

Effects of Tax Collection, Digitalization, and Service Quality on Motor Vehicle Taxpayer Compliance in Padangsidempuan

Nur Asiyah Jamil Rangkuti^{1✉}, Muhammad Lathief Ilhamy Nasution², Nurwani³

^{1,2,3} Faculty of Islamic Economics and Business, Universitas Islam Negeri Sumatera Utara, Medan, 20235, Indonesia

shiaarkt@gmail.com

Abstract

This study aims to analyze the effects of the tax collection system, digitalization of tax services, and service quality on motor vehicle taxpayer compliance in Padangsidempuan City. Motor Vehicle Tax is an important source of Local Own-Source Revenue; however, taxpayer compliance remains a challenge. This study employs a quantitative approach with an explanatory research design. The sample consisted of 100 respondents selected using purposive sampling. Data were collected through a five-point Likert-scale questionnaire and analyzed using Partial Least Squares Structural Equation Modeling (PLS-SEM) with SmartPLS 4. The results show that the tax collection system has a positive and significant effect on taxpayer compliance ($\beta = 0.153$; $p = 0.047$). Digitalization of tax services also has a positive and significant effect ($\beta = 0.488$; $p < 0.001$) and represents the strongest relationship in the model. Service quality likewise has a positive and significant effect ($\beta = 0.380$; $p < 0.001$). Together, the three variables explain 72.4% of the variance in taxpayer compliance. These findings emphasize the importance of continuously strengthening tax administration and digital services.

Keywords: Tax Collection System; Tax Service Digitalization; Service Quality; Taxpayer Compliance

JBE Jurnal is licensed under a Creative Commons Attribution-Share Alike 4.0 International License.



1. Introduction

Taxes are the primary source of government revenue used to fund various development programs and public services (Ajeigbe et al., 2024). Within the structure of the State Budget (APBN), tax revenue has consistently been the largest contributor compared to other revenue sources. In 2024, actual national tax revenue reached Rp1,932.4 trillion, representing a 3.5% increase compared to the previous year. Indonesia's 2024 government revenue figures indicate that the tax sector remains the main pillar of government revenue, as shown in Table 1.

Table 1. Structure of Indonesia's Government Revenue in 2024

Components of Government Revenue	Actual Amount (trillion Rp)	Contribution (%)
Tax Revenue	1.932,4	76,7
PNBP	579,5	23,0
Hibah	7,0	0,3
Total	2.518,9	100,0

Source: Ministry of Finance of the Republic of Indonesia (2025)

According to Table 1, tax revenue accounts for 76.7% of total government revenue. The magnitude of this contribution indicates that taxes play a strategic role in

maintaining national fiscal stability. At the local level, the function of taxes is equally important, as they serve as the primary source of Local Own-Source Revenue (PAD), which is used to finance local government operations and regional development (Lubis et al., 2023; Siregar & Kusmilawaty, 2022). One type of local tax that makes a significant contribution to PAD is the Motor Vehicle Tax (PKB).

Motor Vehicle Tax is one of the components of local taxes with high revenue potential, as the number of motor vehicles continues to increase every year. In addition to being a major source of revenue for the provincial government, Motor Vehicle Tax revenue also benefits regency and city governments through the local tax revenue-sharing mechanism. Despite its significant potential, actual Motor Vehicle Tax revenue has not yet fully met the targets set by local governments. This phenomenon is evident in the motor vehicle tax revenue performance of North Sumatra Province, which has fluctuated in recent years, as shown in Table 2.

Table 2. Provincial Vehicle Tax (PKB) Targets and Actual Figures for North Sumatra Province, 2021–2024

Year	Target (trillion Rp)	Actual Amount (trillion Rp)	Reach (%)
2021	2,12	2,03	95,7
2022	2,45	2,28	93,1
2023	2,76	2,16	78,2

2024	2,98	2,54	85,2
------	------	------	------

Source: North Sumatra Provincial Revenue Agency

Table 2 shows that the realization of Vehicle Tax (PKB) in North Sumatra Province tends to fluctuate and has not yet fully met the set target. The decline in achievement from 95.7% in 2021 to 78.2% in 2023 indicates that there is still untapped revenue potential. This situation indicates that the compliance rate among motor vehicle taxpayers remains a challenge that requires serious attention from local governments. One area facing this challenge is the city of Padangsidempuan. As a city experiencing continuous growth in economic activity and an increase in the number of motor vehicles, Padangsidempuan has significant potential for Vehicle Tax (PKB) revenue.

However, various tax amnesty and penalty waiver programs implemented by the government show that there are still a number of taxpayers who have not fulfilled their tax obligations on time. This phenomenon indicates that the compliance rate among motor vehicle taxpayers is not yet optimal. The level of compliance among motor vehicle taxpayers in North Sumatra can be illustrated by comparing the number of registered vehicles with the number of vehicles for which taxes have been paid, as shown in Table 3.

Table 3. Percentage of PKB Enrollees in North Sumatra in 2024

Description	Total
Registered Vehicles	3.900.000 Unit
Vehicles Pay Taxes	3.000.000 Unit
Vehicles That Have Not Paid Taxes	900.000 Unit
Compliance Rate	76,9%
Noncompliance Rate	23,1%

Source: North Sumatra Provincial Revenue Agency

Based on Table 3, the compliance rate of motor vehicle taxpayers in North Sumatra is estimated to remain at around 76.9%, while approximately 23.1% of vehicles have not fulfilled their tax obligations. The high number of vehicles that have not paid taxes indicates that there is still a gap between the potential and actual collection of motor vehicle tax (PKB). In an effort to improve compliance among motor vehicle taxpayers, the government has implemented various reforms by refining the tax collection system, digitizing tax services, and enhancing the quality of public services (Fazhillah et al., 2024; Tumannger & Syarvina, 2024). An effective tax collection system is believed to make it easier for taxpayers to fulfill their tax obligations. On the other hand, the digitization of tax services through e-Samsat, electronic payments, mobile banking, and various other digital platforms is expected to reduce administrative barriers and improve service efficiency. Furthermore, the quality of service provided by tax officials is also a key factor in shaping positive perceptions and taxpayer satisfaction.

Table 4. Targets and Actual Local Revenue (PAD) from Vehicle Ownership Tax (PKB) in Padangsidempuan for 2023–2025

Year	Target (in billions of rupiah)	Actual Amount (in billions of Rp)	Reach (%)
2023	43,55	40,17	92,2
2024	47,29	44,42	93,9
2025	28,63	23,40	81,7

Source: Padangsidempuan City Samsat

Based on Table 4, the actual Local Own-Source Revenue (PAD) from Vehicle Ownership Tax (PKB) in Padangsidempuan during the 2023–2025 period shows a fairly noticeable change in the target achievement rate. In 2023, the PAD target of Rp43.55 billion was realized at Rp40.17 billion, with an achievement rate of 92.2%. Furthermore, in 2024, the target increased to Rp47.29 billion and actual revenue also increased to Rp44.42 billion, resulting in a target achievement rate of 93.9%. This indicates that in 2024, the ability to meet the target was relatively better than in the previous year, even though the set target had also increased.

