



Federal public spending compromised for 2022 in Mexico

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Abstract

In Mexico, the public budget is one of the economic policies with the greatest impact on national economic development and the redistribution of national income. Non-programmable public spending is considered to be that which cannot be modified, since it is regulated by law, as is the case of the participations delivered to federal entities and municipalities; the financial cost of public debt, debts from previous years and support to bank debtors. The concept of compromised public budget is that which is considered as non-programmable expenditure plus the items of federal contributions and the resources destined to pensions, both contributory (IMSS, ISSSTE) and non-contributory (senior citizens). I affirm that these are compromised resources in view of the fact that they are established in some legal norm and are mandatory programs. In my perspective, the Cámara de Diputados –House of Representatives- has no major interference in redistribution of the concepts that I have considered as compromised public budget, which represented 52.8% of the total public expenditure exercised in 2019 and 51.6% in 2020, related to the GDP mean 12.67% and 13.41 respectively. The resources of the compromised public budget could only decrease by approving amendments to the current legislation. In this way, the deputies' redistribution capacity covers 48.4% of the total federal expenditure budget in 2021. The potential amount of tax evasion and avoidance is considered to represent 3% of our country's GDP in 2020.

Keywords: *Budget; Government Budget; Public Spending; Public Finances*

Introduction

The existence of public resources is always limited in any economic activity, especially for the implementation of public policies it is necessary to find adequate funding to carry out the economic, social and human development plans that are to be implemented. In order to generate tax revenues, it is necessary to determine the legal norms that support the rule of law. Contributions are considered the most important concept of revenue for the State and are obtained through tax collection from the taxpayer or taxpayer (individuals or legal entities).

The challenges facing the economic policy of these times are in three battlefields: 1) Maintaining macroeconomic stability; 2) Reducing informality; and 3) Combating poverty and inequality, but no

challenge is more important than accelerating economic growth and the lack of it is not the origin of all evils, but it has to do to a lesser or greater extent with a good part of them (Ros, 2019: 16).

In the first part of this paper I analyze the public budget, where I try to define the concepts of programmable and non-programmable spending, fiscal space and derive a concept that I have called compromised public budget, pointing out the legal ordinances in which these conceptual figures are inspired, as well as the aspect of fiscal transparency. I try to provide figures that give us a glimpse of the size and structure of federal public finances in Mexico.

In the second part, I analyze the public spending compromised at the federal level in Mexico and its main components. I deal with the following budget items in this order: 1) Federal participations and compartments transferred to the country's states and municipalities; 2) Contributory pensions, where I include the Instituto Mexicano del Seguro Social (IMSS) -Mexican Social Security Institute- and the Instituto de Seguridad y Servicios Sociales para los Trabajadores del Estado (ISSSTE) -Institute of Security and Social Services for State Workers- among the main ones, and I also address the issue of the universal minimum pension; 3) Aid or pension for the elderly, also known as non-contributory pensions; 4) Public debt service and support for bank debtors. I also discuss other items that are considered programmable spending, but that cannot be reduced or removed.

In the third part, I address aspects concerning tax offenses (tax avoidance and evasion) in Mexico, defining some terms and presenting some important figures that are known on the subject.

1. Conceptual Framework of the Federal Public Budget

Andrea Podestá (2020: 9), following Musgrave, Buchanan and Stiglitz, mentions that traditionally fiscal policy has been summarized in three functions that are interrelated: 1) Allocation of resources: to efficiently supply public goods, to allocate resources in a better way when there are market failures; 2) Income distribution: To modify the way in which goods are distributed, adjusting the distribution of wealth among individuals, geographic areas or sectors to achieve a fairer society; and 3) Stabilization of the economy: to seek to attenuate the variations of economic cycles and contribute to economic growth, employment and price stability.

The public budget has become a fundamental and essential tool of the country's economic policy, since it shapes the implementation of the government's priority projects, where it must fulfill the functions of income redistribution, promote the creation of jobs, combat poverty and contribute to the majority of the population reaching social security, among many other activities that will contribute to economic, social, sustainable and human development. In Mexico, the federal public budget for the year 2021 was made up of a little more than six billions pesos (figures with twelve zeros, in amounts that are handled in the United States of America would be trillions).

The budget is considered as the set of activities to be carried out to achieve a specific goal, always expressed in economic terms. Budgets are a necessary element for planning and for making projections in a quantifiable manner, which will help to evaluate the performance of administrative areas and may allow the establishment of a type of control.

Peláez Herreros (2021: 375) makes us see that Jaime Ros argued that the slow economic growth of the last decades was explained by these causes: 1) Low rate of investment in physical capital, which in turn was a product of the fall of public investment, especially in infrastructure; 2) Appreciation of the exchange rate, which is reducing the profitability of private investment in the manufacturing sector; 3) Reduction of investment incentives, caused by the dismantling of industrial policy and the contraction of bank credit for productive activities.

We have to put an end to the vicious circle that has occurred during the last decades in our country: those who are born poor, poor have to live and die. The intergenerational economic and social mobility that is registered in the country is very low, in this regard Vélez (208; cited by Ros, 2019: 17) points out that in Mexico 70% of those who were born in the poorest quintiles of population, stay there.

An interesting concept that has been discussed recently is fiscal space, which can be seen from three approaches: 1) From a fiscal sustainability perspective; 2) Referred to the level of indebtedness and payment capacity of contracted debt; and 3) Focused on directing resources to public policy objectives for development. Another complementary way of dealing with fiscal space is provided by Villarreal & Villa (2021: 31), who state that:

...fiscal space is defined as the financial resources that are not compromised in the annual budget and that can be used to exercise public policy of conjuncture or of new creation, as well as projects that contribute to the development of countries.

The International Monetary Fund (2016; cited by Pérez & Villareal, 2018: 28): "...defines fiscal space as a multidimensional concept that allows estimating the capacity of a government to increase its spending or reduce its tax burden, without jeopardizing its access to capital markets and the sustainability of its debt".

The work of Jaime Ros (2008, 2013, 2013, 2015 and 2019, cited by Villarreal & Villa, 2021: 37) bases his analysis of fiscal space on the importance of capital factors, especially in education, health and infrastructure in less favored regions, to try to achieve economic growth.

The Pan American Health Organization (Cid et al, 2018: 2) in its area distinguishes these sources of fiscal space: a) Economic growth and creation of enabling macroeconomic conditions; b) Increased priority for health; c) Creation of new tax revenues and increased tax pressure; d) Foreign aid in loans and grants for the health sector; and e) Increased efficiency of existing health expenditures.

As we all know, in public budgets there are concepts that are unavoidable in the medium and long term, where such funds are marked by legal issues that have been approved in advance, making the fiscal space obtained by subtracting these unavoidable expenses from the total available resources. There are also other resources that have a population that benefits and depends on them and although these funds are modifiable, it requires political determination to submit them for review.

The differential between total public revenues, without considering indebtedness and unavoidable medium and long-term expenses, results in the fiscal space available for the current situation. In this regard and specifically, Villarreal & Villa (2021: 38) point out:

The unavoidable programs, which may change in the long term, are identified under the modalities of: Provision of public services, where all payments to the payroll of teachers and medical personnel are included; Pensions and Retirements; Federalized spending; Contributions to security; Natural disasters; Participations to federal entities and municipalities; Financial cost; Debt or support to debtors and bank savers; and Debts from previous fiscal years. Those programs that may be modified in the medium term are identified in the following program modalities: programs subject to operating rules; other subsidies; specific subsidies; provision of goods; functions of the Armed Forces; and obligations to comply with jurisdictional resolutions. The rest of the modalities not mentioned refer to programs that can potentially be modified in the short term, and therefore, be part of the available fiscal space.

The economic context generated by the COVID-19 pandemic adds to the difficult situation that the country had before 2020, we must take into account that a reduction in tax revenues is foreseen, if the

long awaited fiscal reform in the country does not take place. Thus, we see that the low economic growth of recent years will cause a loss of fiscal space and less availability of financing (Podestá, 2019: 47).

The International Monetary Fund (2016; cited by Pérez & Villareal, 2018: 38) has raised a series of valuable considerations, which are to serve to strengthen the state of public finances: 1) Analyze the initial macroeconomic and public finance conditions; 2) Stress test these conditions and consider their implications on fiscal sustainability; 3) Model the macroeconomic and fiscal effects of policies, comparing them against initial conditions; and 4) Strengthen the judgment of decision makers, based on the previous stages.

In one of the classifications of the public budget, it is divided into programmable and non-programmable budgets, depending on the financing of government operations and whether the expenditure is intended to comply with obligations that cannot be avoided. The programmable budget is the one that finances the operation of the public sector for any of the following activities: 1) Providing goods and services to the population; 2) The one destined to social programs; and 3) All that which is carried out for the operation of governmental institutions and the fulfillment of their attributions.

The non-programmable budget is that which is destined for the fulfillment of obligations and support determined by law and which does not contribute to the financing of operations carried out by the federal government. These obligations of the federal government are: 1) Federal participations (Line 28); 2) Financial cost of the debt (Line 24); 3) Debts from previous fiscal years and support for savers and bank debtors (Line 30 and 34).

According to the National Council for Accounting Harmonization (2019; cited by Sanchez, 2019: 10) the accounting moments of expenditure are six: a) Estimated; b) Modified; c) Compromised; d) Accrued; 5) Exercised; and 6) Paid. In this case, it is important to highlight the concept of compromised expenditure: "Compromised expenditure is when the administrative act, or other legal instrument is formalized in a legal relationship with third parties for the acquisition of goods and services or execution of works".

