



## Exploring the Non-Tax Revenues of Environmental Management Bureau XI

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### ABSTRACT

The first is tax revenue, whereas the second is non-tax revenue. We are all aware of the importance of the economy to the survival of a nation. The nation's priority is the economy. The nation's progress is dependent on economic expansion. However, many individuals disregard how non-tax revenue affects the economy, preventing the nation from fully utilizing non-tax revenue to spur economic growth. Hence, it's indeed crucial to examine the non-tax revenue management system in light of how non-tax revenue affects the economy. This paper focuses on exploring the non-tax revenue of EMB XI and provide recommendations for enhancing the non-tax revenue management system. This study intends to investigate the key determinants of non-tax revenue collections for Region XI of the Environmental Management Bureau from 2017 to 2021. Additionally, the collections were calculated both before and after accounting for inflation adjustment. Based on secondary data extracted from EMB XI for the years 2017 to 2021, it was created. To investigate the significance of accounting for inflation adjustments in the collected non-tax revenues, descriptive and exploratory study designs are used.

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## **INTRODUCTION**

The whole purpose of tax and non-tax revenue is to generate revenue to the government to enhance the standard of living of a nation citizen, with specific interest on covering the government expenditure needs that can stimulate the economic growth and development of an economy. The dominant academic perspective at the moment is that non-tax revenue has a significant impact on the economy. Non-tax revenue contributes to improving national macro-control capabilities, igniting local government and departmental enthusiasm, compensating for the lack of financial budget funds, establishing public welfare, and fostering local economic development. On the other hand, over time, it burdens businesses more, distributes the government's financial resources, and hinders economic expansion. Economic growth and non-tax revenue go hand in hand. This journal will examine the impact of inflation to non-tax revenue and suggest proactive steps to enhance the non-tax revenue management system.

## **THEORETICAL REVIEW**

This study is based on descriptive and exploratory research design and the outcomes are analyzed. It is based on the 5-year series annual points covering the period 2017-2021. To investigate the significance of accounting for inflation adjustments in the collected non-tax revenues, descriptive and exploratory study designs are used. To determine the outcomes, some statistical and economic tools were utilized, such as paired sample t-tests and descriptive statistics.

## **METHODOLOGY**

Descriptive techniques are used to analyze each category of non-tax revenues in order to discover which collection has the least or greatest amount. The collections with and without inflation adjustment are compared using the paired sample t-test in JASP to see if there is a significant correlation. Non-tax revenues specifically the Clearance and Certification Fees, Fines and Penalties - Service Income, and Supervision and Regulation Enforcement Fees before and after reflecting the inflation adjustments are examined. Therefore, this study solely depends upon secondary data collected from EMB XI to analyze and derive the required conclusion from the collected secondary data.

## **RESULTS AND DISCUSSIONS**

### *Collections per Classification of Non-tax Revenues*

According to Table 1, the largest collection for the years 2017 through 2021 came from supervision and regulation enforcement fees, which accounted for 61% of all collections. Fines and penalties - service income came in second with 36%, and clearance and certification fees had the smallest collection, accounting for 3% of all collections.

Table 1. EMB XI Collections CY 2017-2021

Year	Clearance and Certification Fees	Fines and Penalties - Service Income	Supervision and Regulation Enforcement Fees
2017	418,120.00	4,065,300.00	6,295,308.88
2018	437,655.00	4,521,800.00	5,292,604.71
2019	682,960.00	8,577,200.00	17,747,514.43
2020	359,970.00	3,218,108.00	5,885,539.20
2021	505,765.00	7,389,383.24	11,500,466.06
Total	2,404,470.00	27,771,791.24	46,721,433.28
Percentage	3%	36%	61%

To further illustrate, Figure 1 below shows a graphical presentation displaying each classification of non-tax revenue collections for the years 2017-2021. This clearly demonstrates that Supervision and Regulation Enforcement Fees has the largest amount of collection each year. Specifically in the year 2019 where it reaches its highest collection of P 17,747,514.43.