However, a notable phenomenon occurred in 2025, when the PAD target actually decreased to Rp28.63 billion and the actual revenue fell even further to just Rp23.40 billion. As a result, the target achievement rate dropped significantly to 81.7%, compared to 93.9% in 2024—a decrease of 12.2 percentage points. This decline indicates that even though the 2025 target was set lower than the previous year's, the actual revenue collected still failed to fully meet the target. This situation is significant because it indicates a gap between the target and the actual PKB revenue in 2025; therefore, it is necessary to consider factors that may affect revenue collection, including the digitization of tax services, service quality, and the tax collection system.

Previous research has shown that tax collection systems, the digitization of tax services, and service quality are related to taxpayer compliance. Studies by Kristawati & Harimurti (2024) and Sinuhaji et al. (2024) found that the digitization of tax services has a positive effect on taxpayer compliance. Abdi & Faisol (2023), Chusaeri et al. (2017), and Mahasari (2023) demonstrated that service quality has a significant positive effect on taxpayer compliance regarding motor vehicles. Meanwhile, Riyadi et al. (2021) found that the tax collection system has a positive effect—specifically, it is effective in increasing taxpayer compliance. However, other studies have shown different results, indicating that the digitization of services and service quality in some regions do not have a significant impact on taxpayer compliance (Prastiwi et al., 2026; Ristiyana et al., 2024). These differing research findings suggest that there remains inconsistency in empirical findings

that requires further investigation.

In addition to the inconsistency of research findings, most previous studies have examined the variables of the tax collection system, the digitization of tax services, and service quality in isolation or by combining only two of these variables in a single research model. Research that simultaneously integrates these three variables to explain motor vehicle taxpayer compliance—particularly in the city of Padangsidempuan—remains relatively limited. Therefore, this study offers a novel approach by testing a model that integrates the tax collection system, the digitization of tax services, and service quality to explain motor vehicle taxpayer compliance in a regional context. Based on this background, this study aims to analyze the effects of the tax collection system, the digitization of tax services, and service quality on motor vehicle taxpayer compliance in Padangsidempuan, both partially and simultaneously.

The novelty of this study lies not only in testing the variables within the context of Padangsidempuan City, but also in developing a conceptual perspective on motor vehicle taxpayer compliance as a result of three complementary tax administration mechanisms. The tax collection system is positioned as a procedural mechanism that provides clarity, certainty, and convenience in fulfilling tax obligations; the digitization of tax services is positioned as a mechanism for access and efficiency that reduces barriers related to time, cost, and distance; while service quality is positioned as a relational mechanism that fosters comfort, trust, and positive perceptions among taxpayers toward the tax institution. This study does not merely test the partial effects of each variable but offers the insight that taxpayer compliance can be fostered through a combination of procedural improvements, expanded digital access, and enhanced service interaction quality. This perspective is relevant in explaining the phenomenon of declining Vehicle Tax (PKB) revenue collection in Padangsidempuan in 2025, when actual revenue reached only 81.7% of the target.

2. Literature Review and Hypothesis Development

2.1 Motor Vehicle Taxpayer Compliance

Taxpayer compliance refers to a situation in which taxpayers fulfill all their tax obligations in accordance with the provisions set forth in laws and regulations (Hanafiah et al., 2025). In the case of motor vehicle taxes, compliance is reflected in vehicle owners' willingness to pay taxes on time, meet administrative requirements, and fulfill their tax obligations correctly. A high level of compliance not only leads to increased local government revenue but also supports the sustainability of development programs and public services funded by tax revenue.

Sani (2022) explains that taxpayer compliance consists of formal compliance and material compliance. Formal compliance relates to the fulfillment of tax administrative obligations in accordance with applicable procedures, while material compliance reflects a taxpayer's willingness to fulfill tax obligations honestly, accurately, and in accordance with the amount that should be paid. Both of these aspects serve as key indicators in assessing the success of tax administration, particularly in modern tax systems that emphasize active taxpayer participation.

Taxpayers' compliance behavior can be explained through the Theory of Planned Behavior (TPB) proposed by Ajzen (1991). This theory states that a person's behavior is influenced by intentions formed from attitudes toward an action, subjective norms, and perceptions of the ease or ability to carry out that action. In taxation, taxpayers who have a positive view of taxes, receive support from their social environment, and find the payment process easy tend to demonstrate higher levels of compliance.

Various studies show that compliance among motor vehicle taxpayers is influenced by a number of factors, both administrative and related to tax services. These factors include the tax collection system, the digitization of tax services, service quality, tax awareness, tax penalties, and the level of trust in the government (Herlina & Yuniarti, 2025; Maulia & Lestari, 2025; Umamah et al., 2024). These findings indicate that improving taxpayer compliance does not depend solely on enforcement but also requires the support of administrative and service systems capable of providing convenience and ease for the public in fulfilling their tax obligations.

2.2 Tax Collection System

A tax collection system is the procedure used by the government to determine, collect, and oversee the fulfillment of tax obligations by taxpayers. The implementation of an effective tax collection system aims not only to optimize tax revenue but also to provide convenience, legal certainty, and transparency for taxpayers in fulfilling their obligations. In the case of motor vehicle taxes, a simple and easy-to-understand collection system can encourage the public to pay their taxes on time. The Theory of Planned Behavior explains that a person's behavior is influenced by their perception of the ease and ability to perform an action. The easier taxpayers perceive the procedures to be, the fewer obstacles they face in fulfilling their tax obligations. This ease can increase taxpayers' confidence in making tax payments, thereby fostering compliance with applicable tax regulations.

The relationship between tax collection systems and taxpayer compliance has been extensively demonstrated

in previous research. Kristawati & Harimurti (2024) and Sinuhaji et al. (2024) found that tax collection systems have a positive effect on taxpayer compliance. These findings indicate that simplifying procedures, clarifying payment mechanisms, and facilitating access to tax services can increase taxpayer awareness and compliance in fulfilling their obligations. However, not all studies have produced consistent findings. Lende et al. (2021), Pemoderasi (2020), and Widiarti & Subekti (2022) found that improvements to the tax collection system have not been able to significantly increase taxpayer compliance if they are not supported by adequate service quality and taxpayers' understanding of tax regulations. These differing research results indicate that the impact of the tax collection system on taxpayer compliance requires further testing, particularly among motor vehicle taxpayers in Padangsidempuan City.

Hypothesis 1: The tax collection system has a positive effect on motor vehicle taxpayer compliance in Padangsidempuan City.

2.3 Digitization of Tax Services

The digitization of tax services refers to the transformation of tax services from a conventional system to an information technology-based system aimed at improving efficiency, effectiveness, and ease of access to services for taxpayers (Lubis & Harahap, 2022; Ulya et al., 2022). In motor vehicle tax administration, digitization is realized through the e-Samsat service, electronic payments, mobile applications, QRIS, and the integration of other digital services. From a TPB perspective, the digitization of tax services can improve the perception of convenience and influence taxpayer behavior. Easy access to services allows taxpayers to fulfill their tax obligations without facing barriers related to time, cost, or distance. These conditions can increase the intention and behavior of tax compliance.

