

Analysis of The Medium-Term Fiscal Framework: A Financial Planning Tool

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Abstract: In Colombia, the Medium Term Fiscal Framework (MFMP) was implemented to strengthen fiscal management, promote sustainability, and guarantee economic stability in the medium term due to the significant fiscal challenges the country faced in the past, such as high fiscal deficits and a growing debt burden. The implementation of the MFMP sought to address these challenges and strengthen fiscal consolidation in the medium term, ensuring a sustainable balance between public revenues and expenditures. MFMP is a public sector financial planning tool established by Law 819 of 2003, through which, based on estimates for the current year and in the context of internal and external conditions, They project income and expenses for ten years to guarantee compliance with current debt standards, rationalization of public spending, transparency, discipline, and fiscal responsibility; all of this to make the territorial entity solvent, financially viable and fiscally sustainable, by the provisions of the National Constitution. Within MFMP, the financial plan is crucial because it is a strategic document that establishes the financial goals, objectives, and actions necessary to achieve them. It is a fundamental tool for implementing and monitoring established fiscal policies, provides a comprehensive view of the Entity's financial activities, and establishes a framework for allocating resources and monitoring financial performance.

Keywords: Medium Term Fiscal Framework; Planning and Public Finances; Solvency and Sustainability; Projection and Income; Financial Activities and Establishes; Growing Debt Burden; Fiscal Management.

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1. Introduction

The financial plan is crucial within the Medium Term Fiscal Framework (MFMP) because it is a strategic document that establishes the financial goals, objectives, and actions necessary to achieve them. It is a fundamental tool for implementing and monitoring established fiscal policies; it provides a comprehensive view of the Entity's financial activities and establishes a framework to allocate resources and monitor financial performance [1]. As defined by the Organic Budget Statute, "the Financial Plan is an instrument of financial planning and management of the public sector, which is based on the effective operations of the entities. Consequently, it takes into consideration the forecasts of income, expenses, deficit and its financing compatible with the Annual Cash Program and the exchange and monetary policies." It constitutes a strategic instrument for district planning to the extent that it is a central element of the Budget System and serves as the basis for the preparation of the Annual Operational Investment Plan -POAI- and the annual General Budget, as stipulated in Art. 6 of Decree 006 of 1998, Organic Statute of the Budget of the District of Medellín [2].

Through the financial plan, the medium-term scenario of district finances is estimated and used for the fiscal programming of public entities. It is an essential tool to dimension the administration's goals and ensure the availability of resources for their

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execution since it determines the income generation capacity and the corresponding expenses, seeking to guarantee the financial sustainability of the district [3].

In this essay, we will explore the importance of the financial plan and analyze how accurate the projections of income and expenses that have been reflected in the financial plan of the medium-term fiscal framework have been. We will delve a little into how they are carried out: these estimates, what elements interfere, and a deeper look at the main incomes of the district [4].

For 2022, a Financial Plan is prepared per the provisions set forth in the Law and the recommendations of the Ministry of Finance and Public Credit -MHCP-. The structure of the figures presented, and the Annex that supports the Financial Data Medium-Term Fiscal Framework 2022-2031 incorporates changes in the application of the new Budget Classification Catalog for Territorial and Decentralized Entities CCPET, issued by the MHCP through Resolution No. 401 of 2021 [5].

In this planning exercise, income projections result from technical analysis and the application of various statistical methodologies of recognized validity and suitability, adjusted to collection expectations [6]. They incorporate the result of the legal provisions, the periodic monitoring of the historical collection of the concepts, the constant monitoring of the main macroeconomic indicators, and the management that the administration will carry out regarding the strengthening of the collection in matters of tax inspection, cadastral management, and collection actions [7].

In terms of expenses, maximum expenditures are projected for operating expenses and transfers to control agencies, considering criteria of efficiency and optimization of resources by the provisions of Law 617 of 2000 and Law 1416 of 2010 [8]. The expenses associated with debt service that is, interests, amortizations, and commissions, are estimated taking into account the current programming of disbursements and amortizations, as well as the debt needs that derive from the projected fiscal result, in addition to the macroeconomic variables that affect it and the interest rate and exchange rate risk hedging methodology defined by the Financial Superintendence of Colombia, in coherence with the provisions of Law 819 of 2003. Finally, the debt levels are rigorously analyzed to guarantee the fiscal sustainability and financial solvency of the Diatrito and maintain high levels of social investment [9].