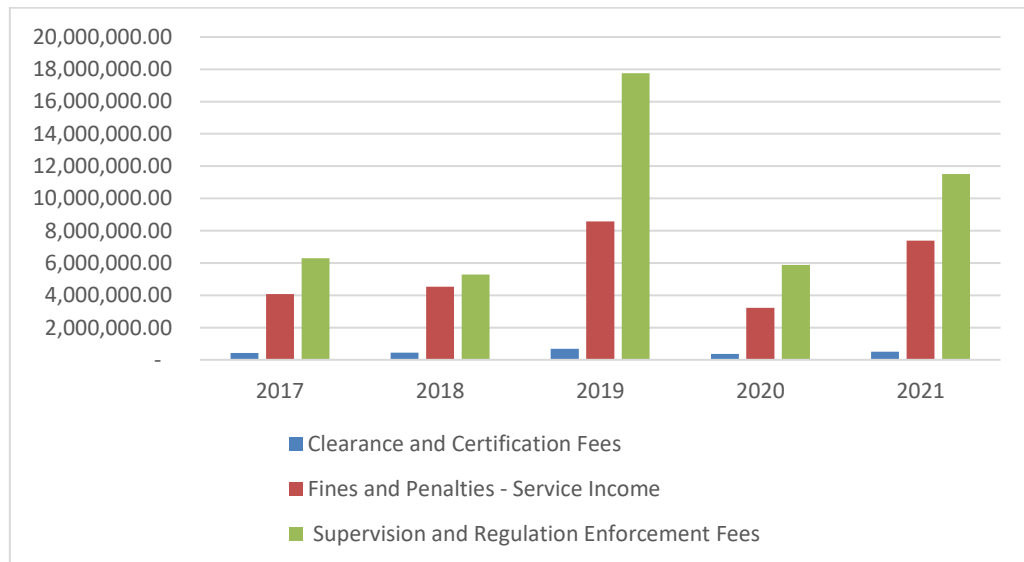


Figure 1. Graphical Condition of Non-tax revenues of EMB XI CY 2017-2021

#### *Collections Before and After Inflation Adjustment*

The non-tax revenue receipts from 2017 to 2021, adjusted for inflation, are displayed in Table 2 below. It is evident that the entire amount of Collections without Inflation Adjustment is 76,897,694.52. Collections with Inflation Adjustment, however, have a much higher sum of 250,494,603.7.

Collections from year 2017-2021 is only 31% of the “what could have been collected” should the inflation adjustment was accounted for.

Table 2. EMB XI Collections With and Without Inflation Rate

Year	Collections without Inflation Adjustment	Inflation Rate	Collections with Inflation Adjustment
2017	10,778,728.88	2.85	30,719,377.30
2018	10,252,059.71	5.21	53,413,231.09
2019	27,007,674.43	2.50	67,519,186.08
2020	9,463,617.20	2.39	22,618,045.11
2021	19,395,614.30	3.93	76,224,764.20
<b>Total</b>	<b>76,897,694.52</b>		<b>250,494,603.77</b>
<b>Percentage</b>			<b>31%</b>

This idea is supported by Figure 2 below. It is evident that EMB XI might have brought in more non-tax revenue had inflation adjustment been taken into account as opposed to collections without it.