Research conducted by Aini & Nurhayati (2022), Lubis & Harahap (2022), Tambun & Riandini (2022), Ulya et al. (2022), and Wijaya et al. (2025) shows that the digitization of tax services has a positive effect on taxpayer compliance. The higher the utilization of digital services, the higher the level of taxpayer compliance in fulfilling their tax obligations. On the other hand, some studies have found different results. Studies by Agusetiawati et al. (2024) and Rohmiatun et al. (2025) indicate that the digitization of tax services has not yet significantly improved compliance due to ongoing challenges such as low digital literacy, limited internet access, and the public's limited understanding of how to use electronic services. Therefore, the impact of the digitization of tax services on taxpayer compliance still needs to be re-examined across regions with different characteristics.

Hypothesis 2: The digitization of tax services has a positive effect on the tax compliance of motor vehicle owners in Padangsidempuan.

2.4 Quality of Service

Service quality is the ability of a service provider to meet the needs and expectations of service users through service that is fast, accurate, friendly, responsive, and professional (Fazhillah & Nurlaila, 2024). In the context of taxation, service quality is a key factor that can shape taxpayers' positive perceptions of tax authorities. According to Musa (2022), service quality consists of five main dimensions: tangibility, reliability, responsiveness, assurance, and empathy. These five dimensions form the basis for assessing the quality of service provided to the public. The better the quality of service received by taxpayers, the higher their level of satisfaction and trust in the tax agency.

Previous research has shown that service quality is closely related to taxpayer compliance. Studies by Aini & Nurhayati (2022), Kristawati & Harimurti (2024), Lubis & Harahap (2022), Tambun & Riandini (2022), and Ulya et al. (2022) found that service quality has a positive effect on taxpayer compliance. These findings suggest that good service can increase satisfaction and encourage voluntary taxpayer compliance. Nevertheless, studies by Aliviany & Maharani (2023) and Kideng (2026) found that service quality does not always have a significant effect on taxpayer compliance because there are other more dominant factors, such as tax penalties and taxpayer awareness. These differing research results indicate that service quality remains a relevant variable to be re-examined in this study.

Hypothesis 3: Service quality has a positive effect on compliance among motor vehicle taxpayers in Padangsidempuan.

3. Methods

This study employs a quantitative approach with an explanatory research design to analyze the effects of the tax collection system, the digitization of tax services, and service quality on the tax compliance of motor vehicle taxpayers in Padangsidempuan City. The quantitative approach was chosen because it can explain causal relationships between variables through statistical analysis based on Structural Equation Modeling (SEM). The data used were primary data obtained by distributing questionnaires to motor vehicle taxpayers registered at the One-Stop Integrated Administration System (SAMSAT) Office in Padangsidempuan City. Data analysis was conducted using the SmartPLS 4 software with the Partial Least Squares Structural Equation Modeling (PLS-SEM) approach, which is considered appropriate for testing relationships between latent constructs and predictive research models (Hair et al., 2022).

The study population comprised all motor vehicle taxpayers in Padangsidempuan City. Since the exact population size was unknown, the sampling technique employed purposive sampling, with the criteria that respondents must own a motor vehicle registered in their own name, be registered as motor vehicle taxpayers, and have made at least one motor vehicle tax payment. The sample size was determined based on the guidelines by Hair et al. (2022), which state that PLS-SEM-based research requires a sample size of 5–10 times the number of indicators used. This study has 20 indicators, so the minimum sample size falls within the range of 100 respondents.

Data analysis was conducted using the Partial Least Squares Structural Equation Modeling (PLS-SEM) method via the SmartPLS 4 software. The analysis steps included an evaluation of the outer model, which consisted of testing convergent validity using outer loadings (>0.70) and Average Variance Extracted (AVE >0.50), discriminant validity using the Fornell-Larcker criterion and the Heterotrait-Monotrait Ratio (HTMT), and construct reliability using Composite Reliability

(>0.70) and Cronbach's Alpha (>0.70). Next, the inner model was evaluated using the Variance Inflation Factor (VIF), the coefficient of determination (R^2), and the effect size (f^2), and hypothesis testing was conducted using the bootstrapping procedure by examining path coefficients, t-statistics, and p-values (Hair et al., 2022; Henseler, 2017).

The research variables consist of the tax collection system (X_1), the digitization of tax services (X_2), service quality (X_3), and motor vehicle taxpayer compliance (Y). All constructs were measured using a five-point Likert scale with a score range of 1 (strongly disagree) to 5 (strongly agree) (Gries et al., 2018). The tax collection system variable was measured using five indicators; the digitization of tax services, using five indicators; service quality, using five indicators adapted from the SERVQUAL dimensions; and compliance among motor vehicle taxpayers, using five indicators. Thus, a total of 20 indicators were used in this study. The operationalization of the research variables is presented in Table 4.

Table 4. Operational Measurement of Variables

Variable	Statement Item	Scale	Source
Tax Collection System (X_1)	The procedure for paying motor vehicle taxes is easy to understand, so I can fulfill my tax obligations without any difficulty. (SPP1)	<i>Likert 1-5</i>	Kristawati & Harimurti (2024); Sinuhaji et al. (2024); Widiarti & Subekti (2022)
	Information regarding the procedures for paying motor vehicle taxes was clearly explained, which made it easier for me to pay my taxes. (SPP2)		
	The process of paying motor vehicle taxes can be completed quickly without complicated administrative procedures. (SPP3)		
	The tax collection system provides certainty regarding the amount of tax I must pay in accordance with applicable regulations. (SPP4)		Lende et al. (2021)
	The tax collection system in place ensures security, transparency, and reliability in the process of paying motor vehicle taxes. (SPP5)		Pemoderasi (2020); Widiarti & Subekti (2022)
Digitization of Tax Services (X_2)	Digital services like e-Samsat or tax payment apps make it easy for me to pay my motor vehicle taxes anytime. (DLP1)	<i>Likert 1-5</i>	Lubis & Harahap (2022); Ulya et al. (2022)
	Tax apps and digital services are easy to use even without assistance from an official. (DLP2)		Ulya et al. (2022)
	Paying taxes through digital services is faster than paying in person at a Samsat office. (DLP3)		Rohmiatun et al. (2025); Tambun & Riandini (2022); Wijaya et al. (2025)
	I feel that my personal data and tax payment transactions are protected when I use digital tax services. (DLP4)		Agusetiawati et al. (2024)
	Using digital services makes it easier for me to meet my motor vehicle tax payment obligations on time. (DLP5)		