The projection of income and expenses is an important aspect of the MFMP because it guarantees fiscal sustainability and medium-term financial planning. It is important to highlight that income and expense projections within the MFMP must be realistic and based on reliable and updated information [10]. Additionally, it is advisable to periodically review projections as new information becomes available or as significant changes occur in the economic and fiscal environment.

2. Theoretical Framework

The Medium Term Fiscal Framework (MFMP) is based on different approaches and principles of economic and financial theory, as well as international best practices in fiscal management. It seeks to ensure that public finances are viable and stable long-term. It is based on the idea that governments should avoid excessive fiscal deficits and debt accumulation to maintain a sound financial position and ensure economic stability.

To understand the importance of the Medium-Term Fiscal Framework in the public finances of national and territorial entities, it is pertinent to refer to all the concepts and laws that frame it.

Giraldo [4] gives an approach from the neoclassical perspective, which is the approach of the so-called standard economy; public finances constitute a redistribution of the market's allocation of a society's resources. In this sense, public finances constitute a market distortion to the extent that resources are extracted from economic agents through the collection of taxes and resigned through public spending. Public finances would be allocating resources outside the allocation made by the market.

State finances constitute the economic activity of the public sector, with its particular and characteristic structure that coexists with the market economy, from which they obtain the resources to which they provide a framework for action.

State finances, also called "Public Finances", Public Finance and Financial Economics, is a social science, a science of culture, located between large scientific fields: economics, Law, and politics. It is a science that studies one of the most important functions or activities of study: financial activity, which is the management carried out by the public Entity to achieve the economic means that allow it to achieve its goals.

On the other hand, according to Escobar Herrera [5] infers that public finances are defined as the set of economic choices that manifest the relationship of income and expenses of the state, as long as they are contained in the budget system, which exhibits a mutual relationship between public income and state activities. These deal not only with money, liquidity, or the need for

capital but also with problems such as resource allocation, income distribution, economic stability, full employment, price stability, and economic development.

Likewise, Law 152 of 1994, Organic Law of the Development Plan, establishes that the Development Plan will comprise a general part and an investment plan of public entities, the latter being part of the Financial Plan. Furthermore, it establishes to ensure macroeconomic and financial stability, the spending plans derived from the development plans must be consistent with the income and financing projections following the restrictions of the financial program of the public sector and the financial programming for the entire economy that is consistent with said stability. Its consistency with the fiscal rule in the Medium-Term Fiscal Framework must be guaranteed.

Financial planning has been a crucial tool for resource management in organizations and governments for a long time. As territorial entities grew in size and complexity, the need arose for more structured and long-term approaches to financial management and seeing the need to overcome the limitations of annual financial planning, the implementation of medium-term fiscal frameworks arose that allowed a broader vision of income, expenses, investments, and financial commitments, which facilitates strategic decision-making. Many countries and subnational governments have adopted medium-term fiscal framework approaches to ensure financial sustainability and avoid long-term deficits and imbalances. Examples include the Fiscal Responsibility Law in Brazil and the Medium-Term Planning System in Colombia, with Law 819 of 2003 establishing the medium-term fiscal framework as a management instrument for territorial entities. This has led to the implementation financial plans that seek to strengthen financial planning and management at the local level, thus allowing many cities, municipalities, and districts to implement medium-term financial plans and fiscal frameworks to guarantee coherence between development objectives and objectives. Available resources. These approaches allow for better long-term project and service planning.

The application of the Medium-Term Fiscal Framework is, in turn, subject to compliance with Laws 358 of 1997 on debt, 617 of 2000, which deals with austerity in spending, and 819 of 2003, which requires responsible financial management of public resources to fiscal responsibility and debt sustainability.

3. Background

The budget as a financial management tool dates back several centuries, showing a historical evolution towards greater transparency, control, and efficiency in financial management. From its origin in government management to its application in the private sector, the budget has been fundamental for planning and controlling financial resources, providing a structure for decision-making and achieving organizational objectives. Below are some important milestones in the historical development of budgets:

18th century: Jean-Baptiste Colbert, Louis XIV's Minister of Finance in France, is credited with creating one of the first modern government budgets. Colbert established a detailed system of income and expenditure to control the country's finances and promote transparency in fiscal management [11].

