

## Effectiveness of Motor Vehicle Tax Revenue and Contribution to Local Revenue in District X

Rahma Dwi Lestari<sup>1</sup>, Rina Mudjiyanti<sup>1</sup>, Ira Hapsari<sup>1</sup>

<sup>1</sup>Faculty of Economic and Business,  
Universitas Muhammadiyah Purwokerto, Indonesia

### ARTICLE INFO

#### Article history:

DOI:

[10.30595/pssh.v26i.1816](https://doi.org/10.30595/pssh.v26i.1816)

Submitted:

July 14, 2025

Accepted:

September 02, 2025

Published:

September 10, 2025

#### Keywords:

Motor Vehicle Tax; Local  
Revenue; Effectiveness;  
Contribution

### ABSTRACT

*Motor Vehicle Tax is one of the sources of revenue that has a strategic role in supporting the financing of regional development. This study aims to analyze the effectiveness of Motor Vehicle Tax revenue and contribution to Regional Original Revenue in the X Regency Regional Revenue Management Unit for the last three years. The results showed that PKB revenue in X Regency tended to decline, as indicated by the realization achievement that approached the criteria of less effective in 2024. However, the contribution of motor vehicle tax to local revenue still shows a significant proportion, although it fluctuates every year. This finding indicates that Motor Vehicle Tax revenue has an important role in supporting the increase of Local Revenue in X Regency. Therefore, optimization of Motor Vehicle Tax revenue needs to be carried out through continuous improvement of taxpayer compliance and strengthening of the local tax administration system.*

*This work is licensed under a [Creative Commons Attribution 4.0 International License](https://creativecommons.org/licenses/by/4.0/).*



#### Corresponding Author:

**Rahma Dwi Lestari**

Universitas Muhammadiyah Purwokerto

Jl. KH. Ahmad Dahlan, Kembaran, Banyumas, Jawa Tengah 53182, Indonesia

Email: [rahmadwilstri@gmail.com](mailto:rahmadwilstri@gmail.com)

## 1. INTRODUCTION

Motor Vehicle Tax is one of the sources of revenue that has a strategic role in supporting the financing of regional development. This study aims to analyze the effectiveness of Motor Vehicle Tax revenue and contribution to Regional Original Revenue in the X Regency Regional Revenue Management Unit for the last three years. The results showed that PKB revenue in X Regency tended to decline, as indicated by the realization achievement that approached the criteria of less effective in 2024. However, the contribution of motor vehicle tax to local revenue still shows a significant proportion, although it fluctuates every year. This finding indicates that Motor Vehicle Tax revenue has an important role in supporting the increase of Local Revenue in X Regency.

Therefore, optimization of Motor Vehicle Tax revenue needs to be carried out through continuous improvement of taxpayer compliance and strengthening of the local tax administration system. The success of regional governance can be shown through its ability to finance the administration of government and development independently, as a manifestation of the implementation of regional autonomy. The financing comes from local own-source revenue which is the result of utilizing the potential of the local economy, including revenue from local retribution, the results of the management of separated local assets, the results of the management of separated local assets, other legal local own-source revenue and from the local tax sector.

Among the various kinds of local taxes such as Motor Vehicle Title Transfer Tax, Motor Vehicle Fuel Tax, Surface Water Tax, Cigarette Tax and so on. Motor Vehicle Tax is one of the major contributors to local

revenue, especially in areas with a high growth rate of motorized vehicles, such as X Regency. Motor Vehicle Tax is levied on the ownership and control of motor vehicles, with technical implementation under the authority of the Regional Revenue Management Unit as part of the organizational structure of the Central Java Province Regional Revenue Management Agency.