Derived from this definition, I can say that for the purposes of this work, compromised budgetary expenditure will be understood as that expenditure that is formalized or established in a law or legal norm and for which there is a commitment that cannot be left unfulfilled.

Joining the concepts of fiscal space with that of compromised budget, I can say that fiscal space is what results from differentiating the compromised budget, which in the end is what could be redistributed with some freedom among sectors or beneficiaries to be favored in budgetary matters, in accordance with the public policies that are applied.

Thus, federal contributions and the budget items corresponding to pensions should be considered as non-programmable expenses, since the federal government has to transfer these resources according to the laws that so determine. In this sense, the organization México Evalúa (2019) states something similar to what I express about pensions: "The expenditure made by the government on pensions and retirement is a spending obligation, so we believe that it should be included in non-programmable spending".

For Moreno, Pérez & Villareal (2017: 68) any long-term public spending strategy entails complex decisions on how to distribute public funds among the three key components: education, social security (pension and public health system) and public infrastructure, presenting a dilemma of the most appropriate financing, through taxes or public debt. In this regard, the authors note:

The allocation of public money has profound effects on the redistribution and welfare of specific population groups and cohorts. In very simple terms, it can be argued that education is generally

directed to the young, social security to the elderly, and infrastructure to promote economic growth.

For Jaime Ros (2019: 18) the only ways to free resources for new public programs are: 1) Restructuring of public spending; 2) New resources that would be generated by economic growth. The restructuring of spending is clearly insufficient to address the national priorities of infrastructure spending and the reform of the health and pension systems, to mention just two of the biggest challenges.

On the question of whether the budget should be allocated to promote economic growth or to generate an improvement in the social sphere of citizenship, Ros (2019: 20) makes this assertion:

...if due to fiscal constraints one has to choose in the short term between an investor state (promoting growth) or having a social state (with a developed welfare system), the emphasis in the short term should be placed on the investor state rather than on the creation of new social programs (even if there is much to be rearranged and rationalized in the area of social spending). That is why, with the little that can be raised in tax collection and the use of debt, the priority should be to invest those resources to trigger growth. Once growth is underway, it would tend to generate the necessary public resources to build a social state worthy of the name.

An extremely important point in the application of the public budget in any sphere of government should be budgetary transparency, the purpose of which is to ensure that public finance information reaches the majority of the population in a clear, timely and useful manner; to achieve this objective, there must be sound standards and practices in the various stages of the budget, which would result in the correct management of financial information on public revenues and expenditures (Castillo & Tamez, 2020: 843).

Speaking of budget transparency, section VI of Article 74 of the Political Constitution of the United Mexican States stipulates that the Chamber of Deputies is responsible for reviewing the public account, through the Auditoría Superior de la Federación (ASF) -Federal Superior Audit Office-. In addition, Article 79 of the Constitution states that the ASF will have technical and managerial autonomy in the exercise of its attributions, where the auditing function will be exercised in accordance with the principles of legality, definitively, impartiality and reliability.

The General Law of Governmental Accounting came into force in the country in 2009, giving a deadline until 2014 for the federal entities to harmonize their public accounting systems; however, to date, according to the National Council for Accounting Harmonization (Dávila, 2020: 1894), at the national level there is an average compliance of 71.98% of updating in their accounting systems.

Article 70 of the General Law of Governmental Accounting states that the Federal Superior Audit Office will verify that all public resources received by federal entities, municipalities and municipalities are exercised in accordance with the applicable provisions. The Instituto Mexicano para la Competitividad (IMCO) -Mexican Institute for Competitiveness- (quoted by Dávila, 2020: 1895) determined that none of the 32 federal entities of the country comply with the provisions of the General Law of Governmental Accounting and do not publish their accounting information in accordance with current regulations, in addition to the fact that the federal entities use these resources in non-priority activities and the execution of spending is discretionary, due to poor planning.

It is important to be clear that nothing can be spent if it is not included in the annual federal expenditure budget, as established in Article 126 of the Constitution: "No payment may be made that is not included in the Budget or determined by a subsequent law".

Castillo Guerrero et al (2020b: 213) remind us that the Ministry of Finance and Public Credit (SHCP), within the framework of the Open Government Partnership, defined the commitment to build

interactive platforms easily accessible to citizens, in order to inform the population about the destination of federal resources and improve budget transparency.

Despite these tools and the application of the Federal Budget and Fiscal Responsibility Law, it has been detected that Mexican society has shown a lack of interest in knowing the budget and public account information, since in recent times there have been platforms for public consultation of information, but few citizens have access to this information (Castillo et al, 2020b. 193).

In the aspect of governmental accounting, the Chamber of Deputies has designated the National Council for Accounting Harmonization, as in charge of monitoring compliance with accounting concordance at the national level, through quarterly evaluations that will be carried out in the national platform called System of Accounting Harmonization Evaluations, such evaluations are integrated by these sections: A) Accounting records; B) Budgetary records; C) Administrative records; and D) Transparency.

1.1 National Public Finances

Regarding the public account, Sánchez et al (2019: 6) point out that the entities obliged to answer the evaluations on the subject were 5,829 in 2018, being these:

- Legislative, judicial and state autonomous bodies: 298.
- Parastatal entities: 1519.
- Major municipalities: 2028.
- Larger municipal entities: 1302.
- Minor municipalities: 420.
- Minor paramedical entities: 230.

According to the National Council for Accounting Harmonization (2019; cited by Sánchez et al, 2019: 7) the results of the last evaluation carried out on transparency indicate that only 67.74% of the entities obliged to practice it complied with it in 2019, while in the public account barely 49.61% of the audited entities comply with this obligation.

Taking into account the 2019 Public Account, our country had federal public revenues in 2019 for 5.38 billion pesos, representing 22.2% of the Gross Domestic Product (GDP) in that year, of which 3.57 billion pesos came from ordinary non-oil revenues (includes taxes, duties and benefits), representing 66.4% of total public revenues and 14.75% of the GDP. If we add the contributions collected by the Mexican Social Security Institute (IMSS) and the Institute of Security and Social Services for State Workers (ISSSTE), which amounted to 426.6 thousand million pesos, total tax revenues or contributions from taxes and social security contributions would reach 4 trillion pesos in 2019, representing 74.4% of national public revenues and 16.53% of GDP.

Table 1. Federal Public Revenues 2019-2020. Millions of Pesos

Program or Sector	Collected 2019	% GDP	Collected 2020	% GDP
Total Public Revenues	5,384,984.3	100.0%	5,333,535.6	100.0%
Ordinary Revenues	4,000,760.6	74.3%	4,330,181.5	81.2%
Non-oil Revenues	3,574,157.4	66.4%	3,890,194.5	72.9%
Contributions IMSS-ISSSTE	426,603.2	7.9%	439,987.0	8.2%
Petroleum Fund (FMP)	431,922.8	8.0%	198,306.4	3.7%
PEMEX-CFE Revenues	952,300.9	17.7%	805,047.7	15.1%

Source: Own elaboration. With information SHCP: Cuenta Pública 2020. Tomo I Ingresos Presupuestarios. Ingresos Ordinarios del Sector Público Presupuestario 2019-2020. Pag.16 y 19

In 2020 our country had public revenues of 5.33 billion pesos, meaning 23.1% of GDP, of which 3.89 billion pesos are ordinary non-oil revenues, representing 72.9% of total public revenues and 16.82% of GDP for 2020, social security contributions (IMSS-ISSSTE) were 440 billion pesos, with the item of federal contributions would reach 4.33 trillion pesos, meaning 81.2% of national public revenues and 18.73% of GDP for 2020.

Ordinary revenues of the federal government (taxes, duties, benefits and social security contributions) had an annual growth in 2020 of 8.2% in nominal or current terms, discounting the annual inflation of 3.2%, we can see a real growth of close to 5% in ordinary revenues of the federal government in 2020, despite the COVID-19 pandemic. As for GDP, we see a 2.22 percentage point increase in its ratio in 2020, mainly determined by the 8.5% drop in GDP with respect to the previous year.

The Organization for Economic Cooperation and Development (OECD, 2017: 151) in Table 4.1, presents us with excellent information on total tax revenues as a percentage of GDP from 1990 to 2015 for the 24 nations of Latin America and the Caribbean (LAC), from here I take this data for 2000 and 2010:

- ❖ For 2000 the average of this indicator was 34% for OECD countries, while for LAC it was 18%. For Mexico it represented 13.6%, Argentina 19.8%, Brazil 29.6%, Chile 18.8%, Colombia 14.6%, Perú 14.7% and Ecuador 10.3%.
- ❖ For 2010, the average for this indicator was 32.6% for OECD countries and 20.8% for LAC. For Mexico it was 14.1%, Argentina 29.1%, Brazil 32.3%, Chile 19.7%, Colombia 18%, Perú 17.9% and Ecuador 16.6%.
- ❖ Mexico presents this indicator at 12.4% in 1990; 11.4% in 1995; 12.6% in 2005; 13.6% and 17.4% in 2015.

It should be noted that sometimes two indicators can be compared and care should be taken to separate them well: 1) Tax revenues refer to revenues that for their collection the State exercises coercive power and come from a legal-fiscal relationship, as is the case of taxes and duties or fees; 2) Revenues from fiscal pressure are the revenues obtained by the State for its acts of public authority, which are compared to GDP. What separates tax revenues from the so-called fiscal pressure are the social security contributions included in the latter.

With information from Expansión/Datosmacro (2019) in what they call fiscal pressure for 2019 we have these indicators of some countries in relation to GDP: Spain 35.2%, Germany 41.5%, United Kingdom 35.2%, France 47.2%, United States 26%, Canada 30.8%, Bolivia 24.7%, Colombia 19.7%, Costa Rica 23.6%, Nicaragua 25.9%, Peru 16.6%, Argentina 28.6%, Brazil 33.1%, Chile 20.7% and Mexico 16.5%.