19th century: During this period, the budget began to be used in several European countries, such as the United Kingdom and Germany. In the United Kingdom, the Treasury Act of 1866 established the need to present and approve an annual budget before Parliament [12].

20th century: Throughout the 20th century, the use of the budget expanded in both the public and private sectors. Budgeting became popular in business organizations for planning and controlling financial resources. In addition, more sophisticated techniques and methodologies were developed for preparing and monitoring budgets [13].

The emergence of the Zero-Based Budget (PBC): In the 1970s, zero-based budgeting gained popularity. The PBC proposes that expenditures be justified and approved from scratch for each budget cycle rather than based on increases or adjustments over the previous year's budget. This methodology seeks to prioritize and allocate resources more efficiently [14].

Advances in technology and management tools: With the advent of technology, software and computer tools have been developed to facilitate budget preparation, monitoring, and analysis. This has allowed for greater accuracy, automation, and collaboration in the budget process. The Medium Term Fiscal Framework (MFMP) is a fiscal planning and management tool implemented in various countries and territorial entities worldwide. Below is some relevant background information on the MFMP.

Chile: Chile was one of the first countries to adopt the concept of the MFMP in the late 1990s. Through the Constitutional Organic Law on State Financial Administration, the obligation to present a Medium-Term Framework in the budget process was established to improve coordination between fiscal policies and development plans [15]

South Africa: In South Africa, the MFMP was introduced in 1998 as part of the medium-term budget process. The objective was to improve transparency, accountability, and efficiency in the management of public finances, as well as promote fiscal stability and long-term sustainability [16].

Colombia: In Colombia, the MFMP is established in the Fiscal Responsibility Law (Law 617 of 2000) and the National Development Plan Law. These laws require the development of a Medium-Term Fiscal Framework that allows the coordination of fiscal policy with the country's economic and social development objectives [17].

Canada: Canada implemented the MFMP through the Stability and Growth Program, which was introduced in the 1990s. The program promotes responsible fiscal management, setting medium-term budget balance goals, and ensuring long-term fiscal sustainability [18].

United Kingdom: The MFMP is the Comprehensive Spending Review in the UK. This process is carried out every five years and aims to establish the limits and priorities of government spending for a given period. The Comprehensive Spending Review is integral to the UK Government's financial planning and management.

These are just a few examples of countries implementing the MFMP as part of their fiscal policies and economic development strategies. Each background offers valuable lessons and learnings about implementing the MFMP, the importance of coordination between fiscal policies and development objectives, and the need to ensure long-term fiscal sustainability.

Governments use the medium-term fiscal framework to plan and manage their public finances over three to five years, providing a broader and more strategic vision than the annual budget. The antecedents of this approach go back several decades and are related to the evolution of fiscal policies and budget management in different countries.

Medium-term Budget: In many countries, the traditional practice was to prepare annual budgets without a long-term vision. As the complexity of public finances increased, difficulties arose in effectively addressing fiscal planning and stability challenges. The need for a broader perspective led to the adoption of medium-term budgets.

Economic and fiscal crises: In economic and fiscal crises, some governments were forced to take urgent and short-term measures to control deficits and public debt. However, these actions often led to long-term negative impacts and a lack of fiscal sustainability. In response to these experiences, the idea of a more strategic and forward-looking approach emerged, such as the medium-term fiscal framework.

International good practices: Various international organizations, such as the International Monetary Fund (IMF), the World Bank, and the OECD, have promoted the adoption of medium-term fiscal frameworks as a recommended practice for sound and transparent fiscal management. These institutions have provided guidance and technical assistance for designing and implementing such frameworks.

Long-term policy approach: Medium-term planning allows governments to set more ambitious goals and priorities that cannot be fully addressed in a single budget year. The medium-term fiscal framework encourages a more strategic approach considering longer-term economic and social trends.

