

Department of Political Science and Public Policy (DPSPP)

SSPAC - Self-Sustaining Public Administrative Cell: Contribution to the Management of Public Administration - A Vision

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Project work submitted as a partial requirement to obtain the degree of Master in Public Administration

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# **DEDICATED**

This project work is dedicated to the people who make a difference in the world and those who serve the public interest. There is no greater call.

## **SUMMARY**

The work project analyzes the evolution of administrative reforms and concepts of sustainability and solidarity in the management and administration of public collective demands and proposes a model that integrates strategic planning, management, use of information and communication tools (ITC's), and active citizenship, as an ideal model to manage and manage current and future collective demands. Through the bibliographic review of the main authors, a thorough study was made about the evolution of human behavior in the management and administration of their collective demands, relating it to the concepts of sustainability and solidarity. What is the ideal management and public administration model for the State to be self-sustaining at the local, regional, and national levels? A model that manages and, through the active participation of taxpayers/citizens, their collective demands utilizing in an integrated and decentralized way, available tools of planning, management, information and communication, active citizenship, as observed in some countries and the international experiences of participatory budgeting and development of production chains integrated business. The research methodology developed was descriptive through documentary research. The study will have an essentially qualitative character.

Keywords: administrative reforms, sustainability and solidarity, management and public administration, collective demands.

#### **ABSTRACT**

The work project analyzes the evolution of administrative reforms and concepts of sustainability and solidarity in the management and administration of public collective demands and proposes a model that integrates strategic planning, management, use of information and communication tools (ITC's), and citizenship as an ideal model for managing and administering the current and future public collective demands. Through a bibliographical review of the main authors, anthropologists, sociologists, administrators, and economists of the areas, a profound study was made on the evolution of human behavior in the management and administration of their collective demands, relating it to the concepts of sustainability and solidarity. What model of management and public administration is ideal for the state to be self-sustaining at local, regional, national, and international levels? A model that manages through the active participation of taxpayers/citizens their collective demands. By using integrated and decentralized tools, available planning, management, information and communication tools, active citizenship, such as observed in some countries and the international experiences of participatory budgeting and the development of integrated business production chains. The research methodology developed was descriptive through documentary research. The study is essentially qualitative.

Keywords: Administrative reforms, concepts of sustainability and solidarity, management and public administration, collective demands.

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## **GLOSSARY ACRONYMS**

Public Administration - PA

Global Value Chains - GVC

SSPAC - Self-sustaining Public Administrative Cell

Start, Plan, Execution, Control, Closing - SPECC

Key Performance Indicator - KPI

Neo-Weberian State - NWS

New Public Management – NPM

Millennium Development Goals - MDGs

Sustainable Development Goals - SDGs

Participatory Budget - PB

Digital Participatory Budget - DPB

Information and Communication Technology - ICT

#### 1. INTRODUCTION

This project work is about SSPAC - Self-sustaining Public Administrative Cell, a proposal for a model of management and administration of collective (public) demands to be carried out by public organizations.

The model consists in the structuring of cluster cells of individuals with their representativeness – geopolitically at local, regional, national, and international level – that identify, define and process collective demands of short, medium, and long term, through the four integrated phases that are: strategic planning, management, horizontal communication, and active participation, producing collective services and equipment demanded by society to organizations public authorities.

In conceptual terms, the work analyzed the evolution – parallel and then convergent – of the concepts of sustainability, solidarity, and governance and the practical results achieved by international, public, private, and third sector organizations in terms of elaboration and future.

The theoretical framework resulted from the research and analysis of literature and empirical cases regarding two factors: the evolution of proposals for the promotion of public policies that ensured sustainable economic development – resulting from the debates, international forums, and conferences organized by organizations such as the United Nations, World Bank, and OECD, since the Club of Rome (1970), through the eight Millennium Development Goals (MDGs) and comminating in the seventeen Development Goals Sustainable (SDGs) – and public administrative reforms made by governments globally and their practical results concerning the gain of efficiency and effectiveness of states in sustainable demand management.

The project work focuses on affirming the managerial and operational feasibility of SSPAC as a model of sustainable and supportive public administration management and administration, on the rapid technological and scientific advances of the last decades, which have eliminated management and communication barriers, promoting first in the private sector and then in the organization's revolution in strategic planning, management, and corporate and governmental planning capacity, respectively.

The elimination of limitations in the analysis of strategic information for decision-making in the planning of the processing of collective demands by public organizations, through the definition and execution of often unrealistic budgets, and in some irresponsible cases, as well as the geographical and demographic capacity of communication with large groups of individuals at the same time, were eliminated with the tools made available today through scientific evolution and technology in all areas of management and public administration.

In this sense, the project work is based exactly on the existence of the means – resources, technologies, and management methodologies – for the practice of management and public

administration consistent with the fulfillment of current and future public collective demands, geopolitically integrated and complementary, thinking about the solutions of state responsibility issues in a strategic and planned way from the place to the international, because it is clear that to meet the current and future challenges of the humanity, will only be possible through a global agenda.