Taxes are mandatory because they are stipulated by law, do not provide direct benefits to the payer, and are used to fund the public interest and state development (pajak.go.id, n.d.). Among the various types of local taxes, Motor Vehicle Tax makes a significant contribution to local revenue. Motor Vehicle Tax (PKB), as stated in Law No. 28/2009 on Local Taxes and Levies, is an important aspect of the local tax structure that has a strategic role in supporting fiscal revenue. To obtain an overview of the contribution of motor vehicle tax (PKB) to support regional own-source revenue (PAD) each year, analysis is needed through a comparison between the realization of PKB revenue and total PAD revenue as a whole.

The revenue data is listed in the provincial budget (APBD), and is allocated to pay for various local government expenditure needs. PKB payments are made annually by motor vehicle owners at the SAMSAT office, SAMSAT itself is a form of collaboration between agencies created by local governments in all areas to facilitate vehicle tax administration services for the community (Hartanti et al., 2020). However, problems related to Motor Vehicle Tax arrears in Central Java Province are still faced with various challenges that are quite complex. According to available data, from 2019 to 2024 there were more than 2.6 million notification letters related to taxpayer arrears and the target of motor vehicle tax acquisition was only realized at approximately 66.6% (jateng.prov.go.id, 2024).

District X is also one of those that has high arrears, namely in 2023 according to the Head of the PKB Section of the District X UPPD Office, tax arrears reached Rp 103.30 billion or as many as 182,836 taxpayers who are still in arrears (Suara Merdeka X, 2024). The purpose of this study is to assess the level of achievement of Motor Vehicle Tax (PKB) revenue realization against predetermined targets, both in terms of achievement and potential to exceed previously formulated projections. Meanwhile, contribution analysis is aimed at identifying the extent to which PKB contributes to the total local revenue (PAD).

Based on these problems, the strategic role of Motor Vehicle Tax (PKB) as an example of the main source of local revenue that has great potential, especially in District X which every year shows an increasing scale of the number of motorized vehicles. However, the magnitude of this potential is not always reflected in the optimal level of revenue realization. Therefore, an in-depth analysis is needed to assess the effectiveness of the management of Motor Vehicle Tax (PKB), as well as to assess the level of its contribution to the increase in Regional Original Revenue (PAD).

## **2. LITERATURE REVIEW**

### **2.1 Motor Vehicle Tax (PKB)**

Motor Vehicle Tax is a tax levied by local governments on the ownership or use of motorized vehicles by individuals or legal entities (Salah & Syarat, 2024). The juridical basis for the imposition of Motor Vehicle Tax (PKB) in Indonesia is contained in Law Number 28 of 2009 concerning Regional Taxes and Regional Retribution. (UU RI No 28, 2009) According to the law, the object of PKB includes all motorized vehicles operating on land roads operated by technical devices including motors and other devices that replace energy resources into motion, including large moving equipment.

### **2.2 Local Own-Source Revenue (PAD)**

Local own-source revenue is a major source of financing chosen to carry out government functions and development at the regional level, as well as being an important instrument in supporting the implementation of regional autonomy. Referring to Law of the Republic of Indonesia No. 33/2004 on Financial Balance between the Central Government and Regional Governments, Local own- source revenue is derived from the region's own economic potential, which includes local taxes, user charges, the results of the management of separated regional assets, and various other legal revenues. Thus, Local own-source revenue illustrates the extent to which a region is able to pay for public needs independently without dependence on financing from the central government (Indonesian Law No. 33, 2004).

### **2.3 Effectiveness**

In general, the word "effectiveness" comes from the word "effect", which can be interpreted as success in achieving goals. Effectiveness often relates to the relationship between expectations and actual achievements. In addition to this definition, efficacy of influence or impact of success is also a component of effectiveness. Effectiveness refers to the ability to achieve results or and in line with what is expected. Meeting objectives and having a strong and clear effect are signs that something is effective and clear (Effectiveness, 2024). Based on (Mahmudi, 2019), the measurement of the ratio of local tax effectiveness is carried out through a comparison between the realization of local tax revenue and the predetermined revenue target. An effectiveness ratio can be

categorized as effective if the percentage value reaches or approaches 100%. The effectiveness ratio can be classified into the following criteria:

**Table 1.** Ratio of Effectiveness

Percentage (%)	Criteria
>100%	Highly Effective
100%	Effective
90% - 99%	Moderately Effective
75% - 89%	Less Effective
<75%	Not Effective

## 2.4 Contribution Ratio

The contribution ratio is an analytical indicator used to assess how much a type of revenue contributes to the total revenue as a whole. In the scope of local finance, this ratio serves to identify the size of the portion of revenue from a particular source, such as Motor Vehicle Tax (PKB), compared to the overall Regional Original Revenue (PAD). The utilization of the contribution ratio is important because it helps in evaluating the extent to which a source of revenue plays a role, as well as being the basis for developing financial management strategies and optimal regional fiscal planning. Findings (Mahmudi, 2019), the contribution ratio can be measured through the comparison of local tax revenues derived from the management of separate regional assets to the total Regional Original Revenue (PAD) as a whole. The level of contribution ratio is classified as follows:

**Table 2.** Ratio of Contribution

Percentage (%)	Criteria
0,00% - 10%	Very Poor
10,10% -20%	Poor
20,10% - 30%	Medium
30,10% - 40%	Fair
40,10% - 50%	Good
>50%	Very Good

## 2.5 Taxpayer Compliance

Tax compliance refers to the behavior of taxpayers who voluntarily fulfill their tax obligations, including submitting and reporting relevant information in a timely manner, calculating taxes owed accurately, and making payments according to schedules without the need for intervention or coercion from the tax authorities. Conversely, tax non-compliance arises when one of these elements is not met (Amalia & Dwiatmanto, 2016). Tax compliance is defined as the state of individual taxpayers carrying out all obligations and fulfilling their rights in accordance with existing regulations.

This level of compliance can be seen from the accuracy in reporting through the Notification Letter (SPT) and the timeliness in paying the tax owed in accordance with the time period that has been determined (Ananda et al., 2015). In general, taxpayers are required to fulfill two types of compliance, namely formal compliance and material compliance. Formal compliance refers to the implementation of tax obligations carried out in line with applicable legal regulations, especially with regard to timeliness in reporting. In this case, taxpayers are required to submit a tax return before the predetermined deadline.

## 3. RESEARCH METHODOLOGY

The methods chosen for data collection in the practical report include:

### 3.1 Primary Data

Primary data is a type of research data source that is obtained or collected directly from DINPERINDAG District X. Primary data can be obtained in two ways, including:

#### 3.1.1 Interview Method

The interview method is carried out to obtain information about the data needed for the Final Project by asking directly to the Head of Subdivision and Subdivision of TU related to the revenue and income of UPPD X Regency.

#### 3.1.2 Observation Method

The observation method is a method chosen as a supporting source obtained through physical evidence including reports on the target and realization of Regional Original Revenue (PAD) in 2022, 2023 and 2024, as well as data information from the official website of UPPD of District X.

### 3.2 Required Data

The data used during the preparation of this final project includes reports on the target and realization of Motor Vehicle Tax (PKB) revenue, and data on the realization of Regional Original Revenue (PAD) presented in the form of quantitative tables, accompanied by an explanation of the allocation and use of the budget. According to (Halim, 2004) the following formula is used to calculate effectiveness and contribution:

#### 1. Ratio of Effectiveness

$$\text{Effectiveness} = \frac{\text{PKB Revenue Realization}}{\text{PKB Revenue Target}} \times 100\%$$

#### 2. Ratio of Contribution

$$\text{Contribution} = \frac{\text{PKB Revenue Realization}}{\text{PAD Revenue Realization}} \times 100\%$$

## 4. RESULTS AND DISCUSSIONS

According to data from the X Regency Regional Revenue and Management Unit (UPPD), the summary report on the realization of Motor Vehicle Tax (PKB) and Regional Original Revenue (PAD) is as follows:

### 4.1 Motor Vehicle Tax Target and Realization Report UPPD of District X Year 2022 - 2024 (December)

**Tabel 3.** Report PKB 2022 - 2024

Year	Target	Realization	Percentage
2022	230.197.437.000	223.814.185.725	97,22%
2023	252.384.139.000	223.611.656.925	88,60%
2024	269.560.284.000	218.810.000.750	81,20%

*Source : Monthly Report of UPPD District X (DPO-01)*

### 4.2 Local Revenue Target and Realization Report UPPD of District X Year 2022 - 2024 (December)

**Tabel 4.** Report PAD 2022 – 2024

Year	Target	Realization	Percentage
2022	364.072.862.800	341.078.640.648	93,69%
2023	392.838.585.000	340.009.939.599	86,55%
2024	393.992.334.000	340.881.360.318	86,57%

*Source : Monthly Report of UPPD District X (DPO-01)*

### 4.3 Ratio of Effectiveness

Based on table 4.1, the formula used to calculate the Effectiveness of Motor Vehicle Revenue (PKB) for the period 2022 - 2024 is as follows:

$$\begin{aligned} \text{Year 2022} & \frac{223.814.185.725}{230.197.437.000} \times 100\% \\ & = 97,23\% \\ \text{Year 2023} & \frac{223.611.656.925}{252.384.139.000} \times 100\% \\ & = 88,60\% \\ \text{Year 2024} & \frac{218.810.000.750}{269.560.284.000} \times 100\% \\ & = 81,17\% \end{aligned}$$

#### 4.4 Ratio of Contribution

Based on table 4.2 to find out how much the contribution of motorized vehicle tax to local revenue (PAD), the calculation of the results of the contribution ratio is as follows:

$$\begin{array}{rcl} \text{Year 2022} & \frac{218.810.000.750}{341.078.640.648} & \times 100\% \\ & = 65,61\% \end{array}$$

$$\begin{array}{rcl} \text{Year 2023} & \frac{223.611.656.925}{340.009.939.599} & \times 100\% \\ & = 65,76\% \end{array}$$

$$\begin{array}{rcl} \text{Year 2024} & \frac{218.810.000.750}{340.881.360.318} & \times 100\% \\ & = 64,12\% \end{array}$$

**Tabel 5.** Effectiveness and Contribution of PKB to PAD at UPPD of District X

Year	Ratio of Effectiveness	Category	Ratio of Contribution	Category
2022	97,23%	Effective	65,61%	Very Good
2023	88,60%	Moderately Effective	65,76%	Very Good
2024	81,17%	Moderately Effective	64,12%	Very Good

Table 4 illustrates the contradiction in local tax management practices. During the period 2022 to 2024, although the effectiveness ratio of local tax revenue showed a gradual decline every year, the contribution of Motor Vehicle Tax (PKB) to Local Revenue (PAD) in District X remained very significant. PKB plays a strategic role as one of the main sources of local revenue in District X. This is evident from the proportion of its contribution that is significant. This can be seen from its high proportion of contribution to PAD from 2022 to 2024. Although this percentage experienced slight fluctuations: 65.61% in 2022, a slight increase to 65.76% in 2023, then a slight decrease to 64.12% in 2024, this level of contribution was consistently in the very good category.

This condition clearly shows that PKB provides a substantial contribution to local revenue and is a key factor in strengthening the fiscal independence of the X District Local Government. The consistency of the contribution ratio of Motor Vehicle Tax (PKB) is also a reflection of how well the local government is able to manage and maximize the potential of existing tax revenues. Thus although the effectiveness ratio is experiencing symptoms of decline, the position of PKB remains as one of the fundamental pillars of PAD.