4. Methodology

In this essay, an exercise will be carried out with quantitative parameters of comparative analysis of figures, evidencing the assertiveness that the District of Medellín has had in the projection of its income and expenses incorporated in the Financial Plan for the fiscal period 2022 and how it has been the deviation from the projection of the Law Indicators that are related to the viability and fiscal sustainability for said validity; For this purpose, a comparative analysis of the Financial Plan and the Budget of the territorial Entity will be carried out for the period 2022.

With this objective, the construction of the information is based on the 2022 Initial Budget reported in the MFMP 2022-2031 of the Mayor's Office of Medellín and the official budget executions of income and expenses for 2022 reported on the Entity's website; for its part, the analysis of the information takes as a reference the arguments contained in Chapter 8 of Financial Data of the MFMP 2022-2031 of the Mayor's Office of Medellín, and in the 2022 Management Report of the Territorial Entity; as well as in fieldwork/interviews? Carried out with the technical team of the Fiscal Planning and Analysis Unit.

5. Results

The deviation in the projections in the 2022 Financial Plan of the MFMP of the Mayor's Office of Medellín compared to the income and expense budget executed in said period is slightly moderate, higher for income to expenditure.

From the perspective of income, there were, in general terms, underestimates due to a series of factors, among which the assumption of a moderate economic recovery scenario stands out depending on the economic and social context at the time of

preparation of the projections regulatory and methodological changes. Unforeseen or difficult financial quantification, increase in inflation, and interest rates above what was expected. However, a deviation of 10% in the income estimate seems acceptable and appropriate since the Ministry of Finance and Public Credit of Colombia's (year) recommendations indicate that the projections must be conservative in the income estimate but taking into account a more in-depth analysis of each income concept.

From the expenditure perspective, overestimations were presented based on the various regulatory methodologies required to quantify public expenditure on operation (2.4%) and Public Debt (15.5%), the MFMP as an instrument of financial planning for the sector. The public must contain the maximum expenses to be made during the year, as underestimation would generate a budget imbalance. The underestimation of Investment Expenditure is understandable and recurring in the public sector since this component is projected as a residual product of deducting from Income, Operating Expenses, and Public Debt. Additionally, transfers and additions increase the item when executing the investment.

6. Discussion

6.1. Practical Case

According to the proposed methodology, in brief, the income and expense projections contemplated in the Financial Plan for the 2022 term of the MFMP 2022-2031 of the Mayor's Office of Medellín are presented, which will be compared with the budget execution for the 2022 term, to evaluate the level of certainty that was presented in this financial planning instrument for said validity.

Before beginning the competent analysis, it is necessary to briefly refer to the macroeconomic context that conditioned the district fiscal perspectives for 2022. The period 2021 is when the financial projections to be included in the MFMP 2022-2031 are prepared. And which constitute the (Article 5 of Law 819 of 2003, "By which organic regulations are dictated regarding budget, fiscal responsibility and transparency and other provisions are dictated," stipulates that the MFMP for Territorial Entities "will be presented) as the main input for the preparation of the 2022 District Budget, is developed under sui generis economic, social and environmental conditions. So far, in 2021, the world has continued to face the crisis generated by the COVID-19 virus. Although there were prospects for economic recovery in 2020, there was a panorama of high uncertainty generated by epidemiological persistence, the worsening of economic effects and social conditions, the risk of a possible economic recession, and at the national level, the uncertainty generated a change of national government.

For its part, although what happened in 2022 showed signs of economic recovery, some events seemed to worsen the forecasts made six months ago, especially the beginning of the war between Russia and Ukraine, which generated a global shortage of raw materials. and inputs, generating problems of food and energy shortages, putting upward pressure on inflation expectations, and motivating increases in the intervention interest rates of the monetary authorities; which preeminently affected the execution of public spending (Table 1).

