The multiple linear equation models is as follows:

$$ABTD_{it} = \alpha + \gamma_1 TCAP_{it} + \gamma_2 CI_{it} + \gamma_3 FD_{it} + \gamma_4 KA_{it} + \gamma_5 LIQ_{it} + \gamma_6 SIZE_{it} + e_i$$

Researchers used the (Moderated Regression Analyze) to test H₄, H₅, and H₆, namely the ability of audit quality to moderate the effect of thin capitalization, capital intensity, and financial distress on tax avoidance. The MRA equation model is as follows:

$$AP_{it} = +_1 TCAP_{it} +_2 CI_{it} +_3 FD_{it} +_4 KA_{it} +_5 TCAP * KA +_6 CI * KA +_7 FD * KA + \beta_8 LIQ_{it} +_9 SIZE_{it} + e_{it}$$

Information:

AP	=	Tax Aggressiveness	TCAP	=	Thin Capitalization
α	=	Constanta	CI	=	Capital Intensity
β	=	Regression Coefficient	FD	=	Financial Distress
γ	=	Regression Coefficient	KA	=	Audit Quality
i	=	Entities to i	LIQ	=	Liquidity
t	=	Period to t	SIZE	=	Size
e	=	Error			

RESULTS AND DISCUSSION

Model 1					
<i>Fixed Effect Model</i>					
	Coefficient	T	P> z	Prediksi Hipotesis	Kesimpulan
TCAP	0.00374	2.16	0.031*	H1: +	H1 diterima
CI	-0.0186	-1.2	0.230	H2: +	H2 ditolak
FD	0.00906	1.14	0.253	H3: -	H3 ditolak
LIQ	-0.00060	-0.36	0.720		
SIZE	-0.00542	-2.78	0.050*		
_cons	0.0093689	-0,14	0,256		
Model 2					
<i>Random Effect Model</i>					
	Coefficient	T	P> z	Prediksi Hipotesis	Kesimpulan
TCAP	0.00732	2.15	0.031*		
CI	-0.02312	-1.66	0.097**		
FD	-0.02195	-2.38	0.017*		
KA	-0.02666	-2.96	0.003*		
TCAPKA	-0.00514	-2.06	0.039*	H4: -	H4 diterima
CIKA	0.04728	3.22	0.001	H5: -	H5 ditolak
FDKA	0.02453	2.67	0.008	H6: -	H6 ditolak
LIQ	0.00001	0.02	0.986		
SIZE	0.00207	1.74	0.081**		
_cons	-0,018029	-4,17	0.000		

AP = Tax Aggressiveness: TCAP= Thin Capitalization: CI Capital Intensity: FD = Financial distress: KA = Audit Quality: LIQ = Liquidity: SIZE = Company Size

Source: Output STATA v.17.0 and has been processed

Thin capitalization to tax aggressiveness with significance 3% or lower than 5% significance with a coefficient of 0.00374 so that thin capitalization has a positive effect on tax aggressiveness. This is in line with previous research by Indrawan et al (2021). due to debt, incur interest expense. So that the greater the debt in the company causes the company's interest expense to be high. Interest expense is a tax deduction, this affects the company's profit so that the company will pay less tax. When compared to companies that use equity capital, they cannot use tax incentives because dividends are not a deduction from taxable income. This is supported by the theory of bearer force when the company has more burdens because the debt owned by the company causes the tax paid by the company to be smaller.

Capital intensity on tax aggressiveness with a significance of 23% or lower than a significance of 5%. The conclusion is that Capital intensity has no effect on tax aggressiveness. This is in line with the journal Manihuruk et al (2021) Due to the high

ownership of fixed assets in the manufacturing sector because usually manufacturing companies continue to use fixed assets that have exceeded their useful life. This is in line with the research conducted by Monica & Noviari (2021) and Irianto et al. (2017) companies that have a high level of capital intensity are used for operational purposes where fixed assets owned by large companies can increase the company's profitability and can increase the reputation and value of the company. So an agent does not focus on corporate tax avoidance and does not want to damage the company's image by doing tax aggressiveness.