The following comments can be drawn from the information presented:

- In Mexico for 1990 we observe a poverty of fiscal resources captured by the State from total contributions (taxes, duties and social security quotas) representing barely two-fifths of what the OECD collected on average, i.e. for every dollar captured by OECD countries in Mexico only 40 cents were captured in respective proportion. This is 20.4 percentage points less of GDP than OECD nations.
- Compared to the average of Latin American and Caribbean (LAC) countries in 1990, Mexico collected three quarters of the total contributions of the region's nations, 4.6 percentage points below them. Brazil was more than twice what Mexico collected in relation to GDP, while Argentina, Chile, Colombia and Peru were above Mexico, and only Ecuador was far below Mexico in this indicator.
- For 2010 there are similar cases: Mexico is below the average of OECD countries by 18.5 percentage points of GDP and 6.7 percentage points of GDP in comparison with Latin American

countries. The slight improvement is that it dropped 1.9 percentage points from the OECD average, but increased 2.1 percentage points of its indicator with countries in the region.

- Of the Latin American nations, Brazil and Argentina are a little more than double what Mexico collects in relation to GDP for 2010, again Chile, Colombia and Peru are above our country, but now with more percentage points. Ecuador also went from 10.3% to 16.6% in ten years, surpassing Mexico.
- The calculation I made based on information from the 2019 National Public Account is exactly the same as the one provided by the Expansión/datosmacro.com portal for Mexico.
- For 2019 Mexico is half of that ratio (total contributions/GDP) compared to Spain, Germany and France and not only that, of the Latin American countries listed it is below Brazil (which has exactly twice as much as Mexico), Colombia, Costa Rica, Nicaragua, Argentina, Brazil and Chile, only tied in last place with Peru in the aforementioned ratio.
- After thirty years (due to the conditions of the COVID-19 contingency, I did not take into account the year 2020, although there is already information because it is not comparable), Mexico was only able to go from capturing 13.6% to 16.5% of total contributions in relation to GDP, observing only 2.9 percentage points more in this ratio. This is a very poor progress in comparison with Latin American countries, let alone OECD countries.
- Due to these figures, it is essential to carry out an in-depth fiscal reform in the country, otherwise national public finances will continue to be under great pressure.

Regarding federal spending, in an attempt to apply the zero-based budget in 2016, an engineering of the spending process was carried out based on four pillars; 1) Eliminate programmatic redundancies, by identifying similar programs and objectives, 2) Optimization of personal services spending; 3) Optimization of operating spending; and 4) Optimization of public investment. Among the main challenges and lessons learned about the design and implementation of the budget reengineering process in Mexico, Duran et al (2018. 4-5) found:

The scope of a reengineering process is bounded by the current regulatory framework. Initiatives with the greatest impact in terms of expenditure containment usually require structural reforms in order to be properly implemented. Thus, a comprehensive budget reengineering must be considered first and foremost a legal process, in which various public sector laws and regulations must be reformed.

In addition to the previous point, Duran et al (2018: 5) found these problematic issues for the implementation of zero-based budgeting at the federal level:

1. Information requirements in the budget reengineering process are demanding: in addition to the expenditure exercised, it is required to have detailed information on the performance of public programs and evaluations of budgetary programs.
2. Necessary involvement of high-level officials of the executive branch.
3. A relevant part of public spending is carried out by entities with a high degree of autonomy in budget management, where a system of incentives and penalties is required to avoid misuse of budgets.
4. The optimization of spending on personal services has one of the highest degrees of complexity within a budget reengineering process.
5. Budget reengineering has to be assumed as a gradual and continuous process.
6. A central part of the reengineering process is budget transparency.

In terms of federal public spending in Mexico, 5.8 billion pesos will be spent in 2019 and 6 billion pesos in 2020, representing 24% and 26% of GDP respectively. The so-called programmable central sector spending accounted for 75.2% in 2019 and 75.9% in 2020 of federal public spending, by difference 24.8% and 24.1% correspond to the so-called non-programmable spending: federal

participations, debt, Adeudos de Ejercicios Fiscales Anteriores (ADEFAS) –Debts from Previous Fiscal Years- and Instituto para la Protección al Ahorro Bancario (IPAB) –Bank Savings Protection Institute-.

The formerly called parastatal sector (directly controlled agencies and productive enterprises): IMSS, ISSSTE, Petróleos Mexicanos (PEMEX) and Comisión Federal de Electricidad (CFE) are located here; they absorbed 21.7% and 21.5% in 2019 and 2020.

Table 2. Federal Público Expenditures 2019-2020. Millions of pesos

Unit o Sector	Executed 2019	% GDP	Executed 2020	% GDP
Total Public Sector	5,814,441.6	100.0%	6,007,719.3	100.0%
1 Expenditure Program.Federal Govern.	4,371,644.5	75.2%	4,561,875.5	75.9%
1.1 Expenditure Program.Central Sector	3,110,431.5	53.5%	3,271,259.2	54.5%
1.1.1 Legislative Power	13,349.0	0.2%	13,757.2	0.2%
1.1.2 Judicial Power	63,755.1	1.1%	66,428.8	1.1%
1.1.3 Autonomous:Prosecutor's and others	49,203.2	0.8%	53,913.4	0.9%
1.1.4 Executive Power	2,984,124.2	51.3%	3,137,159.8	52.2%
1.1.4.1 Administrative Branches	1,294,426.7	22.3%	1,340,905.7	22.3%
1.1.4.1.1 Public Education	332,304.8	5.7%	343,499.3	5.7%
1.1.4.1.2 Welfare	147,257.7	2.5%	179,371.5	3.0%
1.1.4.1.3 Other Office Secretariats	1,210,135.0	20.8%	1,273,383.3	21.2%
1.1.4.2 General Branches	1,689,697.5	29.1%	1,796,254.1	29.9%
1.1.4.2.1 Social Security compartments	795,030.2	13.7%	855,713.6	14.2%
1.1.4.2.2 Wage and salary provisions	114,806.9	2.0%	131,438.3	2.2%
1.1.4.2.3 Basic education compartments	37,203.2	0.6%	39,945.4	0.7%
1.1.4.2.4 Federal compartments (State-muni)	742,657.1	12.8%	769,156.8	12.8%
1.2 Programmable spending: parastatal sector	1,261,213.0	21.7%	1,290,616.3	21.5%
2 Non-programmable spending:Central G.	1,442,797.1	24.8%	1,445,843.8	24.1%
2.1 State-Municipal Participations	879,344.3	15.1%	843,545.4	14.0%
2.2 Public debt service	500,880.5	8.6%	544,700.7	9.1%
2.3 ADEFAS (Adeudos Ejerc.Fisc. Ante.)	11,232.4	0.2%	14,267.7	0.2%
2.4 Support to banks	51,339.9	0.9%	43,330.0	0.7%

Source: Own elaboration. With information from SHCP: Cuenta Pública. Tomo II Gastos Presupuestarios, Páginas 9,10,11 y Estado Analítico del Ejercicio del Presupuesto de Egresos en Clasificación Funcional Administrativa

The so-called central sector of the federal government absorbed 53.5% and 54.5% of total federal public spending in 2019 and 2020 respectively. Of this amount, it was divided among branches, administrative and general branches as follows:

- Legislative Power: 0.2% in 2019 and 2020.
- Judicial Power: 1.1% in 2019 and 2020.
- Eight autonomous bodies: 0.8% in 2019 and 0.9% in 2020.
- Executive Power: 51.3% in 2019 and 52.2% in 2020. Of which the Administrative Branches (Office Secretariats) absorbed 22.3% in 2019 and 2020. The General Branches (federal contributions, social security and salary and economic provisions) took 29.1% in 2019 and 29.9% in 2020.

As a comparative point of expenditure with respect to several Latin American countries, ready the public expenditure in relation to the GDP of each country in 2018 (Podestá, 2019: 30): 48.3% in Argentina; 42.2% in Brazil; 30.5% in Colombia; 31% in Costa Rica; 27% in Panama; 20.1% in Paraguay and 21.8% in Peru. Recalling that in Mexico federal public spending represented 24% of GDP in 2019.

2. Compromised Federal Public Spending

I will now go on to analyze each of the items that are considered as federal compromised spending, give some elementary concepts and provide recent quantitative information, based on the data provided by the Public Account at the federal level for 2019 and 2020.

Subnational governments in Mexico (States, Mexico City and municipalities) are going through a complicated moment, based on the dependence they present on federal transfers in their total revenues, where additionally the own revenues they actually obtain are marginal, with the aggravating factor that in several cases the indebtedness was acquired irresponsibly and without taking into account contingent liabilities, such as pensions, which will surely tend to suffocate public finances in the near future (Pérez & Villarreal, 2018: 19-20).

2.1 Federal Participations and Compartments

The Ley de Coordinación Fiscal (LCF) -Fiscal Coordination Law- is the legal norm on which the distribution of federal public funds among the three spheres of government (federation, states and municipalities) is based. The LCF is made up of five chapters and 52 articles. Chapter I deals with the federal participations that local governments will receive, while Chapter V deals with the federal contribution funds that will be delivered to local governments (states and municipalities).

In the last chapter of this work I will address the complete analysis of the item of federal participations and compartments, in its conceptual and normative optics, for now I just want to make some statements that concern what I want to remark about the public budget.