Table 1: 2022 Financial Plan versus 2022 executed Budget, Mayor's Office of Medellín (Amounts in millions of pesos)

CONCEPT	Initial Budget 2022	Execution 2022	Variation in execution versus estimation	
			Resources	Percentage
CURRENT INCOME	4,177,883	4,692,019	514,136	12.3%
Tax Revenue	1,961,514	2,168,124	206,609	10.5%
Non-Tax Income	2,216,368	2,523,895	307,527	13.9%
Current transfers	1,715,264	1,955,802	240,539	14.0%
Rest of Non-Tax Income	501.105	568,093	66,988	13.4%
CAPITAL RESOURCES	2,113,876	2,268,105	154,229	7.3%
Asset Disposal	1,061	5,474	4,413	416.1%
Financial Surpluses	1,809,250	1,854,853	45,603	2.5%
Dividends and profits from other capital investments	5,694	5,790	96	1.7%
Financial performances	88,644	129,724	41,080	46.3%
Internal Credit Resources	200,000	200,000	0	0.0%
Capital Transfers	177	256	79	44.3%
Balance Sheet Resources	0	31,586	31,586	NA

Other Capital Resources	9,050	40,422	31,373	346.7%
TOTAL REVENUE	6,291,759	6,960,124	668,365	10.6%
OPERATING EXPENSES	821,986	802,106	-19,880	-2.4%
Central Level	726,177	706,658	-19,518	-2.7%
Watchdogs	95,810	95,448	-362	-0.4%
PUBLIC DEBT	413,065	348,855	-64,210	-15.5%
Public Debt Service	383,980	347,750	-36,230	-9.4%
External	112,493	93,566	-18,928	-16.8%
Main External Debt	82,775	68,896	-13,879	-16.8%
External Debt Interest	29,358	24,397	-4,961	-16.9%
Commissions and other expenses	360	273	-87	-24.2%
Internal	271,487	254,184	-17,303	-6.4%
Main Internal Debt	116,963	116,963	0	0.0%
Internal Debt Interest	154,172	136,940	-17,232	-11.2%
Commissions and other internal debt expenses	353	282	-71	-20.0%
Pension Bonds	29,085	1,105	-27,979	-96.2%
ANNUAL INVESTMENT OPERATING PLAN	5,056,707	5,102,851	46,144	0.9%
TOTAL EXPENSES	6,291,759	6,253,812	-37,946	-0.6%

In the same period in which the budget project must be presented.” For its part, Decree 006 of 1998 “by which Agreement 52 of 1995 and Agreement 38 of 1997 are compiled, which make up the Organic Statute of the Budget of the Municipality of Medellín” in Article 50 defines that “The Municipal Government will submit the project of the General Budget of the Municipality of Medellín for consideration by the Municipal Council through the Ministry of Finance, during the first ten (10) days of the last period of ordinary sessions of each term, it will contain the Project of Income, Expenses and the Taxes workout”. 2022, Mayor’s Office of Medellín, MFMP 2022-2031. 2023, Mayor’s Office of Medellín, Execution of Income and expenses with a cut-off date of December 31, 2022.

6.2. Income

On the other hand, it is important to note that according to the recommendations of the Ministry of Finance and Public Credit of Colombia (year), the concepts projected to be included in the Financial Plan only include those that, due to their nature, have recurrence. At the same time, the Budget Execution Report contains all the concepts that are entered. In this order of ideas, and to preserve the objective of the analysis, the information presented in the previous table in the “2022 budget execution” column only includes the concepts initially projected in the Financial Plan. Therefore, the column’s totalization is lower than that recorded in the Budget Execution as of December 31, 2022.

During the outlined macroeconomic climate, the Financial Plan for the 2022 period estimated a total income of \$6,291,759 under the hypothesis of an attenuated economic recovery to the 2021 period, which was confirmed by the budget execution. , because despite macroeconomic pressures, it presented an overexecution of \$668,365 million, which implied an underestimation of the income projection of 10.6%. Of the total of this lower estimate included in the initial budget or greater execution 2022, Current Income explains 76.9% with \$514,136 million and Capital Resources the remaining 23.1% with \$154,229 million.

The projection evaluated through the income composition was quite accurate; thus, the Current Income participated in the total income at 67.4% compared to the estimated 66.4%, and the Capital Resources at 32.6% to the 33.6% projected. As predicted, the income was driven by non-tax income, specifically current transfers, EPM financial surpluses, and the collection of industry and commerce taxes. These concepts explain 66.5% of the total income executed.