Service Quality (X3)	Samsat staff provide friendly, courteous service and treat every taxpayer who visits with respect. (KP1)	<i>Likert 1-5</i>	Aini & Nurhayati (2022); Aliviany & Maharani (2023)
	Officials are able to provide clear, accurate, and easy-to-understand tax information. (KP2)		
	The staff provided prompt and responsive service when I needed help with the tax payment process. (KP3)		Kideng (2026); Kristawati & Harimurti (2024); Tambun & Riandini (2022)
	I have confidence in the competence and professionalism of the staff in providing tax services. (KP4)		
	The facilities and infrastructure at the Samsat office, as well as other support services, ensure a convenient experience during the tax payment process. (KP5)		Ulya et al. (2022)
Taxpayer Compliance (Y)	I always pay my motor vehicle taxes before or on the specified due date. (KWP1)	<i>Likert 1-5</i>	Kristawati & Harimurti, (2024); Mahasari (2023); Sinuhaji et al. (2024)
	I always fulfill all the necessary administrative requirements for motor vehicle tax payments. (KWP2)		
	I pay my motor vehicle tax in the full amount specified, without any deductions or delays. (KWP3)		Prastiwi et al. (2026)
	I make every effort to comply with all motor vehicle tax regulations, even when there are no inspections by tax officials. (KWP4)		Chusaeri et al. (2017); Prastiwi et al. (2026); Ristiyana et al. (2024)
	I am committed to continuing to fulfill my motor vehicle tax payment obligations in future periods. (KWP5)		

4. Results and Discussions (10 PT)

4.1 Respondent Characteristics

Based on Table 5, the majority of respondents were male (58%), aged 26–35 (35%), employed in the private sector (36%), and held a bachelor's degree as their highest level of education (46%). The majority of respondents were motorcycle owners (72%), indicating that two-wheeled vehicles still dominate motor vehicle tax payments in Padangsidempuan. Additionally, 61% of respondents reported always paying their taxes on time, while the remaining 39% had experienced late payments. In terms of payment methods, in-person payments at the Samsat Office remained the most common (42%), although the use of digital services such as e-Samsat (24%) and mobile/internet banking (19%) is beginning to increase. These findings indicate that taxpayers have begun to take advantage of the digital transformation of tax services, but conventional payment methods remain the public's primary choice.

Table 5. Respondent Characteristics

Category	Description	Freq	%
Gender	Male	58	58,0
	Female	42	42,0
Age	Ages 17–25	19	19,0
	Ages 26–35	35	35,0
	Ages 36–45	28	28,0

Jobs	>45 Years	18	18,0
	ASN/PNS	14	14,0
	Private-Sector Employees	36	36,0
	Self-Employed	29	29,0
	College Student	10	10,0
	Others	11	11,0
Highest Level of Education	High School	27	27,0
	Diploma or equivalent		
	Diploma	14	14,0
	Bachelor's Degree	46	46,0
Vehicle Type	Master/Doctoral	13	13,0
	Motorcycle	72	72,0
Vehicle Tax Payment Frequency	Car	28	28,0
	Always on time	61	61,0
How to Pay Vehicle Taxes	I was late once	24	24,0
	I've been late more than once before	15	15,0
	Come directly to the Samsat Office	42	42,0
	e-Samsat	24	24,0
	Mobile	19	19,0
	Banking/Internet Banking		
	Samsat	15	15,0
	Outlets/Marketplaces/Indomaret/Alf		

N = 100 Respondents

4.2 PLS Algorithm Results

This study began by estimating a model using Partial Least Squares Structural Equation Modeling (PLS-SEM) to analyze the effects of the tax collection system, the digitization of tax services, and service quality on the tax compliance of motor vehicle owners in Padangsidimpuan City. The initial estimation was conducted using the PLS algorithm to obtain an overview of the relationships among latent constructs and to evaluate the ability of each indicator to represent the research variables.

The results of the initial estimation are presented in Figure 2, which shows the direction of the relationship between the exogenous variables—namely, the tax collection system, the digitization of tax services, and service quality—and motor vehicle taxpayer compliance as the endogenous variable. Using the PLS Algorithm procedure, initial values for path coefficients, outer loadings, and the coefficient of determination (R^2) were obtained, which served as the basis for evaluating the measurement model (outer model) and the structural model (inner model). This stage aims to ensure that each indicator is capable of adequately measuring the constructs being formed before hypothesis testing is conducted. Therefore, the estimation results at the PLS Algorithm stage are still exploratory in nature and cannot yet be used as a basis for concluding the significance of the relationships between variables. Significance testing is performed in the next stage using the bootstrapping procedure, taking into account t-statistics, p-values, and path coefficients.

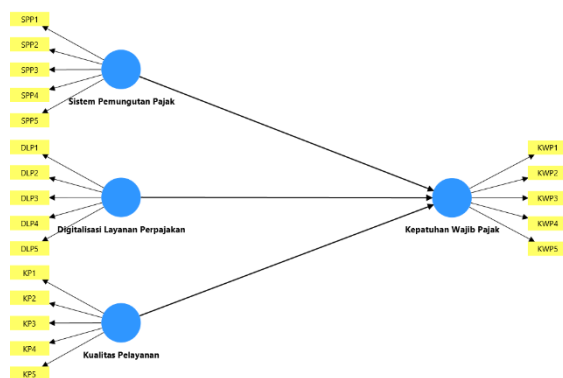


Figure 2. Results of the PLS Algorithm

4.3 Outer Model Evaluation

The results of the outer model evaluation in Table 6 show that all indicators in this study met the criteria for convergent validity. This is indicated by outer loading values that are all above the minimum threshold of 0.70, ranging from 0.774 to 0.921. These values indicate that

each indicator is capable of adequately representing the construct being measured; therefore, all indicators are deemed valid and suitable for use in the subsequent analysis stage. Consequently, no indicators need to be eliminated, as all indicators have met the convergent validity criteria recommended by Hair et al. (2022).

In addition to meeting the criteria for convergent validity through outer loading values, all constructs also showed Average Variance Extracted (AVE) values above the minimum threshold of 0.50. The Tax Collection System variable had an AVE of 0.674, Tax Service Digitalization 0.754, Service Quality 0.645, and Taxpayer Compliance 0.741. These results indicate that each construct is capable of explaining more than 50% of the variance in the indicators that comprise it; therefore, convergent validity for all research variables can be deemed to have been met.

Construct reliability testing also yielded excellent results. The Cronbach's Alpha values for the variables Tax Collection System, Digitalization of Tax Services, Service Quality, and Taxpayer Compliance were 0.879, 0.918, 0.862, and 0.912, respectively. Meanwhile, the Composite Reliability values were 0.912, 0.939, 0.901, and 0.934, respectively. All Cronbach's Alpha and Composite Reliability values exceeded the minimum threshold of 0.70; therefore, it can be concluded that each construct exhibits a high level of internal consistency and is capable of reliably measuring the research variables (Hair et al., 2022).