Federal participations in 2019 were in the amount of 879,344.3 million pesos, representing 15.1% of total federal public sector expenditures and 3.63% of the national GDP; for 2020, 843,545.4 million pesos were granted for federal participations, meaning 14% of total federal expenditures and 3.65% of the national GDP.

Adding federal participations and compartments, the central government delivered 1'622,001 million pesos (1.62 billion pesos) in 2019, 27.9% of total expenditures; while in 2020 it delivered 1'612,702 million pesos (1.61 billion pesos), 26.8% of total federal expenditures.

Based on information from the Instituto Nacional de Estadística, Geografía e Informática (INEGI) -National Institute of Statistics, Geography and Informatics- 'State and Municipal Public Finances 2018-2019':

- ❖ The 31 federal entities in 2018 obtained from federal participations 34.7% and from federal compartments 45.8%, with which the sum of federal resources received by the federal entities is equivalent to 80.5% of their total public revenues. State revenues accounted for 9.6% of total state revenues.
- ❖ In 2019, the total public revenues of the 31 federative entities were 2'144,130 million pesos (2.14 billion pesos), of which 786,691 million pesos were obtained from federal participations and 986,275 million pesos from federal contributions, adding both concepts 1'772,966 million pesos (1.77 billion pesos), where federal participations represent 36.7% and compartments 46% of the total public revenues of the federative entities, thus the total federal resources received by the 31 federative entities was 82.5% in 2019.
- ❖ In 2019, the total own revenues (taxes, duties, social security fees, products and benefits) of the 31 federal entities were 225,112 million pesos, which corresponds to 10.5% of the state public revenues.

Contrary to the 31 federal entities in the nation, Mexico City only obtains 52.3% of its total public revenues from federal participations and compartments in 2018 and 53.3% in 2019. With this data

we appreciate that for Mexico City, the problem of submission of federal resources is less critical than for the rest of the federal entities of the country.

The federal entities most dependent on the federal resources (participations and compartments) they received in 2019, in relation to their total public revenues are: Chiapas with 95.5% of the total; Michoacán 94.4%; Tlaxcala 94%; Guerrero 93.6%; Morelos 92.6% and Hidalgo 91.5%. After Mexico City, the entities least dependent on federal resources are: Chihuahua 67%; State of Mexico 68.5%; Sonora 68.6%; Quintana Roo 73%; and Nuevo León 74.6%.

It is worrying that in the span of less than a decade, the share of federal resources (participations and compartments) has gone from 77.6% in 2010 to 82.5% in 2019, in relation to total state revenues. With these five percentage points of federal participations and compartments in excess of the total state public revenues, one can begin to think that the state governments are falling into what has been called 'fiscal laziness', a subject that we will discuss in later chapters.

Federal compartments are resources allocated to the states and municipalities to compensate for territorial or regional poverty, and are granted for: the fight against poverty; the strengthening of basic and normal education; the adequate provision of health and public safety services; social assistance coverage; and the strengthening of local public finances. The contributions are known as Line 33 in budgetary matters.

Federal contributions have a duality: 1) They are considered as income of the states and municipalities, but the latter do not determine the amount or what they are to be used for; and 2) The federal government does not exercise the expenditure directly with the payment of payroll, suppliers or services generated by these programs, but rather this must be paid by the local governments.

The resources of the Line 33 are labeled and cannot be used for any other purpose than the one for which they are intended; there is an obligation to allocate the resources to meet their stated objectives, in accordance with the provisions of Article 25 of the Fiscal Coordination Law. The federal contribution funds are regulated by articles 25 to 52 of the Fiscal Coordination Law. The Line 33 consists of the following eight funds:

1. Compartments Fund for Education Payroll and Operating Expenses (FONE).
2. Compartments Fund for Technological and Adult Education (FAETA).
3. Health Services Compartments Fund (FASSA).
4. Compartments Fund for Public Security (FASP).
5. Compartments Fund for Social Infrastructure (FAIS).
6. Compartments Fund for the Strengthening of Municipalities and Territorial Districts of Mexico City (FORTAMUNDF).
7. Multiple Compartments Fund (FAM).
8. Compartments Fund for the Strengthening of Federal Entities (FAFEF).

Funds 5 to 8 (FAIS, FORTAMUNDF, FAM and FAFEF) are the funds that the States and municipalities consider within their local budget, to allocate them to public works, infrastructure or the destination expressly indicated by the funds. These four funds truly correspond to fiscal federalism, where the decentralization of the exercise of spending is sought, but these funds must be perfectly controlled, evaluated and audited by the Federal Superior Audit Office (ASF) and by autonomous bodies such as National Council for the Evaluation of Social Development Policy (CONEVAL). Without this transparency and auditing requirement, the fiscal system in our country would not be understood.

Federal compartments for entities and municipalities were 742,657.2 million pesos in 2019, 12.8% of total federal expenditures and 3.06% of GDP, while for 2020 they were 769,156.8 million pesos, the same 12.8% of total federal expenditures and 3.33% of GDP.

In the opinion of Pérez and Villareal (2018: 22-23), the establishment of clearer objectives and components in the distribution of compartments, given by legally constituted distribution formulas, have resulted in the generous growth of contributions during the last twenty years, becoming a pillar of the Mexican fiscal system.

2.2 Contributory Pension System

It has been stated with much certainty that social security is the axis of social and economic policy today. In the economies of developed countries, pensions have played a fundamental role in increasing the welfare of the elderly. Pension schemes in Mexico present actuarially very high benefits with respect to contributions, Moreno et al (2017: 70) point out in this regard:

In the case of Mexico, it is very acute because pensions financed by contributions tend to be reality only in the formal labor market, in addition to the fact that they are highly correlated with higher income groups, so the fact that the government allocates public resources to this type of pensions tends to be regressive.

On the other hand, the minimum guaranteed pension is the one that the federal government must ensure to Mexican Social Security Institute (IMSS) pensioners, which must represent at least one general minimum wage of our nation. Article 170 of the Ley del Seguro Social (LSS) -Social Security Law- states that the guaranteed pension will be the equivalent of one minimum wage. Article 172 of the LSS stipulates that the Federal Government will cover the difference of the minimum guaranteed pension, in case the resources of the individual account of the insured are not enough to cover it.

The problems immersed in the universal minimum pension are the following: 1) Incentivize lower-income workers to participate in formal markets; 2) Involve considerable fiscal resources, which do not have a source of income; 3) Life expectancy has increased in Mexico, so any proposal for a universal minimum pension should include projections and proposals on public financing schemes (Moreno et al, 2017: 70).

The Mexican Institute of Public Accountants makes it clear that the guaranteed minimum pension will mean one more pressure on the country's public finances, indicating that according to information from the Superior Audit Office of the Federation, the federal government will have to allocate six trillion pesos in the period from 2022 to 2060, to complete the resources of pensioners, whose highest annual payment will be reached in 2042 with 223,919 million pesos, representing 1% of the current GDP.

Rodolfo de la Torre (quoted by Albarrán, 2021), of the Espinoza Yglesias Study Center, criticizes the increase in the universal pension announced by President López Obrador "as this will imply that fewer resources will be allocated to other areas such as education and health". Between these two sectors (pensions and education-health) so in need of public resources, there is no easy decision as to which of the two should receive the budgetary funds, and on the one hand there are those who worked with their best efforts in previous years (pensions) and those who are training for a better future (education).

As for the pensions that correspond to workers of the ISSSTE, ISSFAM, PEMEX, CFE, the Judicial Power, development banks and federal public universities, there is no doubt that it is the federal government's responsibility to cover the full amount of the pensions of its direct workers.

Within the Federal Expenditure Budget, the programs that I identify with the pension item or sector are the following:

- J006: Support for ISSSTE pension payroll deficit. In 2019, 225,982.2 million pesos were disbursed and 241,330.5 million pesos in 2020. Representing 3.9% and 4.0% respectively of total federal spending.

- J008: Pensions and Retirements in Course of Payment. 316,422.8 million pesos were spent in 2019 and 354,849.9% in 2020, representing 5.4% and 5.9% of total federal spending.
- The remaining pension expenses are mainly the following budget items: J009: Civilian Military and Grace Pensions; J011: Statutory Contributions to Retirement, Severance, Advanced Age and Old Age Insurance; J012: Social Contribution to Retirement, Severance, Advanced Age and Old Age Insurance; J021: IMSS Minimum Guaranteed Pension; J025: Provisions for pensions of Luz y Fuerza.

All pension items disbursed in 2019 are of the order of 641,960.2 million pesos in 2019, while in 2020 they correspond to 650,920.6 million pesos, representing 11.0% and 10.8% of total federal spending, respectively.

In other interesting data, the OECD (2019) points out that in 2015 public spending on pensions was only 2.3% of GDP in Mexico, compared against more than 16% of GDP in Italy and Greece (although we must remember the serious problem in which this nation was involved). The OECD points out that Mexico is a relatively young country and that Italian retirees are much more likely to receive a pension than Mexicans, where less than half of the elderly receive a contributory pension.

Another significant fact that marks the OECD (2019), is that the Netherlands has a population structure similar to that of Italy, where almost all Dutch retirees receive a pension, however in the Netherlands depend more on private pensions, which represent 5.8% of GDP, compared to 1.3% of GDP that Italy presents in private pensions, configuring a difference between the two countries that stands at 10.8 percentage points of GDP.