Within Current Income, Tax Income explains 30.9% of the total underestimation of income, and Non-Tax Income is 46.0%. The amount of \$206,609 million of deviation corresponding to Tax Revenue is mainly explained by the underestimation of concepts such as the Industry and Commerce Tax with a higher execution than the initial one in \$192,272 million, which was mainly due to the appointment of new self-withholding agents for the said period, which advanced the amount to be collected in the following period. The Prospect and Recreation Rate is \$20,009 million in addition to the initial one since this concept was incorporated for the first time into the budget through the MFMP 2022-2031 because it has full support. However, an underestimation was generated without a sufficient historical series to generate a more accurate projection.

The previous projections below what was collected were partially compensated by overestimations in concepts such as the Industry and Commerce Tax from previous periods (portfolio recovery) and the Unified Property Tax. The first concept was estimated at \$15,731 million above what was included in the initial budget. Because its projection did not take into account the magnitude of the impact of the elimination of the provisional settlement system in 2022, which resulted in the non-monthly billing of the provisional tax. Meanwhile, the Unified Property Tax did not reach the budget goal during the term, with the remaining \$10,530 million below, mainly due to the deterioration of the payment culture as a result of the economic impact of the COVID-19 pandemic and the low impact on collection due to the cadastral update of commune 5.

For its part, the lower estimated value in Non-Tax Income to what was projected is largely due to Current Transfers with an underestimation of \$240,539 million, explained mainly by the concepts of ADRES Resources - UPC co-financing, subsidized regime, and SGP Education - Provision of educational services that explain about 80%.

The first underestimation was because the projection did not capture the regulatory change that occurred through Resolution 2292 of December 2021 of the Ministry of Health and Social Protection, through which procedures for health services and technologies were updated and incorporated. Health is financed with resources from the Capitation Payment Unit -UPC. Additionally, in 2022, a methodological change was presented in legalizing the Monthly Settlement of Affiliates' resources, generating greater allocations. The underestimation of the concept of transfers from the SGP Education - Provision of educational services is because these resources, being for a specific destination and financing the payment of the teacher payroll, are projected conservatively, based on the inflation goal of the Bank of the Republic (3%); however, the CPI for 2021 was 5.62%.

Finally, the underestimation in Capital Resources of \$154,229 million is due 28.9% (\$44,565 million) to the EPM financial surpluses, which are incorporated according to the estimate made by the Company based on its Financial Plan, and is executed based on the profit obtained in the previous term, by 20.8% (\$32,013 million) for recoveries of own resources, corresponding to the income that entities financed with public resources, mainly resources delivered in delegated administration, return to the district since they were not executed in their entirety; and whose projection is made primarily based on the historical collection, since it usually has a significant component of uncertainty; by 20.6% due to Financial Returns on Own Resources (31,761 million), which was due to the increase in interest rates during the period 2022, which were well above macroeconomic expectations at the time of the projection since it was with a controlled inflation scenario; However, it closed at 13.12%, prompting the intervention of the Bank of the Republic with the increase in monetary intervention rates.

Finally, the 2022 Financial Plan did not incorporate a projection of a fiscal surplus for free use, primarily because the collection prospects for own resources in 2021 were very close to what was projected in the initial budget. However, During the period in force, the collection of current revenues for free use was above what was projected, and spending was below, which generated a free-use fiscal surplus of \$31,586 million, which explains 20.5% of the underestimation of total resources and capital for the period 2022.

6.3. Bills

According to the budget restriction, what is projected in the Financial Plan to be received in the income is distributed among the different expenses to be covered during the term, presenting a balanced financial program.

In contrast to Total Income, the Expenditure aggregate is characterized by having overestimations in contrast to the underestimation of income, which occurs for the sub-aggregates of Operating Expenses and Public Debt Service due to the projection calculation methodology, while the investment is usually executed above what was projected. Thus, during the 2022 period, an overestimation was generated in the total Expenses of \$37,946 million, corresponding to a deviation of 0.9% from what was executed.

The operating expenses component was overestimated by \$19,880 million, 98.2% of which was explained by central-level operating expenses and the remaining 1.8% by operating expenses for control agencies. The operating expenses of the central level presented an overestimation of \$19,518 million to what was executed. This is due to two opposing factors: on the one hand, the financial provision is calculated assuming a staff whose size will remain constant and 100% occupied during the time horizon of the MFMP, that is, without exclusion of vacancies since these can be provided in any moment; However, in the financial reality of 2022, the charging plant was occupied below its capacity, which generated the release of initially budgeted resources.