Considering the complexity of contemporary challenges, it is necessary to count on a modern, decentralized state, capable and equipped with financial, material, and human resources to process the data generated by current and future representative political structures strategically, prioritizing the development of socio-economic variables and the public interest at local, regional, national and international level in the creation and implementation of their public policies, and above everything, whether it is an organization that represents, administers and rotates the needs of individuals who constitute it democratically and pragmatically, responding quickly, to coping and solving these challenges. This has been the great diligence of modern global Management and Public Administration. Reform the State to ensure that it is the coordinator and regulator of public policies that ensure the balance between the interests of public and private organizations in the short, medium and long term, intending to ensure a socio-economic and environmental ecosystem, necessarily provides multidimensional and sustainable social, economic and environmental development.

The present work is structured as follows: Chapter 1 concerns the theoretical framework of public administration, definition, and evolution of models in PA, and the identification of the characteristics of sustainability and solidarity in each of them.; Chapter 2 demonstrates the evolution of the concept of sustainability in public management as a premise for the development of public policies that provide sustainable economic, social, and environmental development; chapter 3 exposes the methodological strategy; Chapter 4 describes the proposal for a model of management and public administration SSPAC; finally, it is concluded by highlighting essential aspects that result from this work, which allow us to enunciate some conclusions and recommendations.

# CHAPTER I - THEORETICAL FRAMEWORK: PUBLIC ADMINISTRATION - DEFINITION AND EVOLUTION OF MODELS IN PA

### Constitutive Elements of the State for the Sustainability of the System

According to Ignacy Sachs (2002: 85-89), there are eight dimensions of sustainability that should be considered:

- 1) Social: concerning establishing a plausible level of social homogeneity, with a distribution of fair income, full and/or autonomous employment, decent quality of life, and equality in access to social resources and services.
- 2) Cultural: referring to the balance between tradition and innovation as a premise to have freedom in the construction of a national project and changes within continuity (balance between respect for tradition and innovation), capacity for autonomy to develop an integrated national project open to the world at the same time.
- 3) Ecological: related to the maintenance of society's ability to produce renewable resources and the restriction of the use of non-renewable resources.
- 4) Environmental: refers to respect and increased the question of respecting and enhancing the self-debugging efficiency of natural ecosystems.
- 5) Territorial: this is the balance between urban and rural areas, improvement of the urban environment, supplanting interregional inequality, and environmentally safe development strategies for ecologically fragile areas.
- 6) Economic: related to balanced intersectoral economic development, throughout the production chain of products and services, continuously seeking the modernization and improvement of means and instruments of production through scientific and technological research, continuous modernization of production instruments, and integration into the international economy.
- 7) Politics (National): democracy as a basic and universal premise for the State to develop, in partnership with all entrepreneurs, the national project and social cohesion defined in terms of universal appropriation of human rights, development of the state's capacity to implement the national project, in partnership with all entrepreneurs and a satisfactory degree of social harmony.
- 8) Policy (International): based on the effectiveness of war prevention through UN action, ensuring peace and promoting international cooperation, North-South Co-development Package, based on the principle of equality, effective institutional control of the international financial and business system, application of the Precautionary Principle in the management of the environment and natural resources, prevention of negative global changes, protection of biological and cultural diversity, management global heritage and international scientific and technological cooperation as a common heritage of humanity.

These dimensions reflect Sachs' reading of development within a new proposal, as well as the design of an alternative strategy to the international economic order, emphasizing the importance of local models based on appropriate technologies, particularly for rural areas, seeking to reduce technical and cultural dependence (Jacobi, 1999: 176).

By emphasizing these dimensions, Sachs makes it clear that to achieve sustainability, we must value people, their customs, and knowledge. One should have a holistic view of society's

problems, in addition to focusing only on the management of natural resources. It is a thought that aims at a true metamorphosis of the current civilizational model and the way the Public Administration must deal with it.

## 1.1. Sustainability in Max Weber's Ideal Model

According to some authors, the way of interpreting sociological phenomena through Weberian methodology has proven to be sustainable because it remains surprisingly alive and pulsating yet. The multi causality of the social action advocated by Weber a century ago serves as the basis for a rich analysis of social facts and its unfolding to the present day. The individual mottos that lead to action are organized by systems built through reality, considering their rationality, tradition, or affection.

In summary, according to Max Weber, the ideal bureaucracy involved: fixed spheres of competence, defined hierarchy, a clear distinction between the public and private roles of employees, specialization and *expertise* as a basis for action, full-time and paid career for employees, and management for the application of a set of rules under development, whose knowledge was the special technical competence of the officials concerned. In bureaucratic administration, procedures overlap with efficiency. The guidance is that the procedure is strictly fulfilled, even if the result acquires onerousness or ceases to take effect (Pollitt & Bouckaert, 2011: 71-72).

According to Max Weber, the ideal bureaucracy had several advantages. First, its rationality, which means that it seeks the most efficient means to achieve the goals of the organization, making it more efficient and effective. As activities are organized in routines and performed methodologically, they become consequently predictable, which increases their reliability. The speed in decisions is obtained by the processing of orders and papers and the uniformity of routines and regulations that contribute to the reduction of errors and costs. The ease of replacement of the one who is removed and the selection criteria only by technical competence ensure the continuity of the bureaucratic system, avoiding nepotism. The work is professionalized, and employees are trained and specialized, bringing benefits to organizations. Finally, it mitigated the external influences of the organization, harmonized the specialization of its employees, and controls it in its activities through competence and efficiency, without personal considerations (Chiavenato, 2003: 266-267).