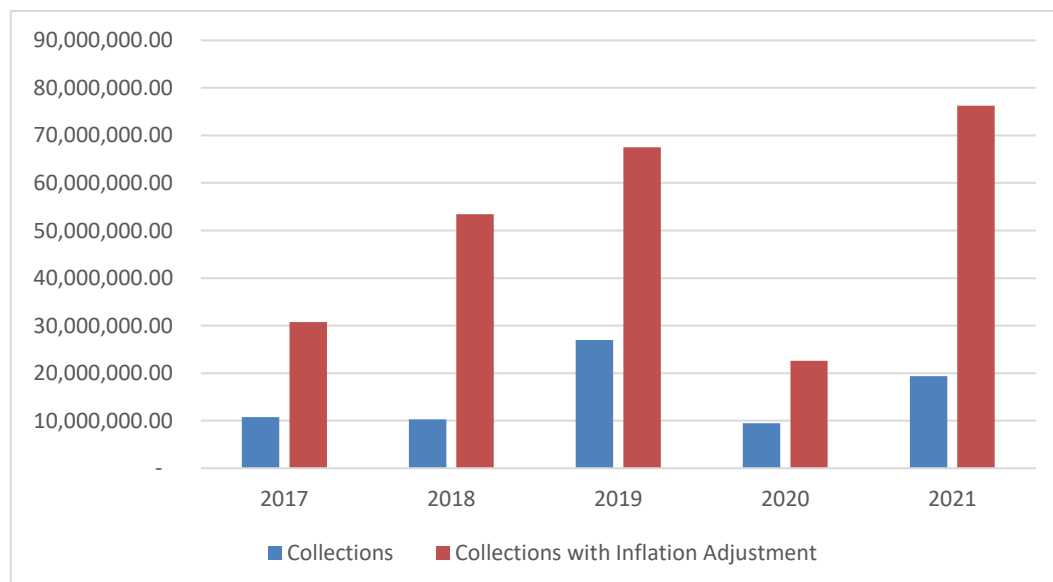


Figure 2. Graphical Condition of Non-tax revenues of EMB XI CY 2017-2021 with and without Inflation Rate

*Significance of Inflation Adjustment*

To compare paired data sets, the paired samples t-test is utilized. The null hypothesis for this study is that there is no significant difference between the collections before and after accounting for the inflation adjustment. Examining the results of the paired t-tests, the author comes to the conclusion that the null hypothesis should not be accepted and that the alternative null hypothesis should be accepted instead because the p-value is less than 0.05 level of significance (0.006 under Student Test and 0.031 under Wilcoxon Test), respectively. Thus, there is a significant difference between the collections before and after accounting for the inflation adjustment in this case.

Table 3. Significant Difference between the Collections Before and After Accounting

Paired Samples T-Test						
Measure 1	Measure 2	Test	Statistic	df	p	VS-MPR*
Collections without Inflation Adjustment	Collections with Inflation Adjustment	Student	-4.345	4	0.006	11.821
		Wilcoxon	0.000		0.031	3.397

*Note.* For all tests, the alternative hypothesis specifies that Collections without Inflation Adjustment is less than Collections with Inflation Adjustment.

Assumption Checks

Test of Normality (Shapiro-Wilk)

		W	p
Collections without Inflation Adjustment	Collections with Inflation Adjustment	0.939	0.660

*Note.* Significant results suggest a deviation from normality.

According to the findings, EMB XI has mostly collected supervision and regulation enforcement fees, accounting for 61% of the total collections from 2017 to 2021, out of the three categories of non-tax revenue collections. This is true because fines associated with environmental enforcement can be used to collect this category of non-tax revenue. The collection without inflation adjustment only represents the 31% of the total collections should there is inflation adjustment being accounted to the non-tax revenues collections for the period 2017-2021. Additionally, the paired sample t-tests were used to determine whether there was a difference between the collections before and after accounting for inflation.

**CONCLUSIONS AND RECOMMENDATIONS**

In conclusion, there is a significant difference between the collections before and after accounting for inflation. It was discovered that if inflation had been factored into the environmental fees and charges, the government could

have obtained more revenue. It is advised that EMB XI take into account and include an inflation adjustment in its fees and charges to account for inflation and to further boost revenue management, which then finances the government's spending. The first is tax revenue, whereas the second is non-tax revenue. We are all aware of the importance of the economy to the survival of a nation. The nation's priority is the economy. The nation's progress is dependent on economic expansion.

Suggestions for this research is the company should be able to improve employee performance, by evaluating the performance. so that the performance evaluation can make one solution to see the existing problems. In addition, companies must also pay attention to aspects of communication and work environment so that in the future the company's performance can be achieved even better. The nation's priority is the economy. The nation's progress is dependent on economic expansion. However, many individuals disregard how non-tax revenue affects the economy, preventing the nation from fully utilizing non-tax revenue to spur economic growth.

Hence, it's indeed crucial to examine the non-tax revenue management system in light of how non-tax revenue affects the economy. This paper focuses on exploring the non-tax revenue of EMB XI and provide recommendations for enhancing the non-tax revenue management system. This study intends to investigate the key determinants of non-tax revenue collections for Region XI of the Environmental Management Bureau from 2017 to 2021. Additionally, the collections were calculated both before and after accounting for inflation adjustment. Based on secondary data extracted from EMB XI for the years 2017 to 2021, it was created. To investigate the significance of accounting for inflation adjustments in the collected non-tax revenues, descriptive and exploratory study designs are used.

### **FURTHER STUDY**

However, many individuals disregard how non-tax revenue affects the economy, preventing the nation from fully utilizing non-tax revenue to spur economic growth. Hence, it's indeed crucial to examine the non-tax revenue management system in light of how non-tax revenue affects the economy.

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