As a point of location, Mexico presented a public pension expenditure of 2.65% of GDP in 2019 and 2.82% in 2020. Noting that in five years, from 2015 to 2020, it grew by 0.5 percentage points in the ratio of public spending on pensions to GDP. Vargas Mendoza (2019; 65) makes a very thoughtful comment about the magnitude of pensions in Mexico:

It is very important to specify that the total pension payment obligations of the three orders of government in Mexico are equivalent to 1.4 times the country's gross domestic product, based on calculations made by the actuarial consulting firm Valuaciones Actuariales del Norte (cited by Albarrán, 2018), while the Auditoría Superior de la Federación (2015), posited that by 2013 these liabilities represented 17 billion 512 thousand 444. 4 million pesos, being the GDP for that year 13 trillion pesos 282 thousand 61 million pesos, i.e. they represented 131.9 percent of the GDP. For this reason, they constitute the most serious financial problem of the Mexican government's spending policy.

Another important fact about pensions in Mexico, according to financial analyst López Macari (El Economista, 2020), in twenty years (2000 to 2020) the associated cost of pensions grew from 1% to 3% of the GDP, which tripled this indicator and the pressure will not diminish, especially in the case of pensions for state workers, universities and states of the Republic, adding with respect to pensions:

...they will be a problem of poverty in adulthood, at the age when you are less productive, because the body already allows it and at the age when you are less updated, because you are already overtaken by the technological wave and at the age when you are more dependent, you need medical and personal care services...This is the problem of pensions and retirements, since governments in many parts of the world have had to face this problem and the great associated cost is a political cost.

2.3 Aid or Pension for the Older Adults

The fifteenth paragraph of Article 4 of the Political Constitution of the United Mexican States establishes that persons over sixty-eight years of age have the right to receive a non-contributory pension

from the State under the terms established by law. In addition, for indigenous and Afro-Mexican people, this benefit is granted from the age of sixty-five.

Zero pillar or non-contributory pensions affect national public finances, CONEVAL (2020: 26) expresses its concern about the impact on public finances of non-contributory pensions:

Therefore, it is indispensable to generate labor conditions in which it is increasingly less necessary to depend on non-contributory pensions, through greater worker-employer contributions, or else, with the expansion of the formal labor market and social security coverage for the entire population, which implies designing regulations that achieve that more people count on a decent income plan in old age.

Most of the older adults are in a situation of poverty and without a social protection system that guarantees a full and dignified old age, according to data from the Welfare Secretariat of 2019: 40% of the population has access to a contributory pension, 23% to a non-contributory pension (older adults program) and 26% of the adults have no pension of any kind. To reinforce this part, I refer to Villalobos López (2021: 9):

Non-contributory pensions in Mexico had their antecedent in a local program of universal pensions, created by the Government of the Federal District in 2001 which was headed by López Obrador, through which the amount of 600 pesos per month was provided to people 70 years of age or older, with a minimum residence of three years in that then Federal District. Initially it covered 250 thousand people and by 2010, the beneficiaries increased to 480 thousand and the age requirement was lowered to 68 years of age. That experience in Mexico City overlapped at the national level in 2006, in charge of the Secretariat of Social Development (SEDESOL), whose beneficiaries were people over 70 years of age who did not have another public pension (Pérez and Camacho, 2018:104).

In March 2013, the age of people benefiting from this pension was lowered to 65 years old, having two requirements: not being a beneficiary of another pension and being a resident of Mexico, seeking as an objective to combat the poverty situation of older adults who did not have access to contributory social security. The payment of this pension is bimonthly.

By 2016, according to the National Household Income and Expenditure Survey (cited by Pérez and Camacho, 2018: 106), the population aged 65 years or older was about 9.6 million people, of which 30.7% had a contributory pension, 48.6% had a non-contributory pension and 26.2% had no pension at all. The sum of contributory and non-contributory pensions represented 7 million people, 73.8% of the total aged 65 and over in 2016. Of concern is the situation of 2.6 million people who did not have any type of pension and who were over 65 years old in 2016.

The current approved program consists of the delivery of a bimonthly economic support of \$3,100 pesos as of November 2021 and has been called 'pension for the welfare of older adults'.

Within the budget of the Welfare Secretariat is located the program S176: Pension for the Welfare of Older Adults, which exercised an amount of 113,068 and 127,627 million pesos respectively in 2019 and 2020, representing of the total federal budget 1.9% in 2019 and 2.1% in 2020.

As an additional fact, of the public budget exercised by the Welfare Secretariat, 76.8% corresponds to pensions for senior citizens in 2019 and 71.2% in 2020. With which we see that the Welfare Secretariat occupies three quarters of its budget granting non-contributory pension transfers to the country's senior citizens.

2.4 Public Debt and Bank Rescue

Two other items that cannot be removed or modified from the expenditure budget are those related to public debt and the Instituto para la Protección al Ahorro Bancario (IPAB) -Bank Savings Protection Institute- program. Public debt is a natural resource that is used to the extent that public resources are not available to finance all the projects that need to be executed in the country. The servicing loans or borrowings is an obligation that the country must cover regardless of who is in charge of the administrative and political management of the country.

In 2019 the public debt service of the central sector of the federal government was 500,880.5 million pesos, while in 2020 it reached 544,700.7 million pesos, representing 8.6% and 9.1% of the total expenditure budget respectively, said debt service represented 2.07% of the GDP and 2.36 respectively in 2019 and 2020.

The financial services caused by what is called the parastatal sector, of which the most important debt is generated by the two largest public companies in the country: PEMEX and CFE, in 2019 the financial cost or debt service of these two agencies was 140,864.1 million pesos and in 2020 it was 120,492.2 million pesos, which were equivalent to 2.4% and 2% respectively of the total federal budget.

Another of the hindrances that we have been carrying since the last years of the 20th century, is the program of the Bank Savings Protection Institute (IPAB) or also known as FOBAPROA, where many of the companies whose debts were forgiven, abused this canonry and now we all Mexicans have to continue paying those debts.

Vargas Mendoza (2019; 64) shows that the budgetary and structural limitations of the expenditure that is destined to finance economic growth and social welfare programs, are limited by the large amount that will be destined to the financial cost of the internal and external debt, as well as the bank bailout that was assumed since December 1998, in the same way that they affect the financing of pensions and retirements in a very important way.

It was never said that Mexicans 23 years later would still be paying that debt, which was unconsciously approved by the legislators in office, as if they wanted to forget and bury that public debt, but every year it emerges in the federal public budget and even more so when the corresponding payment is made.

Unlike the public debt, which perhaps the majority of the nation's inhabitants could have enjoyed, in the case of the resources allocated annually by the IPAB, only a few 'friends' of those who controlled the political and economic power at the end of the last century benefited.

In 2019 the amount of 51,339.9 million pesos was disbursed for the budgetary program corresponding to the IPAB, while in 2020 the amount of 43,330 million pesos was spent, meaning 0.9% and 0.7% of the total federal budget in 2019 and 2020 respectively.

If we consider that with these three concepts we have, almost 12% more of the compromised budget, we will have that the budget has compromised 51.6% of the total that could be spent by 2022, leaving therefore the remaining 48.4% as spending that could be programmed or as seen under the concept of fiscal space.

According to information provided by the Ministry of Finance and Public Credit (SHCP, 2020), in the table below I summarize the compromised budget.

Table 3. Compromised Public Budget 2019-2020. Millions of pesos

Classification	Program or Sector	Executed 2019	% GDP	Executed 2020	% GDP
Total Public Sector Expendit		5,814,441.5	100.0%	6,007,719.3	25.98%
Non-Programma	Federal Participations:State-Munic.	879,344.3	15.1%	843,545.4	3.65%
Programmable	Federal Compartments:State-Munic.	742,657.1	12.8%	769,156.8	3.33%
Programmable	Pensions: IMSS, ISSSTE y others	641,960.2	11.0%	650,920.6	2.82%
Programmable	Pensión Senior Citizens	113,068.0	1.9%	127,627.0	0.55%
Non-Programma	Public debt service:Central sector	500,880.5	8.6%	544,700.7	2.36%
Non-Programma	Public debt service:PEMEX-CFE	140,864.1	2.4%	120,492.2	0.52%
Non-Programma	Bank support (IPAB)	51,339.9	0.9%	43,330.0	0.19%
Total Compromised Expendit		3,070,114.1	52.8%	3,099,772.7	13.41%

Source: Own elaboration. With information from SHCP: Cuenta Pública. Tomo II Gastos Presupuestarios, Páginas 9,10,11 y Estado Analítico del Ejercicio del Presupuesto de Egresos en Clasificación Funcional Administrativa

Mendoza Rojas (2019: 57) makes us see that in September 2018, the transition team of the Undersecretary of Expenditures of the SHCP of the so-called fourth transformation, made known in its explanatory memorandum of the draft Budget of Expenditures of the Federation (PEF) the following about the programs that were expendable:

According to the information presented in the explanatory memorandum of the draft PEF it was considered that, of all the social programs in force in 2018, 48% were highly expendable, 31% had medium expendability, 14% had low indispensability and only 7% of them were considered indispensable (SHCP, 2018a:26).

2.5 Other Commitments in the Public Budget

Article 20 of the General Law for Social Development rules that the federal budget allocated to social spending may not be lower, in real terms, than that of the previous fiscal year, noting that such social spending must increase in proportion to GDP growth and in congruence with the availability of resources approved by Congress.

Based on the previous article, the public budget allocated to social development will have to increase annually, suggesting that in the current scenario, one of the basic concerns facing social spending is its financing (Martínez et al, 2019: 69).

In 1998, the classification of programmable spending was introduced for the first time, where the components of social spending were marked. Currently, the social development function has as components: a) Education; b) Health; c) Social security; d) Housing and community services; e) Environmental protection; f) Recreation, culture and other manifestations; and g) Other social affairs.