However, especially after the seventies, the bureaucracy was devalued and decreased as a management model and became a synonym of slowness and organizational inefficiency. The layman went on to give the name of bureaucracy to the defects of the system.

One of Weber's biggest critics was Merton (1949: 251-260), who pointed out as negative and limiting characteristics of bureaucracy "the internalization of rules and attachment to regulations;

over formality and papers; resistance to change; depersonalization of the relationship; categorization as the basis of the decision-making process; over-compliance with routines and procedures; display of signs of authority, difficulty in customer service and conflicts with the public."

Weber saw in bureaucracy the rationalization of the capitalist order, and following its conception, the only way to deal with the specialization of tasks and its greater complexity, making it necessary to implement an inefficient control system. Weber's model is a milestone for administrative reforms, as it was the starting point for the evolution and variations of those that came after, showing to be sustainable because of facto, persists to this day.

## 1.2. Sustainability in the New Public Management - NPM

According to Pollitt & Bouckaert (2011: 10), "at the most mundane level", the NPM is a package of specific concepts and practices, including:

- Greater emphasis on "performance", especially by measuring results;
- A preference for simple, flat, small, specialized (disaggregated) organizational forms in large and multifunctional forms;
- A widespread replacement of hierarchical relations contracts as the main coordination device;
- A widespread injection of market mechanisms, including competitive bidding, public sector championship tables, and performance compensation;
- An emphasis on the treatment of service processors as "customers" and the application of generic quality improvement techniques, such as Total Quality Management.

In the 1980s, through the most active interlocutions of British Prime Minister Margaret Thatcher and U.S. President Ronald Reagan, *New Public Management* (NPM) emerged. It is born as support of the neoliberal agenda and the argument of the need for the State to be more efficient and, for this, the use of management mechanisms and market *performance* indicators, directly opposing the states of social welfare, created after the Second World War and plunged a deep fiscal crisis due to the financial crises of the 1970s and the inefficiency of public administration Bureaucratic. Based on these arguments and with a strong performance of propaganda and propagation by international organizations, such as IMF, World Bank, and OECD, the NPM has become a fashion and served as a model of state reform around the world, paving the ground for the implementation of the neoliberal agenda for the globalization of world markets and economies.

The NPM represented a watershed in the history of world public administration, as it is considered by many authors as the effective beginning of the reforms of management and public administration.

According to Drechsler's definition (2009: 8), "the NPM has been the most important reform movement over the last quarter of a century in public administration. The NPM constitutes the transfer of business and market principles and private management techniques to the public, symbiotic sectors, and based on a neoliberal understanding of the state and economy. The goal, therefore, is a tiny and minimal state in which any public activity is decreased and if so, exercised according to the principles of efficiency of the company. It is popularly called concepts such as project management, flat hierarchies, customer orientation, the abolition of career public service, depoliticization, total quality management, and outsourcing."

Thus, the concepts, precepts, and applications of the NPM such as measurement of results, simple organizational forms, flat, small, specialized in large and multifunctional forms, the generalized injection of market mechanisms, including competitive bids, performance remuneration, emphasis on the treatment of service users such as "customers" and the application of generic quality improvement techniques, such as Total Quality Management, contributed to the development of the concept of sustainability applied to public administration.

However, as much as it was concerned with sociological, economic, political, and even ideological contexts – because, with the collapse of the communist Soviet Union, American capitalism imposes itself as a regime - according to some authors, the NPM's proposals failed. And the reasons for this failure are two: the first is that the State is characterized mainly by its monopoly of power, strength, and coercion on the one hand, and by its focus on the public interest, on the other, while the business world is legitimately based on profit maximization (Drechsler, 2009: 9). The second reason, observed by Pollitt & Bouckaert (2011: 62), was the incompatibility of "cultural, ethical and political characteristics with certain countries (particularly France, Germany and the Mediterranean states)."

That is, there is a structural conflict in the NPM of objectives, interests, and permeability. Therefore, after analyzing the results of years of experimentation of the NPM proposal on state reforms around the world, especially in the USA, New Zealand, Australia, and Europe.

Drechsler (2009: 10) states that "even by business efficiency standards, the NPM cannot say it has been successful from today's perspective. For many years, it has become clear that there is no empirical evidence that the reforms of the NPM have led to an increase in productivity or maximization of well-being. Empirically, cliché promises have not been delivered - flat hierarchies are a matter of adequacy and depend on their entire adequacy in context; treat citizens only as clients to withdraw their rights and participatory duties and thus harming the state; the abolition of the career public service will generally lead to the erosion of administrative capacity; depoliticization - and, therefore, de-democratization - leads to the return of the imperial bureaucrat (in its worst sense, disguised as a corporate bureaucrat: even power, less responsibility); and outsourcing has proven to be overly expensive and often violates the state's core competencies as well as the most basic standards of equality."