Financial distress on tax aggressiveness with a significance of 25.3% or lower than a significance of 5%. So financial distress has no effect on tax aggressiveness. This is supported by Rani's research (2017) when a company suffers a loss, the company will be free from taxes and receive future tax loss compensation which is valid for five years. The focus of the company when experiencing financial distress is that the company will reduce the burden and cash outflow so as not to worsen the company.

Audit quality moderates thin capitalization on tax aggressiveness with a significance of 3.9% and coefficient of -0.02666. So that audit quality can weaken thin capitalization with tax aggressiveness. An auditor will ensure that the information in the financial statements is presented appropriately and in accordance with standards and actual conditions. If the auditor who already has good auditor quality can identify companies that practice thin capitalization by looking at the level of the debt to equity ratios. Agencies that have a debt ratio that exceeds capital of 4:1 according to the Minister of Finance Regulation Number 169/PMK.010/2015 are considered to be practicing thin capitalization(Whidyawhati & Sari, 2021).

Audit quality moderates capital intensity on tax aggressiveness with a significance of 0.1% with a coefficient of 0.04728. So that audit quality can strengthen capital intensity with tax aggressiveness. The longer the KAP cooperates with the company, the potential for losing an auditor's independence will appear, so there is a potential tendency towards the company. Fulfill a manager's request, causing a movement to fraud in the practice of tax aggressiveness (Suyadnysa, 2017). According to Nainggolan & Sari (2019), one of the companies that practice tax aggressiveness is to overstate the value of the company's fixed assets; in this case, an auditor will work with management to carry out tax aggressiveness.

Audit quality moderates financial distress on tax aggressiveness at 0.8% significance with a coefficient of 0.04728. So that audit quality can strengthen financial distress with tax aggressiveness. According to Suyadnya (2017), audit tenure allows an auditor not to issue an opinion going concern So that it does not signal to stakeholders. Not getting a going concern is possible for management as an agent to cooperate with an auditor to carry out tax aggressiveness. According to research by Lutfitriyah & Anwar (2021), when a company experiences financial distress, the company will reduce costs as low as possible, including the tax burden. The company will reduce the tax costs that must be paid by doing tax planning by reducing the amount of profit and recognizing the responsibility of tax expense in the future period to the present. So the tax paid by the company will be small.

CONCLUSION

Based on the research, it can be concluded that thin capitalization has a positive effect on tax aggressiveness, capital intensity and financial distress do not affect tax aggressiveness, audit quality can weaken thin capitalization on tax aggressiveness, audit quality can strengthen the capital intensity and financial distress on tax aggressiveness. During the research process, there are still limitations, such as there are still many factors that have the potential for tax aggressiveness, especially by using tax evasion, which is difficult to detect, so this research focuses more on tax aggressiveness using tax avoidance. Then in measuring and thin capitalization, only use Debt to ratio; this does not give an accurate picture of tax avoidance because not all debts have interest expenses. For further research, it is expected to overcome the limitations that exist in this study, such as using thin capitalization that can better represent tax avoidance through corporate debt by utilizing interest expense. In addition, it can use other variables that may have an influence on tax aggressiveness, especially those related to tax evasion.