Within the classification of government functions, according to the Public Finance Statistics Manual 2014 (IMF, 2014b; cited by Podestá, 2020: 12) divides public spending into ten major functions, within those considered as social sector in Mexico are: v) Environmental protection; vi) Housing and community services; vii) Health; viii) Recreation, culture and religion; ix) Education; x) Social protection. In this international classification, six of the ten functions correspond to what in Mexico is known as the social development function.

According to information from ECLAC (2016; cited by Martínez et al, 2019: 85) social spending in Mexico doubled from 1990 to 2012, going from 5.4% to 10.6% of GDP, where it also highlights that Mexico is one of the few nations where social spending is below 11% of GDP, coinciding with

Guatemala, Ecuador, Panama and Nicaragua, while in countries such as Costa Rica, Uruguay and Brazil, social spending in relation to GDP is almost three times higher than in Mexico.

The education budget is an issue that is addressed in every public budget. The Ministry of Public Education has the largest number of employees in the entire federal public sector and is the ministry with the largest budget allocation.

The transition team of López Obrador's SHCP considered that 70% of the educational programs in budgetary matters were highly expendable, which implied a profound reordering in the educational branch, for which several educational programs were considered essential because they did not have the characteristics of a social program, understood as those that clearly contribute to the access of social rights and the reduction of some social deprivation, where in addition the direct beneficiaries are the people of greater poverty or vulnerability (Mendoza, 2019: 58).

The budget allocations dedicated to public education in Mexico, face political pressures from two of the most present unions in the country, due to the number of members: the National Union of Education Workers (SNTE) and the National Coordination of Education Workers (CNTE), the latter with a smaller number of members but combative and with presence for more than four decades. Additionally, there is pressure from the unions of the largest public universities in the country (Universidad Autónoma de México, Instituto Politécnico Nacional, Universidad Autónoma Metropolitana, Universidad de Guadalajara and Universidad Autónoma de Nuevo León) in search of economic improvements for their members.

Higher education was immersed in criticism unleashed as a result of several public universities propagating an image of corruption and opacity, due to the investigations carried out on the master scam of 2013, which involved officials of the then Ministry of Social Development (SEDESOL), the Ministry of Agrarian, Territorial and Urban Development (SEDATU) and several public universities in the scheme on diversion of public funds (Mendoza, 2019: 54).

Although it must be recognized, in agreement with what was expressed in 2019 by the National Association of Universities and Higher Education Institutions (ANUIES), that those responsible for the irregularities of the master scam were the officials and managers of the 21 public universities that were involved in the fraud of five billion pesos, which were defrauded via triangulation of billings, for which the university community, which in essence is who gives life to higher education in Mexico, should not be punished.

Furthermore, in my point of view, only two of the largest universities in the country with autonomy were involved in these criminal acts or unhealthy university practices, but reiterating that it was the officials who made administrative decisions who encouraged such triangulation of resources, which perhaps they wanted to pass it off as a 'legaloid' matter, but it was not morally or ethically well seen. Generally, the autonomous public universities with the largest number of students and academic capacities in the country were not involved in the scandal and fraud of the master swindle.

The problems of financial sustainability suffered by the state and national public universities will be affected in the part of economic benefits received by employees and professors, but a more acute problem will be the issue of the pensions that these university workers will receive in the future, with the gravity for the national public finances, that in some autonomous public universities of the country they may receive double pension: a retirement by the university and in parallel a pension in the IMSS if they had contributed additionally, as would be the case of the Benito Juárez Autonomous University of Oaxaca (UABJO) and the University of Guadalajara (UDG), among others.

Rodolfo de la Torre (Albarrán, 2021), from the Centro de Estudios Espinoza Yglesias, argues that per capita spending on education has been decreasing annually and at least half a point of the GDP is

required to meet the expenditure, in consideration of the new needs brought by the return to school after the strong COVID-19 pandemic.

To conclude this part, I would like to point out what Hernández Hortiales (quoted by Albarrán, 2021) mentions about the budget surplus that is available for redistribution:

About 9% of the budget is what remains available and for this year, that percentage is distributed as follows: 32% for investment in projects such as the Dos Bocas refinery and the Mayan Train, and 68% to current spending for programs such as Sowing Life and health issues.

He added that this is the space that has to be redistributed, in order to attend to the reforms that are required, mainly attending to health and education needs.

In the health sector, Héctor Villareal (Albarrán, 2021), director of the Centro de Investigación Económica Presupuestaria (CIEP) expressed that at least three additional points of the GDP are required to complete the resources needed for the health sector, saying: "Expenditures that are recurrent, such as health, must be financed with current revenues. We need at least seven or eight tenths of GDP so that the health system does not get out of control". For his part, Enrique Provencio (Albarrán, 2021) of the UNAM, puts the interest in environmental care issues, in this regard expresses:

The costs of environmental degradation are close to 4% of GDP and the total expenditure of the entire environment for 2021 barely exceeds 0.1%, i.e., there is no level of comparison and given the fiscal situation it is not possible to cover the costs of degradation.

The author also points out that there is an urgent need to attend to the country's hydraulic infrastructure, indicating that between 55 and 66 billion pesos should be allocated to this important sector and to recover what has deteriorated over time.

3. Tax Evasion as a Source of Lower Public Revenues

It is said that nobody likes to pay taxes, and this is so true that large corporations and taxpayers go to the extreme of designing complex systems and methods that usually involve front companies, ghost companies and triangulation of capitals and funds through several countries, in order to avoid contributing or giving the tax authorities what corresponds to them according to the regulations.

It is precisely in this context that the concepts of tax avoidance and tax evasion. It is worth mentioning that the two concepts have different effects and consequences, tax avoidance entailing administrative actions by the tax authorities and tax evasion entailing administrative and even criminal actions for taxpayers who make proven use of these bad practices.

We have already seen in previous chapters the serious situation that our country is going through due to its low tax collection, in relation to the nations of the American continent and in relation to the OECD nations. Two of the main evils that contribute to the low tax collection in Mexico have to do with or are explained by tax evasion and avoidance by large companies and taxpayers. We must bear in mind that in our country there are recurring difficulties in quantifying the phenomena of tax evasion.

Illegal taxation has recurrently reduced the resources received by the States, which has significantly affected public finances, which has also reflected these reductions in lower possibilities of development for our nation, as stated by the Economic Commission for Latin America ECLAC (2019; cited by Gómez & Morán, 2020: 9-10), where it states, "It is encouraging that, in recent years, the countries of the region have shown concrete progress in relation to the objective of reducing or limiting the levels of tax evasion and tax avoidance."

In any society there are individuals who do not comply with their tax obligations, either in due time or form, thus giving rise to tax offenses. Such improper conduct may be sanctioned through administrative charges or through criminal law. Ríos Granado (2008: 293; quoted by Rezzoagli, 2009: 1) defines the tax offense as the: "...violation of the tax rules through an unlawful conduct, which may consist of the omission of ordered acts or the execution of those prohibited by law".

For some authors there are three tax offenses, adding the concept of tax fraud. While for other authors tax fraud is a derivation of tax evasion. The constituent elements of tax fraud are: a) Deception or taking advantage of errors; b) Omission to pay a tax in whole or in part; c) Obtaining an undue benefit; d) Casual link between the deception and the non-payment of the tax or obtaining the undue benefit (Ríos, 2005: 322). In this regard, Gómez & Morán (2020: 10) point out tax evasion and avoidance:

Here a distinction is usually made between tax evasion as such, considered illegal, in all its modalities, and tax avoidance. The latter, although it does not contravene the letter of the law, poses a conflict with the spirit of the principles and rules governing a tax system (above all, equity) and usually manifests itself, for example, in the intentional transfer of profits to countries with low or no taxation and the abusive handling of transfer prices between related companies.

Luis Álvarez (2018) makes it clear that both strategies (tax avoidance and tax evasion) seek to reduce the amount of taxes to be covered, the difference being that tax evasion consists of a blatant violation of the tax law, while avoidance is rather an interpretation made of the law to reduce taxes. In aspects of tax law, Gerencie.com (2021) points out the following about tax avoidance and evasion:

Avoidance consists of a set of practices aimed at avoiding that the fact or tax obligation arises or arises. By means of different maneuvers or practices it is possible to avoid the obligation to pay a tax, since the configuration of the assumptions and facts that cause it is avoided. Tax evasion also refers to the conduct of the taxpayer who seeks to avoid the payment of taxes by using maneuvers or strategies allowed by the law itself or by the loopholes in the law.

Evasion consists of concealing the tax liability in order to avoid the responsibility of paying the tax. It also refers to the maneuvers used by taxpayers to avoid paying taxes by violating the law. Tax evasion is simply not complying with the law, which is undoubtedly illegal.

An example of tax evasion is the 'purchase of invoices' that cover operations that were never carried out, pretending that services or supplies were acquired for your company, although in reality this transaction did not exist and only the payment is given, a document with which this expense is sought to be deducted for Impuesto Sobre la Renta (ISR) -Income Tax- or Impuesto al Valor Agregado (IVA) -Value Added Tax- purposes. Other examples of tax evasion are when the person who obtains the income does not declare it, or who partially declares such income.

Another very common case of tax evasion is when cars are registered in states that have zero or very low tenure charges, which are different from the usual addresses of the drivers, taking advantage of legal loopholes or lack of coordination between states (Aguirre and Sanchez, 2019: 5). This is the case when inhabitants of Mexico City register their cars in the state of Morelos and sometimes they do not even have a rest house in that state, or sometimes the registered addresses do not even exist.