On the other hand, operating expenses largely incorporate items associated with salaries (59.5% of what was executed in Operating Expenses at the central level corresponds to Personnel Expenses) that are projected based on assumptions about the annual growth of the municipal salary, which is tied to the annual closing of the variation of the Consumer Price Index -CPI- of the validity former; In this case, a closing CPI for 2021 of 4.5% was assumed, however, this was 5.62%; which partially absorbed the release of resources generated by the projection of a fully occupied plant.

The amount in the Financial Plan is appropriated to cover the operating expenses transferred to the Control Bodies, the Comptroller's Office. Personality and Council generated an overestimation of \$362 million. This is mainly because the transfers for Personería and Concejo were lower than the maximum limit calculated based on the actual operating expenses, generating an overestimation of \$803 million. For their part, transfers to the Comptroller's Office were underestimated by \$442 million due to the projected CPI closing for 2021 of 4.5%, which was lower than the actual closing of 5.62%. The paragraph of article 2 of Law 1416 of 2010 defines that: Starting in 2011, the expenses of the Municipal Comptrollers' Offices will grow percentageally by the highest figure resulting from comparing the inflation caused in the previous year and that projected for the following year the respective district or municipality. Article 10 of Law 617 of 2000 establishes that legal expenses for special category municipalities cannot exceed 1.6% of current freely allocated income. Article 10 of Law 617 of 2000 establishes that, during each fiscal period, the expenses of the Councils may not exceed the value corresponding to the total of the fees incurred for the number of authorized sessions. In the case of the District of Medellín, 150 ordinary sessions and up to 40 extraordinary sessions per year may be paid annually (Article 1 of Law 1368 of 2009) plus one point five percent (1.5%) of the current income of free destination.

Likewise, the Expenses associated with the Public Debt were overestimated in the Financial Plan for the 2022 period by a total value of \$64,210 million, explained in 56.4% by the Public Debt Service and 43.6% by Pension Bonds. Debt Service quantifies the payment of capital, interest, and some expenses associated with the cancellation of financing operations contracted by the Territorial Entity, such as the contracting of loans, issuance, subscription, and placement of bonds and securities. In this regard, the projection methodology is based on the estimation of each of the components according to the contractual conditions under which each loan was agreed upon, such as interest rate, term, grace period, and scheduling of additional disbursements and their assumed conditions.

Consequently, the projection of the Debt Service requires establishing assumptions about the expected behavior of the interest rate reference indicators such as CPI, IBR, and DTF. Additionally, the paragraph of article 14 of Law 819 of 2003 provides that the projection of the interests

and the balance of the debt will consider the interest rate and exchange rate risk coverage percentages defined quarterly by the Banking Superintendency. In the case of the Financial Plan valid for 2022, the percentage was used for the Exchange Rate of 18.253% and 74.1% for the Interest Rate according to the Resolution of the Financial Superintendency 0625 of June 2021.

In short, the overestimation of the External Debt Service is due to the use of a stressed TRM assumption above, at which the interest on the credit contract with the French Development Agency -AFD- was finally paid. Similarly, the Internal Public Debt Service used stressed interest rates, which, despite the increase in interest rates during the 2022 term, generally ended up being above what was paid periodically, except for the estimated 2022 CPI closing. 8.71% stressed, compared to 13.12% caused, which generated an underestimation in the interest payment on the issued Securities.

Finally, the Investment component included in the 2022 Financial Plan had an underestimation of \$46,144 million; this is because its calculation in terms of financial planning corresponds to a residual, that is, based on the income to be received during the term, the coverage for the Public Debt Service and the Operating Costs, in compliance with the Law indicators, the remaining resources are subsequently distributed to make the Public Investment coverage. For its part, the execution of the Investment budget for the 2022 period was higher due to budget transfers between aggregates, that is, the release of resources from Operating Expenses and Public Debt towards Investment, or Budget Additions, for example of allocated resources, such for example, greater distribution through current transfers.