Another important factor highlighted by Drechsler (2009:8) was that "transparency, citizen engagement, and decentralization are not part of the original core of the NPM, both theoretically – because the NPM focuses on the policy rule of experts make them more difficult

and because they do not necessarily contradict the previous forms of public administration – and empirically." Denhardt & Denhardt (2001: 398) complement this issue by stating that "NPM advocates seem to have accepted a variety of business values in public administration (own interest, competition, market, entrepreneurial spirit). But what about issues such as participation, deliberation, leadership, responsibility, justice, equity, and so on? In the United States, the NPM Bible is Osborne and Gaebler's Reinventing Government. But if you check your index, you won't find any of these terms: justice, equity, participation, not even leadership. And you won't find the terms citizen or citizenship either. It is peculiar that government reform can be discussed substantially and influentially without any suggestion of an active role for citizens or citizenship."

An important phenomenon that called into question the neoliberal foundations of the NMP was the global financial crisis of 2008. The crisis explained a fundamental and strategic issue to be considered in the formatting and implementation of self-sustaining public policies that was: to what extent the market (private sector) without any kind of state regulation and political representatives are responsible for preserving the health and sustainability of the market itself and, at the same time, the public interest? What was somewhat found in the 2008 crisis was the fraudulent speculative action of financial agents – banks, financial, brokers, insurers, and investors – with complete freedom to self-regulate without state oversight.

## 1.3. Sustainability in Neo-Weberian State- NWS

In the NWS, we have a different emphasis than NPM. The emphasis is on modernizing the traditional state apparatus so that it becomes more professional and business methods can play a subsidiary role in this, understanding that the business world does not contain all the answers. Traditional bureaucracy has virtues that must be preserved (clear responsibility, probity, predictability, continuity, attention to the law) and the state remains a distinguished actor with its own rules, methods, and culture. The key is to find ways to combine them with more efficient procedures and a more flexible and reactive stance towards the needs of an increasingly diverse population (Pollitt, Thiel, & Homburg, 2007: 19-22).

De acordo com Pollitt & Bouckaert (2011: 118), o NWS tem suporte nos seguintes conceitos:

Weberian Elements

- Reaffirmation of the role of the State as the main facilitator of solutions to the new problems of globalization, technological changes, demographic changes, and environmental threats;
- Reaffirming the role of representative democracy (central, regional and local) as a legitimizing element in the state apparatus;

- Reaffirming the role of administrative law properly modernized in preserving the basic principles relating to the citizen-state relationship, including equality before the law, privacy, legal certainty, and the availability of controlling the specialized legal of state actions;
- Preservação da ideia de um serviço público com *status* distintivo, cultura até certo ponto, embora talvez não tanto quanto nos termos e condições anteriores.

#### Neo Elements

- Change from an internal orientation to a bureaucratic direction, moving to an external orientation to meet the needs and desires of citizens. The main route to achieve this is not the use of market mechanisms (although they may occasionally be useful), rather the creation of a professional culture of quality and service;
- Supplementation (non-substitution) of the role of representative democracy by a series of devices for consultation and direct representation of citizens' views (this aspect being more visible in the states of northern Europe and Germany at the local level of the Belgium, France or Italy);
- In resource management within government, a modernization of relevant resources and laws to encourage greater guidance for achieving results, rather than just the correct procedure. This is expressed in part by a change in the balance of control but does not imply a complete abandonment of the first. You can also take the form of a degree of performance management;
- A professionalization of the public service, so that the "bureaucrat" does not simply become an expert in the law relevant to its sphere of activity, but also a professional manager, oriented to meet the needs of citizens/users.

Thus, Pollitt, Thiel & Homburg (2007: 19-22) proposed that the ideal model to replace or post-NPM should not necessarily be one that returned to the previous one, that is, the Weberian State, but which " combines the positive elements of the NPM on a Weberian foundation so that both are asymmetrically considered."

It is important to always point out that the basis for the evolution of new managerial and administrative concepts in the public sector, and consequently administrative reforms, was the NPM. In the NWS, the professional modernization of the State was different to return the state the responsibilities inherent to the public authorities, interacting, however, with citizens in a friendly manner. The use of administrative and managerial tools imported from the business continued; however, with the legitimation of political representativeness. This is the key feature in the NWS because in a way it has strengthened active citizen participation and democracy (Pollitt, Thiel, & Homburg, 2007: 21-22).

## 1.4. Sustainability in Networks

The debates and publications on the "networks" emerged in the early 1990s and have as its mean interlocutor the Spanish sociologist Manuel Castells. Castells' studies on networks are vast, analyzing from the outset the information technology revolution, which emerged in California from the 1970s with the development of the integrated circuit, microprocessor, microcomputer, among other key electronic innovation technologies (Castells, 2010: 61-62), through the evolution of internet technology and information tools, communication and digital entertainment, which changed drastically and quickly the flow of communication and information between individuals and organizations until nanotechnology (Castells, 2010: 29).

About the size and impact that networks have had on public administrative reforms, there is still an endless academic debate. However, one obvious question was that the NPM's arguments and those of the network were convergent. The technologies of management, information, and communication were essential for the application of the concepts and precepts of the NPM. Only with the use of technologies that it was possible to manage the multiple complex variables of the NPM management mechanisms as described in the topic referring to the above model (Pollitt & Bouckaert, 2011: 20).