The different types of tax evasion are: 1) Failure to register in the tax records; 2) Failure to file tax returns or they may be inaccurate; and 3) Failure to pay the declared tax. Tax evasion is linked to three transcendental obligations: registering in the Sistema de Administración Tributaria (SAT) -Tax Administration System-, keeping accounts and paying taxes (Folco, 2004: 21; cited by Rezzoagli, 2009: 3).

An example of tax avoidance is when outsourcing services or contracting personnel through third parties are used, where the companies that actually have workers working for them try to take away their benefits and seniority, taking advantage of the existing legal loopholes in labor law or in the different interpretations that can be given to it. Other examples of tax evasion are when part of the income of a company or person is billed in the name of a family member, or when a commercial establishment is put in the name of a third party, when in fact it is theirs.

The concepts of tax avoidance and tax evasion are linked in the legal field with arbitrariness and discretionality. The former imposes a conduct contrary to the law and the law, while discretion implies the possibility of choosing between several alternatives or strategies, all of them lawful or admitted by the legal system.

Thus, in cases of tax evasion, the authority is only responsible for taking administrative measures for its correction, while in cases of tax evasion, the taxpayer may be punished both administratively and criminally, by filing a complaint with the Attorney General's Office of the Republic.

Silvia Marrama (2005; quoted by Rezzoagli, 2009: 4) points out that the 'economy of option' is located within the scope of tax planning and implies choosing the least burdensome way to face taxes. The term 'economy of option' is defined as the non-abusive use of legal forms, which implies opting for the least onerous tax regime among those that the regulations establish in a structural way, while tax avoidance is opposed to the legislative rules on tax matters.

I can summarize that tax avoidance is not illegal in the strict sense of the word, because the law is not directly violated, but operations are manipulated or simulated in a virtual sense, thus avoiding the obligation to fully comply with the law. Another way of looking at it is that tax evasion is related to tax abuse, since facts or legal transactions are manipulated in order to avoid full compliance with the tax obligation. Tax evasion consists of hiding the tax obligation to avoid the responsibility of complying with the payment of the tax, where maneuvers can also be carried out to avoid the payment of taxes, thus violating the law.

It is always convenient to bring up what Section IV of Article 31 of the Political Constitution of the United Mexican States points out to us, where it is stated that individuals must contribute to the public expenses of the public sector of the country (federation, states and municipalities), in a proportional and equitable manner provided by the laws.

According to San Martín (2017; cited by Gómez & Morán, 2020: 68) estimated Value Added Tax (IVA) evasion rates from 2005 to 2016 stood at 32% of the estimated revenue collectible in 2005, gradually declining to stand at 16.4% in 2016. Total IVA revenue collected in Mexico represented 23.3% of the total collected in 2017 and meant 3.7% of GDP, estimating the 0.9% of GDP that was not collected from IVA due to tax evasion.

In reference to Income Tax (ISR) of individuals, for 2016 there was information that tax evasion in this item corresponded to 18.7% of the total ISR of individuals possible to be collected, representing 0.8% of GDP in 2016. The total ISR collected is equivalent to 3.5% of GDP for the same year. Regarding ISR of companies or legal entities, the information for 2016 indicated that tax evasion of this item of contributions was equivalent to 19.9% of what was possible to be collected, equivalent to 0.7% of GDP in Mexico for 2016 (Gómez & Morán, 2020: 29).

Adding the three tax concepts in our country (IVA, ISR individuals and corporations) we have that between 2016 and 2017 as a result of tax evasion, at least 2.4% of the GDP in our country was not collected.

We have already seen that tax evasion is a crime that affects our country as a whole, since the taxpayers accused by pretending to hide their earnings, stop contributing to public finances, thereby limiting the government's budgetary resources to carry out the public policies and social programs that they must implement. From Aguirre & Sanchez (2019: 4) I take up these figures that are very interesting about tax evasion in Mexico:

Senator Samuel García referred that "the rate of tax evasion in Mexico represented 2.6 percent of GDP in 2016, which meant that the government did not collect around 510,000 million pesos...According to the Oxfam organization in Mexico "during the period 2013-2015, companies evaded on average 244 thousand 664 million pesos annually, which represents 39.63% of the potential collection of Income Tax". This figure is five times the amount of resources for the reconstruction of the damages caused by the earthquakes of that year.

In the courts that make up the Judiciary of the Federation, there have been sentences on issues related to tax evasion from 2012 to 2018 being a total of 50, highlighting only one formal imprisonment order.

In more recent figures Raquel Buenrostro (Flores, 2021), head of the SAT, points out the following points in this year 2021:

1. That the potential amount of tax evasion and avoidance represents 3% of the 2020 GDP.
2. The SAT detected the evasion and avoidance of income tax for 700 billion pesos in large taxpayers of 40 economic activities in sectors such as financial services and insurance, mining, manufacturing industry and wholesale and retail trade.
3. If IVA refunds were included, there would be companies with negative tax payment rates, which means that the federal government subsidizes their operation in Mexico. This is the case of the automotive industry with its negative IVA rates.
4. In 2020 large taxpayers paid an effective ISR rate of 1.3% of their income, while individuals paid 25.4% and wage and salary taxpayers paid 11.4%.

To alleviate the acute and persistent problem of tax evasion in Mexico, the following policies have been implemented: 1) The SAT has developed a mobile application that offers the services of registration and electronic invoices issued, view financial indicators, schedule appointments and view the status of tax obligations; 2) Implementation of pre-filled returns; and 3) Application of IVA to transactions on digital economy (Gómez & Morán, 2020: 40-42).

In order to combat tax offenses in the country, reforms to Mexican legislation are being implemented to try to abate these problems. In recent times there has been a discussion about whether this represents 'fiscal terrorism', which has been approached in this way by the traditionalist characters of the country's politics (National Action Party, business confederations, intellectuals of the so-called right wing) or if on the contrary, as is my opinion, it is strict application of the law for those who for years have defrauded by not paying federal taxes: Income Tax (ISR) or Value Added Tax (IVA). These are some of the actions that have been carried out in recent times to try to reduce fiscal or tax offenses in our country:

- ❖ The European Commission has made significant progress in disseminating the tax practices of its members. In this aspect, the case of Mexico stands out. For several years now, the SAT has had the legal obligation to publish annual studies on tax evasion, in which at least two national academic institutions must participate, highlighting ISR and IVA (Gómez & Morán, 2020: 20).
- ❖ In order for the country's large corporations to pay the ISR that corresponds to them, the SAT has released the publication of the so-called Effective ISR Rates of Large Taxpayers. This was given as a function of the fact that the ISR rate is set at 30% of profits, the problem is that with 'undue' deductions, inadequate tax planning and 'aggressive' legal interpretations (tax fraud), their contributions are considerably reduced (less than 2% of their income).

- ❖ Modification of Article 28 of the Magna Carta to prohibit the cancellation of taxes, since in previous administrations 413,000 million pesos were condoned, in addition to the modification of the universal compensation so that there would be no abuses such as those that occurred before in the application of contributions.
- ❖ The SAT announced that during the first two years of López Obrador's government it recovered 736,000 million pesos owed by taxpayers, a figure that allowed it to overcome the COVID-19 pandemic and which led to the recognition of the fiscalization effort given by Fitch and the International Monetary Fund (IMF), figures that were obtained from the 43% recovered from large taxpayers, 41% from fiscalization and foreign trade, 6% from coercive collection and 10% from collection efficiency (Flores, 2020).
- ❖ On April 24, 2021, the outsourcing reform package went into effect, which modified the Federal Labor Law, the Federal Tax Code and the corresponding IMSS, INFONAVIT, ISR, IVA, so that companies do not evade their economic responsibilities to their workers.
- ❖ On October 25, 2021 it was front page news that the Supreme Court of Justice of the Nation (SCJN) gave a setback to the federal government by suppressing preventive imprisonment (automatic prison judicial process) to those arrested for smuggling, sale of false invoices and tax fraud. Recalling that reforms to the National Code of Criminal Procedures and to the National Security Law had been promoted in order to declare as equivalent to organized crime offenses the crimes compromised by those who have been called "factureros" (invoice sellers) who evade the tax authorities.

Conclusions

Mexico is among the countries that capture the lowest tax revenues worldwide and also in comparison with Latin American countries, in 2019 Mexico obtained 16.5% of tax revenues (taxes, duties, profits and social security fees) in relation to the national GDP, while France (47.2%) obtained three times more than our country; other countries such as Spain (35. In addition, Latin American countries such as Argentina (28.6%), Nicaragua (25.9%), Costa Rica (23.6%), Bolivia (24.7%), Chile (20.7%) and Colombia (19.7%) have a better ratio of tax revenues to GDP.

The non-programmable public budget is that which is destined to the fulfillment of obligations and support determined by law, with the following items in Mexico: federal participations, financial cost of the debt, debts from previous years and support to bank debtors. I define the concept of compromised public spending as non-programmable spending plus two major concepts: federal contributions and contributory pensions (IMSS, ISSSTE) and non-contributory pensions (pensions for senior citizens).

Non-programmable spending in 2019 represented 24.8% of total public spending, where federal contributions represented 15.1%, central spending debt service 8.6%, support to bank debtors 0.9% and debts from previous years 0.2%; while in 2020 it represented 24.1% of total public spending: federal contributions 14%, central spending debt service 9.1%, support to bank debtors 0.7% and debts from previous years 0.2%.

To the concept I propose of compromised public spending, I would add four fundamental concepts: federal contributions; contributory pensions; non-contributory pensions (pension for the elderly); and public debt service of productive companies (PEMEX and CFE). Where federal contributions represented 12.8% of total public spending in 2019 and 2020; contributory pensions (IMSS, ISSSTE and others) 11% and 10.8% respectively; pensions for senior citizens 1.9% and 2.1% respectively; and PEMEX and CFE debt service 2.4% and 2% in 2019 and 2020.