Table 6. Results of the Measurement Model Evaluation (Outer Model)

Variable	Item	Loading	CR	CA	AVE
Tax Collection System	SPP1	0.844	0.912	0.879	0.674
	SPP2	0.784			
	SPP3	0.837			
	SPP4	0.774			
	SPP5	0.863			
Digitization of Tax Services	DLP1	0.906	0.939	0.918	0.754
	DLP2	0.921			
	DLP3	0.856			
	DLP4	0.832			
	DLP5	0.822			
Quality of Service	KP1	0.830	0.901	0.862	0.645
	KP2	0.787			
	KP3	0.789			
	KP4	0.803			
	KP5	0.805			
Taxpayer Compliance	KWP1	0.864	0.934	0.912	0.741
	KWP2	0.882			
	KWP3	0.880			
	KWP4	0.859			
	KWP5	0.817			

Source: SmartPLS 4, Author's own analysis (2026)

The results of the discriminant validity test using the Heterotrait–Monotrait Ratio (HTMT) method in Table 7 show that all HTMT values are below the recommended threshold of 0.90 (Henseler & Sarstedt, 2021). The highest HTMT value was found in the relationship between Tax Service Digitalization and

Taxpayer Compliance at 0.850, while the lowest value was found in the relationship between the Tax Collection System and Service Quality at 0.405. In addition, the relationship between the Tax Collection System and the Digitization of Tax Services yielded a value of 0.617; the relationship between the Tax Collection System and Taxpayer Compliance was 0.623; the relationship between the Digitization of Tax Services and Service Quality was 0.606; and the relationship between Service Quality and Taxpayer Compliance was 0.786. These results indicate that each construct has a good level of discriminant validity, meaning that each variable is capable of measuring distinct concepts and does not exhibit issues with discriminant validity (Hair et al., 2022; Henseler & Sarstedt, 2021).

Table 7. Heterotrait–Monotrait Ratio (HTMT)

	SPP	DLP	KP	KWP
SPP				
DLP	0.617			
KP	0.405	0.606		
KWP	0.623	0.850	0.786	

Note: SPP = Tax Collection System; DLP = Digitalization of Tax Services; KP = Service Quality; KWP = Taxpayer Compliance.
Source: SmartPLS 4, Author's own analysis (2026)

The results of the discriminant validity test using the Fornell–Larcker criteria in Table 8 show that all constructs met the recommended criteria. The root-mean-square Average Variance Extracted (AVE) values shown in the diagonal elements of each construct—Tax Collection System (0.821), Digitization of Tax Services (0.868), Service Quality (0.803), and Taxpayer Compliance (0.861), are greater than their correlation values with other constructs. These results indicate that each construct has a greater ability to explain the indicators that comprise it than its relationship with other constructs. Furthermore, the correlation values between constructs range from 0.357 to 0.780, all of which are lower than the diagonal values of each variable. These findings suggest that each construct possesses an adequate level of discriminant validity, enabling it to empirically measure distinct concepts. Thus, based on the Fornell–Larcker criteria, all variables in this study are deemed to meet the requirements for discriminant validity and are suitable for testing the structural model (inner model) (Fornell & Larcker, 1981; Hair et al., 2022).

Table 8. Fornell Larcker

	SPP	DLP	KP	KWP
SPP	0.821			
DLP	0.556	0.868		
KP	0.357	0.544	0.803	
KWP	0.560	0.780	0.786	0.861

Note: SPP = Tax Collection System; DLP = Digitalization of Tax Services; KP = Service Quality; KWP = Taxpayer Compliance.
Source: SmartPLS 4, Author's own analysis (2026)

4.4 Inner Model Evaluation

An inner model evaluation was conducted to test the structural relationships among latent variables and to measure the model's ability to explain endogenous variables. Based on the test results in Table 9, all research hypotheses yielded positive path coefficients with significance levels that met the test criteria (p -value < 0.05). The Tax Collection System variable has a positive effect on Motor Vehicle Taxpayer Compliance, with a path coefficient of 0.153, a t -statistic of 1.988, and a p -value of 0.047. Furthermore, the Digitalization of Tax Services showed a positive effect with a path coefficient of 0.488, a t -statistic of 4.312, and a p -value of 0.000. Meanwhile, Service Quality also has a positive effect on Motor Vehicle Taxpayer Compliance, with a path coefficient of 0.380, a t -statistic of 4.934, and a p -value of 0.000. These findings indicate that all research hypotheses are accepted because each exogenous variable has a positive and significant effect on motor vehicle taxpayer compliance in Padangsidimpuan City.

The model fit test results indicate that the structural model constructed meets the acceptability criteria. The Standardized Root Mean Square Residual (SRMR) value of 0.058 is below the maximum threshold of 0.09, so the model can be categorized as a good fit. Furthermore, the Normed Fit Index (NFI) value of 0.823 exceeds the minimum threshold of 0.60, indicating that the model has a good level of fit. Although the Chi-Square value of 273.927 is not considered a primary indicator in the evaluation of PLS-SEM models, this value still indicates that the constructed model is capable of adequately representing the relationships among the variables. Overall, the results of the model fit tests indicate that the research model is suitable for testing the structural relationships among the variables.

Furthermore, the model's ability to explain endogenous variables is indicated by an Adjusted R^2 value of 0.724. This value indicates that 72.4% of the variation in Motor Vehicle Taxpayer Compliance can be explained by the Tax Collection System, Digitalization of Tax Services, and Service Quality, while the remaining 27.6% is influenced by other factors outside the research model. Based on the results of the effect size test (f^2), the Tax Service Digitalization variable has the greatest influence on taxpayer compliance with a value of 0.492, followed by Service Quality at 0.378, while the Tax Collection System has a value of 0.060. These results indicate that increased utilization of digital tax services makes the most dominant contribution to improving motor vehicle taxpayer compliance in Padangsidimpuan City, while service quality also exerts a fairly strong influence. On the other hand, the influence of the tax collection system is relatively smaller compared to the other two variables, although it still makes a significant contribution to improving taxpayer compliance.

Table 9. Results of the Structural Model (Inner Model)

Evaluation			
Hypothesis	Path coefficient	T-Statistic	P-Values
H1: SPP→KWP	0.153	1.988	0.047
H2: DLP→KWP	0.488	4.312	0.000
H3: KP→KWP	0.380	4.934	0.000
Model Fit	Limit	Saturated Model	Description
SRMR	<0.09	0.058	Good Fit
Chi-Square	>0.05	273.927	Good Fit
NFI	>0.60	0.823	Acceptable
Endogenous Variables	Adjusted R-Square	Variable	F-Square
Taxpayer Compliance (KWP)	0.724	SPP→KWP	0.860
		DLP→KWP	0.492
		KP→KWP	0.378

Note: SPP = Tax Collection System; DLP = Digitalization of Tax Services; KP = Service Quality; KWP = Taxpayer Compliance.

Source: SmartPLS 4, Author's own analysis (2026)

4.5 Discussion

The results of the structural equation modeling analysis indicate that all hypotheses in this study were accepted. The Tax Collection System, Digitalization of Tax Services, and Service Quality were found to have a positive and significant effect on Motor Vehicle Taxpayer Compliance in Padangsidimpuan City. Among these three variables, the Digitization of Tax Services had the greatest effect ($\beta = 0.488$), followed by Service Quality ($\beta = 0.380$), while the Tax Collection System had a positive effect with a coefficient of 0.153. The Adjusted R² value of 0.724 indicates that these three variables account for 72.4% of the variation in motor vehicle taxpayer compliance, while the remainder is influenced by other factors outside the research model. These findings suggest that improved taxpayer compliance is not solely determined by regulatory aspects but is also influenced by system convenience, digital transformation, and the quality of service provided to the public.