#### 4.5 Effectiveness of Motor Vehicle Tax Revenue (PKB) UPPD of District X Year 2022 - 2024.

Based on the source of the Decree of the Minister of Home Affairs (Kepmendagri) Number 690.900.329, the percentage of effectiveness of Motor Vehicle Tax (PKB) is still above 80% and is included in the effective and fairly effective criteria, which means that the effectiveness of Motor Vehicle Tax is still within a safe scope, but there is still a need to optimize the increase in Motor Vehicle Tax every year, because from the above calculations in 2024 the percentage of effectiveness only reaches 81.17%, this category is almost close to the criteria for less effective. UPPD District X periodically needs to make efforts so that the realization of Motor Vehicle Tax must be greater than the target set.

#### 4.6 Contribution of Motor Vehicle Tax (PKB) Revenue to Regional Original Revenue (PAD) in UPPD District X Year 2022 - 2024.

Based on the source of the Decree of the Minister of Home Affairs (Kepmendagri) Number 690.900.327, the percentage contribution of more than 50% is included in the very good category. Based on this analysis, the contribution of Motor Vehicle Tax (PKB) to Regional Revenue Receipts (PAD) during 2022 - 2024 is always above 60%, which means that Motor Vehicle Tax (PKB) is the main source to support and increase Regional Original Revenue (PAD) in District X. The realization of direct Motor Vehicle Tax revenue is very influential, the higher the realization achieved, the greater the contribution to Local Revenue.

Based on the previous discussion, it is necessary to propose an effectiveness and contribution analysis to determine the level of effectiveness of Motor Vehicle Tax revenue and contribution to Regional Original Revenue

at the District X Regional Revenue Management Unit. To encourage success in efforts to increase realization, it is necessary to carry out socialization activities in a wider scope, use social media such as WhatsApp to convey service information, incentive programs and notification of arrears to taxpayers, in addition to making a virtue of extending the Tax Amnesty Program to encourage taxpayers to pay overdue taxes, because the Tax Amnesty Program program can remove administrative fines for late payments so as to ease the burden on the community in paying taxes.

## 5. CONCLUSIONS

The results of field work practices at the District X Regional Revenue Management Unit (UPPD) with the Final Project title "Effectiveness of Motor Vehicle Tax Revenue and Contribution to Regional Original Revenue at UPPD District X" show that the effectiveness of Motor Vehicle Tax revenue in 2022-2024 has been running quite effectively, but there is still a need to optimize Motor Vehicle Tax revenue to increase the realization rate every year.

Optimization that can be implemented includes improving digital tax payment services, implementing a regular bleaching program, adding mobile SAMSAT fleets to rural areas, intensifying data collection of unregistered motorized vehicles, and increasing socialization and education to taxpayers regarding the importance of timely tax payments. Meanwhile, the contribution of Motor Vehicle Tax to Local Revenue has been running very well.

## SUGGESTION

To overcome problems or weaknesses in the District X Regional Revenue Management Unit such as the decline in the community's economy, tax payments that have only reached 66.6% in 2024 due to the large number of taxpayers who lack awareness of the importance of tax payments due to lack of socialization and education to the community, and have not carried out law enforcement against tax arrears optimally. It is recommended to carry out socialization activities in a wider scope, use social media such as WhatsApp to convey service information, incentive programs and notification of arrears to taxpayers.

In addition, implementing a policy of extending the Tax Amnesty Program to encourage taxpayers to pay overdue taxes, because the Tax Amnesty Program can remove administrative fines for late payments so as to ease the burden on the community in paying taxes. Analysis of effectiveness and contribution ratios also needs to be done to determine the level of revenue and its impact in one period, so that Motor Vehicle Tax revenue can be more effective.