REFERENCES

- Ahdiyah, A., & Tiyanto, DN (2021). *Impact of Financial Distress, Firm Size, Fixed Asset Intensity, and Inventory Intensity on Tax Aggressiveness*. 4(2), 49–59.
- Ariefiara, D., Utama, S., Wardhani, R., & Rahayu, N. (2020). *Contingent fit between business strategies and environmental uncertainty: The impact on corporate tax avoidance in Indonesia*. *Meditari Accountancy Research*, 28(1), 139–167. <https://doi.org/10.1108/MEDAR-05-2018-0338>
- Azzahra, MF, Setiawan, A., & Sari, RHDP (2021). Faktor-Faktor Yang Memengaruhi Kualitas Audit di Indonesia. *Prosiding Biema*, 2(1), 80–93.
- Dhamara, GP, & Violita, ES (2018). *The Influence of Financial Distress and Independence of Board of Commissioners on Tax Aggressiveness*. *Atlantis Press*, 55(Iac 2017), 81–86. <https://doi.org/10.2991/iac-17.2018.15>
- Fatimah, AN, Nurlaela, S., & Siddi, P. (2021). Pengaruh *Company Size, Profitabilitas, Leverage, Capital Intensity* dan Likuiditas terhadap *Tax Avoidance* pada Perusahaan Makanan dan Minuman yang Terdaftar di Bei Tahun 2015-2019. *EKOMBIS REVIEW: Jurnal Ilmiah Ekonomi Dan Bisnis*, 9(1), 107–118. <https://doi.org/10.37676/ekombis.v9i1.1269>
- Frank, M. margaret, Lynch, LJ, & Rego, SO (2009). *Tax reporting aggressiveness and its relation financial reporting University of Virginia*. *Accounting Review*, 84(2), 467–496.
- Hutomo, MA, Sari, RHDP, & Nopiyanti, A. (2021). Pengaruh Transfer Pricing, Thin Capitalization, Dan Tunneling Incentive Terhadap Agresivitas Pajak. *Prosiding Biema*, 2, 141–157.
- Indradi, D. (2018). Pengaruh Likuiditas, *Capital Intensity* Terhadap Agresivitas Pajak. *Jurnal Akuntansi Berkelanjutan Indonesia*, 1(1), 147.

- Indradi, D., & Sumantri, II (2020). Analisis Penghindaran Pajak Dengan Pendekatan Financial Distress dan Profitabilitas Studi Empiris pada Perusahaan Sektor Industri Barang Konsumsi di BEI Tahun 2013-2017. *Journal Of Applied Managerial Accounting*, 4(2), 262–276.
- Indrawan, DA, Nuraini, M., Wulan, SS, Sururi, UT, & Mulyati, Y. (2021). *Factors Affect Tax Avoidance (Empirical Study on The Mining Sector and Component Listed in The Indonesia Stock Exchange Throughout 2016-2019)*. *Turkish Journal of Physiotherapy and Rehabilitation*, 32(3), 6157–6164.
- Irianto, DBS, Sudibyo, YA, & Wafirli, A. (2017). *The Influence of Profitability, Leverage, Firm Size and Capital Intensity Towards Tax Avoidance*. *International Journal of Accounting and Taxation*, 5(2), 33–41. <https://doi.org/10.15640/ijat.v5n2a3>
- Jensen, MC, & Meckling, WH (1976). *Theory Of The Firm: Managerial Behavior, Agency Costs And Ownership Structure*. *Journal of financial economics*, 3(4), 305-360.
- Jumaiyah, W. (2020). *Pajak Penghasilan: Teori, Kasus dan Praktik* (Issue 1). Lautan Pustaka.
- Marfu'ah, DA, Titisari, KH, & Siddi, P. (2021). Penghindaran Pajak Ditinjau dari Profitabilitas, Leverage, Ukuran Perusahaan dan Komisaris Independen. *Ekonomis: Journal of Economics and Business*, 5(1), 53. <https://doi.org/10.33087/ekonomis.v5i1.265>
- Maulidah, HA, & Pratiwi, D. (2019). Pengaruh Corporate Social Responsibility, Intensitas Modal, dan Persaingan Terhadap Agresivitas Pajak Perusahaan. *Jurnal Akuntansi Unesa*, 8(1).
- Minerva, L., Sumeisey, VS, Stefani, S., Wijaya, S., & Lim, CA (2020). Pengaruh Kualitas Audit, *Debt Ratio*, Ukuran Perusahaan dan *Audit Lag* terhadap Opini Audit Going Concern. *Owner*, 4(1), 254. <https://doi.org/10.33395/owner.v4i1.180>
- Monika, CM, & Noviari, N. (2021). *Open Access the Effects of Financial Distress, Capital Intensity, and Audit Quality on Tax Avoidance*. 6, 282–287.
- Nadhifah, M., & Arif, A. (2020). *Transfer Pricing, Thin Capitalization, Financial Distress, Earning Management, dan Capital Intensity Terhadap Tax Avoidance Dimoderasi oleh Sales Growth*. *Jurnal Magister Akuntansi Trisakti*, 7(2), 145.
- Nainggolan, C., & Sari, D. (2019). Kepentingan Asing, Aktivitas Internasional, dan Thin Capitalization: Pengaruh Terhadap Agresivitas Pajak di Indonesia. *Jurnal Akuntansi Dan Bisnis*, 19(2), 147. <https://doi.org/10.20961/jab.v19i2.421>
- sebagai Variabel Moderasi. *Prosiding Seminar Nasional Pakar Ke 2: Sosial Dan Humaniora*, 2(2), 1–10.
- Pamungkas, WAP, & Gantowati, E. (2021). The Affecting Factors of Audit Quality with Earnings Surprise Benchmark Approach as a Measure of Audit Quality. *European Journal of Business and Management Research*, 6(4), 230–236. <https://doi.org/10.24018/ejbmr.2021.6.4.983>