The results of the first hypothesis test indicate that the Tax Collection System has a positive and significant effect on Motor Vehicle Taxpayer Compliance. These findings suggest that the simpler the payment procedures, the clearer the collection mechanisms, and the higher the transparency in the tax administration process, the greater the likelihood that taxpayers will fulfill their tax obligations. An easy-to-understand collection system reduces administrative barriers, making taxpayers feel more confident about paying their taxes on time. This reinforces the view that the effectiveness of tax administration is a key factor in fostering voluntary tax compliance.

These findings are consistent with the Theory of Planned Behavior (Ajzen, 1991; Fishbein & Ajzen, 2011), which explains that a person's behavior is influenced by perceived behavioral control—that is, the perception of how easy it is to perform a certain action. When the tax collection system is perceived as simple,

transparent, and providing legal certainty, taxpayers will have greater confidence in fulfilling their tax obligations. The results of this study are consistent with the research by Kristawati and Harimurti (2024), Sinuhaji et al. (2024), Riyadi et al. (2021), Lubis and Harahap (2022), and Tambun and Riandini (2022), who found that the tax collection system contributes positively to increased taxpayer compliance. In the context of Padangsidimpuan City, the ease of payment procedures at Samsat serves as a factor that builds public trust, thereby encouraging compliance with motor vehicle tax obligations.

The results of the second hypothesis test show that the digitization of tax services has a positive and significant effect on motor vehicle taxpayer compliance, and is also the variable with the greatest influence compared to the other variables. These findings indicate that the use of digital services such as e-Samsat, electronic payments, mobile banking, and other digital payment channels can improve access to tax services. Digitization not only speeds up the payment process but also reduces costs, time, and administrative barriers, which have often been the reasons for delays in motor vehicle tax payments.

Based on the Theory of Planned Behavior, the ease of using technology increases the perception of behavioral control, thereby strengthening taxpayers' intention to pay taxes. The easier it is for taxpayers to access digital services, the more likely they are to fulfill their tax obligations on time. The results of this study support the findings of Aini and Nurhayati (2022), Lubis and Harahap (2022), Ulya et al. (2022), Wijaya et al. (2025), and Kristawati and Harimurti (2024), who state that the digitization of tax services can improve taxpayer compliance. These findings are also relevant to the characteristics of the study's respondents, as the use of e-Samsat, mobile banking, and digital payment services has begun to increase, even though in-person payments at Samsat offices still dominate. This situation indicates that digital transformation has begun to be accepted by the people of Padangsidimpuan and has the potential to continue improving compliance if accompanied by expanded access and increased digital literacy.

The third hypothesis shows that Service Quality has a positive and significant effect on Motor Vehicle Taxpayer Compliance. This finding indicates that service that is fast, friendly, professional, responsive, and supported by adequate facilities can create a positive service experience for taxpayers. When taxpayers receive good service, they feel valued, receive clear information, and have a higher level of trust in the tax agency. These conditions ultimately encourage voluntary compliance without the need for supervision or enforcement of penalties.

These findings also support the Theory of Planned

Behavior, particularly regarding attitudes toward behavior and subjective norms. High-quality service fosters positive attitudes among taxpayers toward tax authorities while enhancing the perception that fulfilling tax obligations is a valuable and beneficial action. These research results are consistent with studies by Aini and Nurhayati (2022), Kristawati and Harimurti (2024), Abdi and Faisol (2023), Mahasari (2023), and Chusaeri et al. (2017), which concluded that service quality has a positive effect on taxpayer compliance. In the context of Padangsidempuan City, informative, responsive, and professional service from Samsat officers is one of the factors that can strengthen public trust, thereby encouraging timely compliance with motor vehicle tax payments.

Overall, the results of this study indicate that improving compliance among motor vehicle taxpayers requires a comprehensive approach. Improvements to the tax collection system must be accompanied by accelerated digitization of services and enhanced quality of public services to provide taxpayers with a simpler, faster, and more convenient experience. These findings also reinforce the Theory of Planned Behavior, which explains that taxpayer compliance is shaped by perceptions of ease, positive attitudes, and confidence in one's ability to fulfill tax obligations. Therefore, the local government, together with Bapenda and Samsat in Padangsidempuan City, needs to continue developing digital-based tax services, simplifying administrative procedures, and improving the competence of service personnel so that the compliance rate of motor vehicle taxpayers can continue to increase sustainably.

5. Conclusions

Based on the research findings, it can be concluded that the tax collection system, the digitization of tax services, and service quality have a positive and significant impact on the compliance of motor vehicle taxpayers in Padangsidempuan City. These results indicate that the better the tax collection system implemented, the more optimal the digitization of tax services, and the higher the quality of service provided, the higher the level of taxpayer compliance in fulfilling their obligations. Thus, these three variables play a crucial role in improving compliance among motor vehicle taxpayers in Padangsidempuan City.

The digitization of tax services is the most significant factor in improving taxpayer compliance, followed by service quality and the tax collection system. These findings indicate that the convenience, speed, and effectiveness of digital tax services are key factors in encouraging taxpayers to fulfill their obligations. Therefore, efforts to improve the quality of digital services must continue, accompanied by improvements in service quality and tax collection systems, so that compliance among motor vehicle taxpayers can be further enhanced.

This study has limitations because it was conducted only among motor vehicle taxpayers in Padangsidempuan City; therefore, the results cannot yet be generalized to other regions. Additionally, the study used only three independent variables—the tax collection system, the digitization of tax services, and service quality—so there are still other factors that could potentially influence taxpayer compliance. For future researchers, it is recommended to expand the geographic scope and the number of respondents, as well as to include additional variables such as taxpayer awareness, tax penalties, trust in the government, tax literacy, and perceptions of tax fairness, in order to provide a more comprehensive picture of the factors influencing motor vehicle taxpayer compliance.

Acknowledgments

The authors would like to express their sincere appreciation to the SAMSAT Office of Padangsidempuan City and all respondents who participated in this study and provided the information necessary for the completion of this research. The authors also extend their gratitude to all parties who provided assistance and support during the research process.

Funding Information

The authors state that no external funding was involved in this research. All research activities were conducted independently by the authors without financial support from any funding agency, institution, or grant.

Author Contributions Statement

Nur Asiyah Jamil Rangkuti contributed to conceptualization, methodology, software, validation, investigation, resources, data curation, and writing—review and editing; Muhammad Lathief Ilhamy Nasution contributed to methodology, validation, formal analysis, investigation, data curation, and writing—review and editing; while Nurwani contributed to software, validation, data curation, and writing—review and editing. All authors have read and approved the final manuscript.

Name of Author	C	M	So	Va	Fo	I	R	D	W
Nur Asiyah Jamil Rangkuti	✓	✓	✓	✓		✓	✓	✓	✓
Muhammad Lathief Ilhamy Nasution		✓		✓	✓	✓		✓	✓
Nurwani			✓	✓				✓	✓

C : Conceptualization I : Investigation
M : Methodology R : Resources
So : Software D : Data Curation
Va : Validation W : Writing - Review
Fo : Formal analysis

Conflict of Interest Statement

The authors declare no conflict of interest related to this research.

Informed Consent

Informed consent was obtained from all respondents prior to their participation in this study.

Ethical Approval

The study was conducted in accordance with applicable ethical principles for research involving human participants. Participation was voluntary, and respondents' confidentiality and anonymity were maintained throughout the research process.