6.4. Law Indicators

As mentioned in the methodological section, Law 819 of 2003, defined in Article 5, Territorial Entities must annually present the primary surplus goals in their Medium-Term Fiscal Framework without prejudice to the limits on expenses of operation established in Law 617 of 2000 and to guarantee the sustainability of its respective debt, following the provisions of the Law 358 of 1997. For this reason, within the framework of Financial Planning of Territorial Entities, it is necessary to guarantee the provisions established in the laws of responsibility, transparency, and fiscal sustainability; therefore, based on the estimates of macroeconomic variables, prospects for collection of income, coverage of operating expenses and public debt, and investment generation; That is, based on the information contained in the Financial Plan, the calculation of said indicators is carried out for a time horizon of 10 years.

The coverage of the district's pension liabilities is projected with a compliance criterion following the provisions of Law 549 of 1999, where the coverage of the pension liabilities must be 100% by 2029. Following the methodology proposed below, the estimate of the Law as mentioned above Indicators contained in the Medium Term Fiscal Framework 2022-2031 for 2022 is presented, versus what was caused for that year (Table 2).

Table 2: The Medium Term Fiscal Framework 2022-2031 for the period 2022

Concept	Indicator	Limit	2022Initial Budget	2022 Executed
Payment capacity	Solvency, Law 358 of 1997 ((Interest + Contingent Liabilities + Accounts Payable) /Operational Savings) *100%	<= 60%	11.8%	8.1%
	Sustainability (Law 358 of 1997) (Debt Balance / Income calculation base - Future Validities) *100%	<= 100%	92.3%	82.3%
Primary Surplus	Sustainability Law 819 of 2003 (Primary Surplus/Debt Interest Target) *100%	>= 100%	100.2%	529.4%
Functioning	Sustainability Law 617 of 2000 (Central Level Operating Expenses/Current Free Destination Income) *100%	<= 50%	43.0%	37.6%

Fountain: 2022, Mayor’s Office of Medellín, MFMP 2022-2031. 2023, Fiscal Planning and Analysis Unit, Closing of Indicators 2022.

For the Payment Capacity and Operation Indicators, the estimate of the Indicators was higher than the actual closing. For the Indicators of Law 358 of 1997, this is due, on the one hand, to the fact that the projection of interest and balance is greatly overestimated due to the use of stressed macroeconomic variables, as previously explained in the Public Debt Expenses section, On the other hand, the concept of estimated income only includes those included in the Financial Plan, which, as mentioned in the previous section, are only the concepts of accurate collection and not the totality executed; reasons why the estimated indicators are higher than the executed ones.

The same arguments apply to the Indicator of Law 819 of 2003, except that due to its calculation method, it has a lower limit of 100% and, therefore, is underestimated. Finally, the Operating Sustainability Indicator of Law 617 of 2000 was estimated higher than what was executed due to two factors: on the one hand, as already explained in detail in the previous section, Operating Expenses tend to be overestimated given the requirement to appropriate 100% of the cost of the charging plant capacity, and to the deviations between the estimated and caused CPI, mainly; On the other hand, ICLD’s projection turns out to be lower than the one executed, as seen in the income section.

7. Conclusions

In conclusion, the medium-term fiscal framework as a predictive tool to measure the municipality’s income works well since, with the trend variables, it is possible to measure almost exactly and efficiently the resources the municipality will receive on which it can count. To make the proper executions and investments in public spending, on the other hand the variations obtained in the MFMP that were presented in the total tax revenues have a lot to do with the recovery of taxes pending payment from previous periods, because it has a significant value, that is why within the projection the increase in the tax item is visible, it is worth highlighting that external factors such as the economic growth of the municipality, and the actions taken long before the end of the year for the recovery of the respective taxes, affected the resource in a positive way, the projection also works to control the different expenses that the mayor’s office has had, because they are only limited to executing what was initially projected, on the other hand it could be said that the actions carried out for the collection of direct taxes was not good enough because in the projection they have a negative variation of 1.7% with a value of -14,929 million, this variation can be presented by the non-payment of some taxes, or in the portfolio recovery treatment they set aside the current portfolio to focus on the recovery of the older portfolio.

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2. Article 346 The Government will formulate the income budget and appropriations law annually, which will be presented to Congress within the first ten days of each legislature.
3. Article 352, referring to the Organic Law of the Budget, will regulate what corresponds to the programming, approval, modification, and execution of the Nation’s budgets, territorial entities, and decentralized entities of any administrative level and their coordination with the National Plan developmental.
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