The undisputed empirical result of the convergence of the concepts of networks with the NPM was the great qualitative leap of management and performance in public organizations, promoting the modernization of the late State, but fundamental for the evolution of future reforms. With the import of technologies (software and hardware) management, information and communication from the private sector, processes, and administrative routines and especially public communication modernized and gained another dynamic, profoundly transforming the form of interaction between citizens and public organizations. Other points to highlight are the network's ability to deal with the complexity of the modern world by being flexible and possessing properties that make them superior to the hierarchies and markets (Pollitt & Bouckaert, 2011: 20).

According to Koppenjan and Klijn (2004: 3), "Problems cannot be solved by organizations on their own. Therefore, the hierarchy as an organizing principle has lost much of its meaning. The model of the "solitary organization" that determines its policy alone is obsolete. (...) Equally obsolete is the image of the government at the apex of the social pyramid. (...) Horizontal networks replace hierarchies."

The networks expanded the participation of multiple actors in the decisions of public organizations. As Duarte (2007: 96) postulates, information, and communication technologies "reshaped the political sphere, whether transforming the standards of political discourse,

relations between representatives and represented, the citizen's access to the various niches of power "and at the same time strengthened "the relationship between information, knowledge, and citizenship" (Duarte, 2007: 108). Duarte (2007: 101) also reinforces that "participation is the indispensable component of the process of building citizenship and the ways of ensuring its realization represent, in today's society, characterized as knowledge, true strategic instruments for the development of a country." Today, the greatest competitive advantage of a country is the competence of its population in the production and use of knowledge.

Thus, from the perspective of public management, as occurred and occurs with the private sector, it was necessary to incorporate "networked society" as a functional and representative element to respond to this new, but irreversible, reality of relationship and interaction between the State and citizen. Like that, in this context, connectivity with citizens through the use of the Internet and social networks such as information tools, communication, services, transparency, and exercise of their citizenship, whether protesting, supervising, or voting became an inseparable part of the modern management structure in public administration.

## 1.5 Sustainability in the Governance model

According to Pollitt & Bouckaert (2011:22), central governance revindication is "making government more effective and legitimate, including a wider range of actors in policy formulation and implementation. Some varieties of governance explicitly rely on a "network approach," and most of them emphasize "horizontality" in relation to vertical controls."

The concept of governance is strengthened by its claim to represent a broader and inclusive concept of management and public administration rather than a "government" alone. However, this is not an alternative to the government, because the government remains one of its main constituent elements. From a governance point of view, the citizen recognizes the government only as another organization in a free market society (Stivers, 2009: 1095).

It is affirmed that good governance alludes to the orientation of society through networks and partnerships between governments, commercial companies, and civil society associations. In this way, it is strongly connected to the network model. One of the main theorists of the network defends the concept of "governance networks". Therefore, it is not right to interpret "governance" as a model that replaced the network model, but rather as a more comprehensive model that absorbed elements of it (Pollitt & Bouckaert, 2011: 21).

According to the definition of Pollitt & Bouckaert (2011: 21), "governance consists of distancing traditional hierarchical structures of organization and the adoption of network formats. It also provides a more participatory relationship between the State and civil society. Finally, governance is responsible for redirecting the monopoly of the statutory law of regulation and implementation to more flexible ways. Therefore, the State is expected to be flexible to be replaced by a "network system", where the authority is returned to specific task institutions, with unlimited jurisdictions and intersected associations operating at sub- and supranational levels".

When the administrative and political actions of the State reflect the equalization of the needs of the multiple active *players* of society, horizontally, expressing the democratic citizen manifestation of them freely, there is a significant development in the maturation of society in the active and responsible participation of the decisions of the State. It was worth that, in governance, sustainability, and solidarity, they became priorities in the definitions by the states of their public policies. Therefore, it is not wrong to say that governance was the reform that consolidated these concepts that have already developed, spontaneously, or forcibly, through social and environmental changes in previous reforms. A clear example of this was the adoption by the largest international organizations (United Nations, World Bank, OECD) of the concept of sustainability as a mandatory criterion for the definitions of global economic, political, social, and environmental development goals (Strange & Bayley, 2008: 20-29).

## **1.6 SSPAC –** contribution to the sustainability of the AP and proposal

According to Strange & Bayley (2008: 27), "the center of sustainable development is the need to consider "three pillars" together: society, the economy, and the environment." According to him, regardless of the context, the "basic idea remains the same - people, habitats and economic systems are interrelated." Sometimes this interdependence is neglected for years or decades, but history has shown that, one way or another, whether through alarm or crisis, we are reminded of it (Strange & Bailey, 2008: 27). As a rule, this occurs when you place the policy above management. But this is a problem that was born along with the AP and that does not constitute the core of this work.

It is in this sense that, in the SSPAC proposal for a PA model, self-sustainable development and solidarity are essential premises for the functioning of its integrated areas. This model considers sustainability in all its dimensions for all human grouping configurations, from the micro level to the macro level.