Adding these four budget items plus the spending considered non-programmable, we would have that the compromised public spending at the federal level would be 52.8% in 2019 and 51.6% in 2020, representing 12.67% and 13.41% of GDP respectively in 2019 and 2020. With this we see that the

resources that could be redistributed in the Chamber of Deputies have a margin of 48% of the total federal public budget for 2022.

The potential amount of tax evasion and avoidance represents 3% of 2020 GDP. In 2020 large taxpayers paid an effective ISR rate of 1.3% of their income, while individuals paid 25.4% and wage earners 11.4%.

References

- Aguirre Quezada, Juan & Sánchez Ramírez, María (2019) Evasión fiscal en México. Senado de la República. Cuaderno de Investigación (55). <http://bibliodigitalibd.senado.gob.mx/handle/123456789/4338>
- Albarrán, Elizabeth (2021). Reforma fiscal debe priorizar gastos en salud, educación y medio ambiente. El CEO. Blog 28 de abril de 2021. <https://elceo.com/economia/reforma-fiscal-debe-priorizar-gastos-en-salud-educacion-y-medio-ambiente/>
- Álvarez, José Luis (2018). ¿Cuál es la diferencia entre la elusión y la evasión fiscal? El Contribuyente. <https://www.elcontribuyente.mx/2018/02/cual-es-la-diferencia-entre-la-elusion-y-la-evasion-fiscal/>
- Castillo Guerrero, Rosa & Tamez Martínez, Xóchitl (2020). Importancia de la correcta gestión y distribución del presupuesto federal en México. V Congreso Virtual Internacional Desarrollo Económico, Social y Empresarial en Iberoamérica. <https://www.eumed.net/actas/20/desarrollo-empresarial/56-importancia-de-la-correcta-gestion-y-distribucion-del-presupuesto-federal-en-mexico.pdf>
- Castillo Guerrero Rosa & Mayorga Urdiales, Stephany & Tamez Martínez, Xóchitl (2020b). Análisis del proceso presupuestario federal en México. Revista Académica de Investigación Tlatemoani. 11 (35), pp. 191-218. <https://dialnet.unirioja.es/servlet/articulo?codigo=7861188>
- Cid Pedraza, Camilo & Pagano, Juan P. & Pescetto, Claudia & Prieto, Lorena (2019). Espacio fiscal para el financiamiento sostenible de los sistemas de salud y la salud universal. Revista Panamericana de Salud Pública. Vol. 42. <https://www.scielosp.org/article/rpsp/2018.v42/e197/#>
- Dávila Flores, Eugenio (2020). El cumplimiento de la contabilidad gubernamental y su efecto en la fiscalización de recursos federales. Universidad Autónoma de Nuevo León. http://www.web.facpya.uanl.mx/Vinculategica/Vinculategica6_2/76_Davila.pdf
- El Economista (2020). Costo financiero de pensiones se triplicó en dos décadas: López Macari. Sector Financiero. 16 de febrero de 2020. <https://www.eleconomista.com.mx/sectorfinanciero/Costo-financiero-de-pensiones-se-triplico-en-dos-decadas-Lopez-Macari-20200216-0011.html>
- Expansión / Datosmacro.com (2019). Presión fiscal (% PIB) 2019. <https://datosmacro.expansion.com/impuestos/presion-fiscal?anio=2019>
- Flores, Zenyazen (2020). SAT recupera 736 mil mdp de adeudos en primeros dos años del gobierno de AMLO. El Financiero 3 diciembre de 2020. <https://www.elfinanciero.com.mx/economia/sat-recupera-736-mil-mdp-de-adeudos-en-primeros-dos-anos-del-gobierno-de-amlo/>
- Flores, Zenyazen (2021). El SAT detecta evasión y elusión de ISR por 700 mil mdp en grandes representantes. El Financiero 14 de junio de 2021. <https://www.elfinanciero.com.mx/economia/2021/06/14/el-sat-detecta-evasion-y-elusion-de-isr-por-700-mil-mdp-en-grandes-contribuyentes/>

- Gerencie.com (2021). Elusión y evasión tributaria. En que consiste. Blog 12 de enero de 2021. <https://www.gerencie.com/elucion-y-evasion-tributaria.html>
- Gómez Sabaini, Juan C. & Morán, Dalmiro (2020). Estrategias para abordar la evasión tributaria en América Latina y el Caribe. Avances en su medición y panorama de las medidas recientes para reducir su magnitud. Santiago: CEPAL. Serie Macroeconomía del Desarrollo. Núm. 215. https://repositorio.cepal.org/bitstream/handle/11362/46301/1/S2000696_es.pdf
- Martínez, Oscar & Salgado, Yasmin & Meireles, Mónica (2019). Gasto social, austeridad y combate a la pobreza: la experiencia mexicana. *Economía UNAM*. 16 (47), pp. 66-92. <http://www.scielo.org.mx/pdf/eunam/v16n47/1665-952X-eunam-16-47-66.pdf>
- Mendoza Rojas, Javier (2019). Presupuesto federal de educación superior en el primer año del gobierno de Andrés Manuel López Obrador: Negociaciones y retos. *Revista de la Educación Superior, ANUIES*. 48 (191), pp. 51-82. <http://www.scielo.org.mx/pdf/resu/v48n191/0185-2760-resu-48-191-51.pdf>
- México Evalúa (2019). Gasto programable y no programable. Números de erario 30 de septiembre de 2019. <https://www.mexicoevalua.org/numerosdeerario/portfolio/gasto-programable-y-no-programable-neto-del-gobierno-federal/>
- Moreno Brid, Juan, Pérez Benítez, Noel y Villareal Páez, Héctor (2017). ¡Ay Bartola!: los riesgos de unas finanzas públicas austeras en México. *México: Economía UNAM*. 14 (41). <http://www.revistas.unam.mx/index.php/ecu/issue/view/4659>
- Organization for Economic Cooperation and Development (2017). Estadísticas tributarias en América Latina y el Caribe 2017. En colaboración con CEPAL/CIAT/BID. Publicado en París. <https://publications.iadb.org/es/publications/english/document/Revenue-Statistics-in-Latin-America-and-the-Caribbean-1990-2015.pdf>
- Organization for Economic Cooperation and Development (2019). El gasto público social es alto en muchos países de la OCDE. <http://www.oecd.org/centrodemexico/medios/OECD2019-Gasto-Publico-Social.pdf>
- Peláez Herreros, Oscar (2021). Jaime Ros (1950-2019), retomando las propuestas de los pioneros del desarrollo. *Revista Iberoamericana de Estudios de Desarrollo*. 10 (1), pp. 364-385. <https://dialnet.unirioja.es/servlet/articulo?codigo=7915347>
- Pérez Benítez, Noel & Villareal Páez, Héctor (2018). El espacio fiscal de los estados: definición e implicaciones. En Mendoza Velázquez, Alfonso (Coordinador): *Los incentivos perversos del federalismo fiscal mexicano*. México: FCE, pp. 19-42. *Los incentivos perversos del federalismo fiscal mexicano - Alfonso Mendoza Velázquez - Google Libros*
- Podestá, Andrea (2020). Gasto público para impulsar el desarrollo económico e inclusivo y lograr los objetivos de desarrollo sostenible. CEPAL. https://www.cepal.org/sites/default/files/publication/files/46276/S2000670_es.pdf
- Ramírez Cedillo, Eduardo & López Herrera, Francisco (2020). El gasto público y su postura fiscal pro cíclica (1980-2016). *El Trimestre Económico*. 86 (342), pp. 405-435. http://www.scielo.org.mx/scielo.php?pid=S2448-718X2019000200405&script=sci_arttext
- Rezzoagli, Bruno Ariel (2009). Ilícitos tributarios. Diferenciación entre evasión, defraudación y elusión fiscal. *Amicus Curiae*. 2^a Época. 2 (2). <http://www.revistas.unam.mx/index.php/amicus/article/view/13543>

- Ros, Jaime (2019). Los retos de la política económica. *Economía UNAM*. 16 (46). Enero-abril. http://www.scielo.org.mx/scielo.php?pid=S1665-952X2019000100016&script=sci_arttext
- Sánchez Ruanova, Salvador & Ordóñez Sánchez, Sergio & García Cruz, Gabriela (2019). La rendición de cuentas públicas con un software armonizado a tiempo real en plataforma nacional. UNAM, XXIV Congreso Internacional de Contaduría, Administración e Informática. <http://congreso.investiga.fca.unam.mx/docs/xxiv/docs/5.13.pdf>
- Secretaría de Hacienda y Crédito Público (2020). Cuenta Pública. Ocho Tomos. Recuperado <https://www.cuentapublica.hacienda.gob.mx/>
- Vargas Mendoza, José (2019). El paquete económico para 2019 y las perspectivas de la economía mexicana. *Economía Informa UNAM*. Núm. 416. Mayo-junio. <http://www.economia.unam.mx/assets/pdfs/econinfo/416/04JoseVargasMendoza.pdf>
- Villalobos López, J. Antonio (2021). Pensiones en México. Caso IMSS. MPRA Paper. University Library of Munich. Abril 2021. Páginas 20. Recuperado <https://mpa.ub.uni-muenchen.de/107459/>
- Villareal, Héctor J. & Villa, Sunny A. (2021). Medición del espacio fiscal en México. *Problemas del Desarrollo. Revista Latinoamericana de Economía*. 52 Núm. Especial Jaime Ros. Recuperado <https://www.probdes.iiec.unam.mx/index.php/pde/article/view/69699/61561>

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