## REFERENCES

- Amalia, R., & Dwiatmanto, T. (2016). Studi pada Kantor Samsat Kabupaten Bengkalis Riau. *Jurnal Administrasi Bisnis (JAB)*, 31(1), 35–41.
- Ananda, P. R. D., Kumadji, S., & Husaini, A. (2015). *Pengaruh Sosialisasi Perpajakan, Tarif Pajak, Dan Pemahaman Perpajakan Terhadap Kepatuhan Wajib Pajak*. 6(2), 6.
- Anggoro, D. D., Indriani, I., & Hikmat, R. A. A. A. (2023). Pajak Daerah dan Retribusi Daerah dalam Kebijakan Hubungan Keuangan Pusat dan Daerah. In *Pajak Daerah dan Retribusi Daerah dalam Kebijakan Hubungan Keuangan Pusat dan Daerah*. <https://doi.org/10.11594/ubpress9786232967908>
- Bapenda, jatengprov. (n.d.). *Sejarah Bapenda UPPD Banyumas*. Bapenda@jatengprov.go.id. <https://website.bapenda.jatengprov.go.id/page/sejarah>
- Efektifitas. (2024). Dictionary.com. <http://dictionary.reference.com/browse/effectiveness>
- Halim, A. 2004. (2004). *Akuntansi Sektor Publik*. Salemba Empat.
- Hartanti, H., Alviani, R. K., & Ratiyah, R. (2020). Pengaruh Samsat Keliling, Samsat Drive-Thru, E-Samsat Terhadap Penerimaan Pajak Kendaraan Bermotor Pada Kantor Samsat Jakarta Timur. *Jurnal Online Insan Akuntan*, 5(1), 125. <https://doi.org/10.51211/joia.v5i1.1327>
- jateng.prov.go.id. (2024). *Tekan Tunggakan Pajak Kendaraan Bermotor, Pemprov Jateng Optimalkan "Sengkuyung."* <https://jatengprov.go.id/publik/tekan-tunggakan-pajak-kendaraan-bermotor-pemprov-jateng-optimalkan-sengkuyung/>
- Mahmudi. (2019). *Analisa Laporan Keuangan Pemerintah Daerah*. Yogyakarta : UPP STIM YKPN, 2019. <https://library.bpk.go.id/koleksi/detil/jkpkbkpp-p-OSa8c7nnnO>



- Mardiasmo. (2018). Perpajakan Teori dan Kasus Edisi terbaru. In *Buku Satu, Salemba Empat, Jakarta*.
- pajak.go.id. (n.d.). *Pajak*. <https://pajak.go.id/>
- Salah, M., & Syarat, S. (2024). *Laporan tugas akhir meka n isme pembayara n pajak kendaraan bermotor melalui aplikasi signal pada samsat kota jambi*. [https://repository.unja.ac.id/71994/2/Cover.pdf?utm\\_source](https://repository.unja.ac.id/71994/2/Cover.pdf?utm_source)
- Setiawati, L. W., & Lim, M. (2015). Jurnal Akuntansi Jurnal Akuntansi. *Badruzaman JAJANG*, 12(1), 29–57.
- Statistik, B. P. (2019). *Badan Pusat Statistik Jawa Tengah*. Statistics of Maros Regency. <https://jateng.bps.go.id/id/statistics-table/3/VjJ3NGRGa3dkRk5MTIU1bVNFOTVVbmQyVURSTVFUMDkjMw==/jumlah-kendaraan-bermotor-menurut-kabupaten-kota-dan-jenis-kendaraan-di-provinsi-jawa-tengah--unit-2023.html?year=2023>
- Suara Merdeka Banyumas. (2024). *Tunggakan PKB di Banyumas Tinggi, DPRD Jateng Maksimalkan Sosialisasi ke Warga Masyarakat*. <https://banyumas.suaramerdeka.com/jawa-tengah/0910103905/tunggakan-pkb-di-banyumas-tinggi-dprd-jateng-maksimalkan-sosialisasi-ke-warga-masyarakat>
- UU RI No 28. (2009). Undang-Undang Republik Indonesia Nomor 28 Tahun 2009 Tentang Pajak Daerah Dan Retribusi Daerah. In *Экономика Региона* (Vol. 19, Issue 19).
- UU RI No 33, 2004. (2004). Undang-Undang Republik Indonesia Nomor 33 Tahun 2004. In *Metallurgical and Materials Transactions A* (Vol. 30, Issue 8). Lembaran Negara Republik Indonesia.