Data Availability

The data supporting the findings of this study are available from the corresponding author upon reasonable request.

References

- Abdi, A. S., & Faisol, I. A. (2023). Pengaruh pemutihan pajak, Samsat keliling, e-Samsat, sanksi pajak, dan kualitas pelayanan terhadap kepatuhan wajib pajak kendaraan bermotor di Kabupaten Bangkalan. *Neo-Bis*, 12(1), 91–108.
- Agusetiawati, W. D., Askandar, N. S., & Nandiroh, U. (2024). Pengaruh edukasi pajak, literasi digital dan sistem e-filling terhadap kepatuhan wajib pajak orang pribadi. *E_Jurnal Ilmiah Riset Akuntansi*, 13(01), 680–691.
- Aini, N. Q., & Nurhayati, N. (2022). Pengaruh Kebijakan Insentif Pajak Penghasilan bagi UMKM dan Digitalisasi Pajak terhadap Kepatuhan Wajib Pajak. *Bandung Conference Series: Accountancy*, 2(1), 341–346.
- Ajeigbe, K. B., Ganda, F., & Enowkenwa, R. O. (2024). Impact of sustainable tax revenue and expenditure on the achievement of sustainable development goals in some selected African countries. *Environment, Development and Sustainability*, 26(10), 26287–26311.
- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50(2), 179–211. [https://doi.org/https://doi.org/10.1016/0749-5978\(91\)90020-T](https://doi.org/https://doi.org/10.1016/0749-5978(91)90020-T)
- Aliviany, D., & Maharani, N. K. (2023). Pengaruh pengetahuan wajib pajak, kualitas pelayanan fiskus, dan sanksi pajak terhadap kepatuhan wajib pajak. *Jurnal Ekonomi Bisnis Dan Akuntansi*, 3(3).
- Chusaeri, Y., Diana, N., & Afifudin, A. (2017). Pengaruh Pemahaman Dan Pengetahuan Wajib Pajak Tentang Peraturan Perpajakan, Kesadaran Wajib Pajak, Kualitas Pelayanan, Dan Sanksi Perpajakan Terhadap Kepatuhan Wajib Pajak Kendaraan Bermotor (Studi SAMSAT Kota Batu). *E_Jurnal Ilmiah Riset Akuntansi*, 6(09).
- Fazhillah, A., Nasution, Y. S. J., & Syafina, L. (2024). Pengaruh SPPT, Penyuluhan Pajak dan Sanksi Pajak terhadap Kepatuhan Pembayaran PBB pada Kabupaten Serdang Bedagai. *Jurnal Manajemen Terapan Dan Keuangan*, 13(03), 950–962.
- Fazhillah, A., & Nurlaila, N. (2024). Analisis Penerimaan Pajak Bumi dan Bangunan (PBB) terhadap Pendapatan Daerah di Kecamatan Kotarih. *Jurnal Riset Akuntansi*, 2(2), 22–35.
- Fishbein, M., & Ajzen, I. (2011). *Predicting and changing behavior: The reasoned action approach*. Psychology press.
- Fornell, C., & Larcker, D. F. (1981). Evaluating structural equation models with unobservable variables and measurement error. *Journal of Marketing Research*, 18(1), 39–50.
- Gries, K., Berry, P., Harrington, M., Crescioni, M., Patel, M., Rudell, K., Safikhani, S., Pease, S., & Vernon, M. (2018). Literature review to assemble the evidence for response scales used in patient-reported outcome measures. *Journal of Patient-Reported Outcomes*, 2(1), 41. <https://doi.org/10.1186/s41687-018-0056-3>
- Hair, J. F., Hult, G. T. M., Ringle, C. M., & Sarstedt, M. (2022). *A primer on partial least squares structural equation modeling (PLS-SEM)* (3rd ed.). Sage Publications.
- Hanafiah, A., Nasution, M. L. I., & Syafina, L. (2025). Analisis Penerapan Standar Akuntansi Keuangan Entitas Mikro Kecil Menengah Dalam Kesiapan dan Keefektifan Pencatatan Laba Usaha Penjualan UD. Bunda Ida. *Jambura Economic Education Journal*, 7(4), 1292–1310.
- Henseler, J. (2017). *Partial Least Squares Path Modeling BT - Advanced Methods for Modeling Markets* (P. S. H. Leeflang, J. E. Wieringa, T. H. A. Bijmolt, & K. H. Pauwels (eds.); pp. 361–381). Springer International Publishing. https://doi.org/10.1007/978-3-319-53469-5_12
- Henseler, J., & Sarstedt, M. (2021). Goodness-of-fit indices for partial least squares path modeling. *Computational Statistics*, 36, 987–1005. <https://doi.org/10.1007/s00180-020-01018-7>
- Herlina, R. A., & Yuniarti, R. (2025). Tinjauan literatur terhadap faktor-faktor yang mempengaruhi kepatuhan wajib pajak orang pribadi di Indonesia. *Journal of Economics and Business UBS*, 882–900.
- Kideng, I. P. F. (2026). Peran Kesadaran Wajib Pajak Sebagai Variabel Mediasi Pengetahuan Perpajakan, Sanksi Perpajakan Dan Kualitas Pelayanan Terhadap Kepatuhan Wajib Pajak. *Jurnal Pendidikan Ekonomi Akuntansi Dan Kewirausahaan (JPEAKU)*, 6(1), 66–77.
- Kristawati, E. W., & Harimurti, F. (2024). Pengaruh Digitalisasi Layanan Pajak Dan Kesadaran Wajib Pajak Terhadap Kepatuhan Pajak Dengan Sosialisasi Pajak Sebagai Variabel Moderasi (Studi Pada Wpop Kpp Pratama Surakarta). *BBM (Buletin Bisnis & Manajemen)*, 10(2), 184–194.
- Lende, A., Yuesti, A., & Bhegawati, D. A. S. (2021). Pengaruh Kemanfaatan Npwp, Kualitas Pelayanan, Pemahaman Wajib Pajak Dan Sanksi Pajak Terhadap Kepatuhan Wajib Pajak Orang Pribadi Di Kecamatan Gianyar. *Kumpulan Hasil Riset Mahasiswa Akuntansi (KHARISMA)*, 3(1).
- Lubis, N. H., & Harahap, R. D. (2022). Pengaruh Layanan E-SAMSAT Terhadap Penerimaan Pajak Kendaraan Bermotor di UPT. Pusat Dukungan Operasional Layanan Pendapatan Daerah. *BIMA Journal (Business, Management, & Accounting Journal)*, 3(1), 29–36.
- Lubis, N. H., Harmain, H., & Nurwani, N. (2023). Pengaruh Penerapan E-Filling Terhadap Kepatuhan Wajib Pajak Dalam Menyampaikan SPT Tahunan Dengan Kepuasan Kualitas Pelayanan Sebagai Variabel Intervening (Studi Kasus di Badan Pengelolaan Pajak dan Retribusi Daerah Provinsi Sumatera Utara). *Jurnal Riset Akuntansi Dan Bisnis*, 23(2), 108–120.
- Mahasari, N. N. A. (2023). Pengaruh Sistem Kualitas Pelayanan, Kesadaran Wajib Pajak, Sanksi Pajak Terhadap Kepatuhan Membayar Pajak Kendaraan Bermotor Di Kantor Samsat Kota Bandar Lampung. *Prosiding Konferensi Ilmiah Akuntansi*, 10.
- Maulia, N. I., & Lestari, E. P. (2025). Strategi Peningkatan Kesadaran Masyarakat Terhadap Pajak Daerah. *Menulis: Jurnal Penelitian Nusantara*, 1(3), 594–600.
- Musa, H. (2022). Pengaruh kualitas pelayanan kesehatan terhadap kepuasan pasien pada klinik citra utama Palembang. *Jurnal*