The dynamics of the functioning of SSPAC in dealing with collective demands rationally, practical and pragmatically - not neglecting the use of politics as a means and no end to the execution of its actions - allows creating self-sustaining social environments assuming that society, economy, and the environment are the constitutive elements of all human groupings, which are considered in all areas of the SSPAC.

Two basic forces act in the treatment of any collective requirements: management actions and policies. It is very important to always consider these two variables for the management of any collective requirements. Finding the balance of importance to them in the treatment of the creation of solutions for the collective needs of communities is fundamental to practice a modern public administration consistently and aligned with scientific evolution, technological

and social, adapting, even at a slow speed, to face the current challenges – social security, immigration, global warming – and at the same time, pave the way for the future of the next generations.

SSPAC is a proposal for a model of intelligent public management and administration that uses as basic premises and integrated strategic planning, management, technologies, and active citizenship for the treatment of collective (public) community requirements, aiming at human, social and social development in a self-sustaining and supportive manner.

SSPAC's management and administrative structures provide for the identification, planning, execution, and management of collective demands at local, regional, national, and international levels in an integrated manner and through the participation of all individuals and organizations from their respective geopolitical levels. What is expected as a result of the systemic approach to these needs is the creation of solutions that provide sustainable and solidary social, economic, and environmental development.

# CHAPTER II - The "SUSTENTACANITY IN PUBLIC MANAGEMENT": EVOLUTION OF THE CONCEPT

## **Sustainability and Public Management**

### 2.1. Evolution of the concept of sustainability

The term "sustainable" comes from Latin *sustain* (sustain, defend, favor, support, conserve, care).

In the early 1970s, Lovelock (1974: 1-10) caused a stir in the international scientific community with his "Gaia Hypothesis," which proposed that the biosphere and the physical components of the earth (atmosphere, cryosphere, hydrosphere, and lithosphere) they are closely integrated to form a complex system of interaction that maintains climatic and biogeochemical conditions preferably in homeostasis and that the pollutant gases emitted since the 1940s are accumulating in the northern hemisphere. The yellow signal of pollution emerged, and the word sustainability came out of the narrow circle of environmentalists, academics, and scientists, and was seriously considered by international organizations and governments, as it was clear that the relationship between economic development and the environment was not sustainable, for the time nor future generations (WCED, 1987: 18).

Therefore, organizations such as the United Nations, the World Bank, and the OECD called on governments, non-profit organizations, companies, and civil society to discuss and find the best way to establish a socio-economic model that, in addition to regenerating already exhausted natural resources, maintaining and increasing existing ones. To this, they have promoted studies, forums, and conferences, such as, Club of Rome (1968), United Nations

Conference on the Human Environment (1972), Brundtland Report (1987), ECO-92 - Conference on Environment and Development (1992), Kyoto Protocol (1997) and Rio+10 or World Summit on Sustainable Development (2002) that progressively developed the concept of sustainability and subsequently the concept of sustainable development. However, it was only in defining the goals of the Millennium Development Goals (2000) and the Sustainable Development Goals (2015) that the concept of sustainable development and governance merged.

# 2.2. Evolution of the Millennium Development Goals - MDGs and the Sustainable Development Goals - SDGs

### 2.2.1. Millennium Development Goals - MDGs

The UN envisioned the passing of the millennium as a symbolic milestone for the Organization's change of action. This was made clear in the recommendations of then-Secretary-General Kofi Annan in his Millennium Report, "We, the Peoples, the 21st Century United Nations." The Millennium Development Goals (MDGs) emerged from the United Nations Millennium Declaration adopted by the 191 member states on September 8, 2000. Created through an effort to synthesize international agreements reached at various world summits throughout the 1990s (on the environment and development, women's rights, social development, racism, among others), the statement addressed a series of concrete commitments that, if met within the deadlines set, according to the quantitative indicators that accompanied them, should improve the fate of humanity during this century.

Below, in Table 2. 1, the eight Millennium Development Goals, and originally the 18 targets and 48 indicators:(UNRIC Brussels, 2019)

**Table 2.1 - Millennium Development Goals** 

GOALS AND OBJECTIVES	INDICATORS
Goal 1	
Eradicate extreme poverty and hunger	
Meta 1.  Halve, between 1990 and 2015, the proportion of the population whose income is less than one US dollar per day	Proportion of the population with less than 1 dollar per day     Poverty gap index (incidence x poverty degree)     Part of the poorest fifth of the population in national consumption
Meta 2. Halving, between 1990 and 2015, the proportion of the starving population	Prevalence of children (under 5 years of age) with weight failure     Proportion of the population that does not reach the minimum level of dietary calorie intake
Goal 2.	
Achieving universal primary education	

Goal 2.	
Achieving universal primary education	
Meta 3.  Ensure that by 2005 all children of both sexes end a complete cycle of primary education	6. Net enrolment rate in primary education 7. Proportion of students who start the 1st year and reach the 5th 8th. Literacy rate of members aged 15 to 24