- Prasetyo, A., & Wulandari, S. (2021). Capital Intensity, Leverage, Return on Asset, dan Ukuran Perusahaan Terhadap Agresivitas Pajak. *Jurnal Akuntansi*, 13, 134–147. <https://doi.org/10.28932/jam.v13i1.3519>.
- Rakhmawati, NA, & Prastiwi, D. (2019). *Pengaruh Leverage, Kepemilikan Manajerial, Komite Audit, dan Kualitas Audit Terhadap Agresivitas Pajak*. 1(2018), 1–11.
- 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. ht
- Romdhon, M., Kartiko, E., & Nurjamilah, S. (2018). Pengaruh Firm Size dan Leverage terhadap Agresivitas Pajak dengan Pengungkapan Corporate Social Responsibility sebagai Variabel Pemoderasi. *Jurnal Wacana Ekonomi Fakultas*, 20(2), 47–57.
- Selistiaweni Safitri, Dianwicakasih Ariefiara, S. (2020). Pengaruh Kepemilikan Keluarga, *Financial Distress* dan *Thin Capitalization* Terhadap Penghindaran Pajak, 1(1), 1059–1076.
- Septiana, A. (2019). Analisis Laporan Keuangan Konsep Dasar Dan Deskripsi Laporan Keuangan (Issue 1). Duta Media Publishing.
- Spence, JT, Helmreich, R., & Stapp, J. (1973). *A Short Version Of The Attitudes Toward Women Scale (AWS)*. *Bulletin of the Psychonomic society*, 2(4), 219-220.
- Suyadnya, IG, & Supadmi, NL (2017). Pengaruh ukuran KAP, audit fee, dan audit tenure pada agresivitas pajak. *E-Jurnal Akuntansi Universitas Udayana*, 21(2), 1131-1159.
- Suyono, & Eko. (2018). Peran Komite Audit dalam Meningkatkan Kualitas Pengungkapan Laporan Keuangan: Bukti Empiris di Bursa Efek Negara-negara Teluk. *Jurnal Visioner & Strategis*, 7(1), 7–16.
- Whidyawhati, V., & Sari, DP (2021). *Analysis of the Influence of Multinational, Audit Quality and Company Size on Thin Capitalization of Manufacturing Companies Listed on the Idx*. *Journal of Accounting, Entrepreneurship and Financial Technology (Jaef)*, 2(2), 93–108. <https://doi.org/10.37715/jaef.v2i2.1830>