- Ilmiah Ilmu Pengetahuan Teknologi Dan Seni, 1(1), 9–21.
- Pemoderasi, S. (2020). Pengaruh Kualitas Pelayanan Fiskus, Pemahaman Peraturan Perpajakan Dan Penerapan Sistem E-Filling Terhadap Kepatuhan Wajib Pajak. *Jurnal Akuntansi Dan Pajak*, 20(2), 145–153.
- Prastiwi, A. M., Hertati, L., & Syafitri, L. (2026). Pengaruh Penerapan Sistem Coretax dan Kualitas Layanan Coretax terhadap Kepatuhan Wajib Pajak Orang Pribadi yang Terdaftar di KPP Pratama Wilayah Kota Palembang. *Accounting Global Journal*, 10(1), 97–113.
- Ristiyana, R., Atichasari, A. S., & Indriani, R. (2024). Pengaruh insentif, digitalisasi dan relawan pajak terhadap kepatuhan wajib pajak dengan kualitas pelayanan sebagai variabel moderasi. *Owner: Riset Dan Jurnal Akuntansi*, 8(2), 1339–1349.
- Riyadi, S. P., Setiawan, B., & Alfarago, D. (2021). Pengaruh kepatuhan wajib pajak, pemeriksaan pajak, dan pemungutan pajak terhadap penerimaan pajak penghasilan badan. *Jurnal Riset Akuntansi & Perpajakan (JRPA)*, 8(02), 57–67.
- Rohmiatun, E. T., Rosyida, R. A., & Khoiroh, F. (2025). Peningkatan Kepatuhan Pajak Melalui Digitalisasi: Efektivitas E-Filing Dan E-Billing Di Kpp Pratama Sidoarjo Selatan. *RISTANSI: Riset Akuntansi*, 6(1), 92–107.
- Sani, P. J. (2022). Perilaku kepatuhan wajib pajak orang pribadi pekerjaan bebas di Kota Denpasar. *Jurnal Pajak Dan Keuangan Negara (PKN)*, 3(2), 294–304.
- Sinuhaji, V. L., Purba, H., & Hutapea, J. Y. (2024). Pengaruh digitalisasi perpajakan dan pemahaman perpajakan terhadap kepatuhan wajib pajak dengan sosialisasi perpajakan sebagai variabel moderasi. *Journal of Economic, Bussines and Accounting (COSTING)*, 7(2), 6974–6990.
- Siregar, A. A., & Kusmilawaty, K. (2022). Pengaruh Pajak Parkir Dan Pajak Restoran Terhadap Pendapatan Asli Daerah Kota Medan. *JAS (Jurnal Akuntansi Syariah)*, 6(1), 57–68.
- Tambun, S., & Riandini, R. (2022). Dampak Tax Planning dan Digitalisasi Layanan Pajak terhadap Kepatuhan Wajib Pajak dimoderasi oleh Nasionalisme. *Owner: Riset Dan Jurnal Akuntansi*, 6(3), 2993–3004.
- Tumanner, M. A. P., & Syarvina, W. (2024). Analisis Pengaruh Penerimaan Pajak Parkir Guna Meningkatkan Pendapatan Asli Daerah Di Badan Pendapatan Daerah Kota Medan. *Inisiatif: Jurnal Ekonomi, Akuntansi Dan Manajemen*, 3(1), 138–149.
- Ulya, H., Harmain, H., & Harahap, R. D. (2022). Efektivitas program pemutihan pajak kendaraan bermotor dalam meningkatkan kepatuhan wajib pajak membayar pajak dalam perspektif masalah mursal. *Journal of Islamic Accounting Competency*, 2(1), 69–83.
- Umamah, R., Zuhrah, N., Kurniawan, H., & Nurcahya, W. F. (2024). Pengaruh reformasi dan modernisasi perpajakan terhadap kepatuhan dan penerimaan pajak di Indonesia. *Journal of Macroeconomics and Social Development*, 1(4), 1–19.
- Widiarti, F., & Subekti, K. V. (2022). Pengaruh sistem administrasi perpajakan dan kualitas pelayanan terhadap kepatuhan wajib pajak orang pribadi dengan model penerimaan teknologi (tam) sebagai pemoderasi. *Jurnal Akuntansi Manajerial (Managerial Accounting Journal)*, 6(2), 43–63.
- Wijaya, H., Zuliyana, M., Putra, D. P., & Rani, S. (2025). Pengaruh Digitalisasi Perpajakan, Pengetahuan Perpajakan Dan Sanksi Perpajakan Terhadap Kepatuhan Wajib Pajak Orang Pribadi Di KPP Ilir Timur. *Jurnal Ekuilnoma*, 7(1), 53–67.

Biographies of Authors

	Nur Asiyah Jamil Rangkuti is an undergraduate student in the Sharia Accounting Study Program at the Faculty of Islamic Economics and Business, Universitas Islam Negeri Sumatera Utara (UIN Sumatera Utara), Medan, Indonesia, enrolled in 2022. Her academic interests include Sharia accounting, taxation, and Islamic economics and business. She is actively engaged in academic activities and research related to accounting and taxation, particularly in the context of public financial administration and taxpayer compliance. Email: shiaarkt@gmail.com
	Muhammad Lathief Ilhamy Nasution is a lecturer at the Faculty of Islamic Economics and Business, Universitas Islam Negeri Sumatera Utara (UIN Sumatera Utara), Medan, Indonesia. He is actively involved in teaching, research, and academic activities, particularly in the fields of Islamic economics, Islamic banking, and Islamic finance. His research interests include Islamic banking, financial services, and the development of Islamic economic systems. He has contributed to various research projects and scholarly publications in these areas. He welcomes academic communication, research collaboration, and scholarly discussion and can be reached via email at mlathiefilhamy@uinsu.ac.id
	Nurwani is a lecturer in the Sharia Accounting Study Program at the Faculty of Islamic Economics and Business, Universitas Islam Negeri Sumatera Utara (UIN Sumatera Utara), Medan, Indonesia. Her academic expertise is in accounting, with research interests covering accounting, Sharia accounting, and related areas of Islamic economics and business. She earned her Bachelor's Degree in

	Accounting from Universitas Muhammadiyah Sumatera Utara and her Master's Degree in Accounting from Universitas Sumatera Utara. She is actively involved in teaching, research, scholarly publication, and academic quality assurance		activities at FEBI UIN Sumatera Utara. Email : nurwani@uinsu.ac.id
--	--	--	---