Goal 3.	
Promoting gender equality and the autonomy of women	
Meta 4.  Eliminate gender disparity in primary and secondary education if possible, by 2005 and at all levels of education by 2015 at the latest.	9. Why girls/boys in primary, secondary, and higher education 10. Ratio among illiterate men and women aged 15 to24 11. Percentage of employed women in the non-agricultural sector 12. Proportion of mandates occupied by women in the national parliament

<ul><li>13. Mortality rate of children under 5 years of age</li><li>14. Infant mortality rate</li><li>15. Proportion of 1-year-old children vaccinated against measles</li></ul>
Maternal mortality rate     Proportion of births assisted by qualified health personnel
18. HIV prevalence rate / AIDS among pregnant women aged 15 to 24 years 19. Contraceptive utilization rate 20. Number of children orphaned by AIDS
21. Malaria-related prevalence and mortality rates 22. Proportion of the population of risk zones using effective means of protection and treatment against malaria 23. Tuberculosis-related prevalence and mortality rates 24. Proportion of cases of tuberculosis detected and cured in the context of short-term treatments under direct surveillance

Goal 7. Ensuring environmental sustainability  Meta 9. Integrate the principles of sustainable development into national policies and programs and reverse the current trend towards the loss of environmental resources	25. Proportion of forest areas 26. Surface of protected land to maintain biodiversity 27. Gross Domestic Product (GDP) per energy unit consumed (energy income) 28. Carbon dioxide (per capita) emissions (These indicators add two figures related to global air pollution: Destruction D24 of the ozone layer and accumulation of gases that favor the warming of the planet)
Meta 10.  Halve by 2015, the proportion of the population without permanent access to drinking and healthy water	29. Proportion of the population with access to a better water source
Meta 11.  By 2020, achieving a significant improvement in the lives of at least 100 million inhabitants of degraded neighborhoods	30. Proportion of the population with access to improved sanitation conditions 31. Proportion of the population with access to housing occupancy security (The urban/rural distribution of some of the indicators mentioned above may be relevant to monitor the improvement of the situation of the inhabitants of degraded neighborhoods)

Goal 8.	
Create a World Partnership for Development (a³)  Meta 12.  Continue to implement an open, rules-based, predictable, and non-discriminatory multilateral trading and financial system (It includes a commitment to good governance, development, and poverty reduction – both at national and international level)	(Some of the indicators presented below will be evaluated separately in the case of less advanced countries (WFP), Africa, countries without leaving for the sea, and small island developing states). Public development aid.
Meta 13.	

Meeting the Special Needs of least-advanced countries (Includes: access to a duty-free regime and not subject to export quotas in less advanced countries; an enhanced debt reduction program of highly indebted poor countries and cancellation of official bilateral debt; and more generous development assistance concerning countries committed to the fight against poverty)	32. Net Public Development Assistance (ODA) as a percentage of gross national income from OECD member countries/Development Aid Committee (targets of 0.7% in total and 0.15% for WFPs) 33. Proportion of ODA for basic social services (basic education, primary health care, nutrition, healthy water, and sanitation)
Meta 14.  Meet the special needs of countries without access to the sea and small island developing states (through the Action Program for the Sustainable Development of Small Island Developing States and the conclusions of the twentieth second extraordinary session of the General Assembly)	34. Proportion of APD that is not linked 35. Proportion of ODA dedicated to the environment in small island developing states 36. Proportion of ODA dedicated to transport in countries without access to the sea Access to the markets
Meta 15. Addressing overall the debt problem of developing countries using national and international measures to make their long-term sustainable debt sustainable	38. Average rates of duties and quotas applied to agricultural, textile, and clothing products 39. Domestic agricultural and export subsidies in OECD countries 40. Proportion of ODA attributed to the strengthening of commercial capacity Sustained debt 41. Proportion of the bilateral official debt of the Poor Countries Many Indebted (PPME) annulled 42. Debt service as a percentage of exports of goods and services 43. Proportion of ODA provided as debt reduction 44. Number of countries that have reached decision-making and compliance points of the Initiative in favor of PPME
Meta 16. In cooperation with developing countries, formulate and implement strategies to enable young people to obtain decent and productive work	45. Unemployment rate of the population aged between 15 and 24 years
Meta 17.  In cooperation with pharmaceutical companies, providing access to affordable essential medicines in developing countries	46. Proportion of the population with access to essential medicines at affordable prices on a sustainable basis
Meta 18.  In cooperation with the private sector, making the benefits of new technologies accessible, in particular, information technology and communications	47. Telephone lines per 1000 inhabitants 48. Personal computers per 1000 inhabitants (Other indicators to be decided)

Source: Press release from the UN Department of Public Information.

## 2.2.1.1. The Millennium Development Goals as a precursor

The Millennium Development Goals were the result of a process that began in the 1990s and originated from the United Nations Millennium Declaration, adopted by the 191 member states on September 8, 2000. At first, it aimed to give priority support to developing countries for more effective development while guiding global and national policies in the period 2000 to 2015, particularly in the eradication of extreme poverty and hunger; promoting universal primary education; promoting gender equality and women's empowerment; reducing infant mortality; improving maternal health; combating HIV/AIDS, malaria and other diseases; ensuring environmental sustainability by developing a global partnership for development, with industrialized countries playing the role of funders of multilateral and national development agencies (Kanie & Biermann, 2017: 10-12).

Below, in Table 2.2, a summary of the achievements of the MDGs according to the United Nations report:(Millennium Development Goals (MDGs), 2010):

Table 2.2 - Millennium Development Goals

	Facts and numbers	Progress of countries
MDG 1 ERADICATE HUNGER AND EXTREME POVERTY		
Halving between 1990 and 2015, the percentage of people whose income is less than one dollar per day.  Achieving full employment and ensuring that all people, including women and young people, can find decent and productive work.  Halved between 1990 and 2015, the percentage of the starving population.	In 2005, 1.4 billion people – a quarter of the developing world's population – were living below the threshold of international poverty, with less than \$1.5 billion a day at 2005 prices. In 1990, there were 1.8 billion poor people.  Progress has been unequal in the various regions. The poverty rate in East Asia fell from 60% to 16% in these 15 years; on the contrary, it remained above 15% in sub-Saharan Africa, although there has been some progress since 1999.  In 2009, there will be about 55 to 90 million more people living in extreme poverty than was projected before the economic and financial crisis.  Between 1998 and 2008, the number of poor workers in the world – workers living with their families with less than \$1.25 per day – decreased from 944 to 632 million, or from 38% to 21% of the total number of workers. But due to the economic and financial crisis, this figure is estimated to increase by 215 million in 2009.  The number of people in developing countries with vulnerable jobs could increase by 110 million in 2009 compared to 2008, reversing the encouraging trends of the last decade.  Worldwide, the number of hungry people increased from 842 million in 1990 to 92 to 1.02 billion people in 2009.	Between 2001 and 2007, Nigeria's Special National Food Safety Program helped double farmers' production and incomes.  Thanks to an intermediate consumption subsidy program, Malave managed to obtain a 53% food surplus in 2007 after recording a national food deficit of 43% in 2005.  Vietnam's investment in agricultural research and extension helped reduce by more than half the prevalence of hunger and children with weight failure – from 28% in 1991 to 13% in 2005.  Nicaragua reduced hunger in the country by more than half, from 52% in 1991 to 21% in 2004-05.  In northeastern Brazil, nutritional hypotrophy, an indicator of malnutrition, decreased from 22.2% to 5.9% between 1996 and 2006-07.  Between 1991 and 2004, the number of people suffering from malnutrition in Ghana decreased by 74% to 9% of the population.

	Facts and numbers	Progress of countries
MDG 2		
ACHIEVING UNIVERSAL PRIMARY EDUCATION		
Ensure that by 2015 all children of both sexes end a complete cycle of primary education.	In developing regions, net schooling in primary education reached 88% in 2007, compared with 83% in 2000.  The net schooling rate in primary education was 74% in sub-Saharan Africa, with an increase of 16 percentage points since 2000.	In Ethiopia, the net schooling rate in primary education was 72.3% in 2007, an 88% increase over 2000 schooling rates.  In Tanzania, the abolition of tuition fees in 2001 had a 98% schooling rate in a primary school in 2006. This represents an increase of 97% (i.e. almost double) compared to 1999.

	Facts and numbers	Progress of countries
MDG 3 PROMOTING GENDER EQUALITY AND WOMEN EMPOWERMENT		
Eliminate gender disparities in primary and secondary education if possible, by 2005 and at all levels by 2015 at the latest.	Gender disparities in primary schooling have decreased to a proportion of 95 girls per 100 boys in developing countries, i.e. an improvement of 4 percentage points since 1999.  The proportion of women with a seat in the national parliament increased to 19% in 2009, an improvement of 6 percentage points since 1999.	In Mexico, the "Opportunities" conditional money transfer program in rural areas has produced an increase in secondary schooling rates of more than 20% in the case of girls and 10% in the case of boys.  In 2008, Rwanda elected a majority of women (56%) for the lower house of its parliament, the highest percentage of female representation in any country.

	Facts and numbers	Progress of countries
MDG 4 REDUCING INFANT MORTALITY		
Reduce the mortality rate of children under five years of age by two-thirds between 1990 and 2015.	In developing regions as a whole, the mortality rate of under-fives fell from 99 deaths per 1,000 live births in 1990 to 72 in 2008. This corresponds to a decrease of 28%, which is far below the target of a two-thirds reduction.  Since 1990, child mortality rates have decreased by more than half in North Africa, East Asia, Southeast Asia, and Latin America, and the Caribbean.  The mortality rate of children from sub-Saharan Africa decreased by 22% between 1990 and 2008.  Almost a third of the 50 least advanced countries have been able to reduce their mortality rates of under-fives by 40% or more since 1990.  Measles deaths in Africa decreased by 91% between 2000 and 2006, from approximately 396,000 to 36,000, meaning that the United Nations' goal of reducing measles deaths by 90% was reached four years earlier.	The mortality rate of children under five has decreased by 40% or more since 1990 in Eritrea, Ethiopia, Malawi, Mozambique, and Niger. In Malavi, for example, the mortality rate of under-fives fell by 52% between 1990 and 2008.  In Bangladesh, Bhutan, Bolivia, Eritrea, Laos, and Nepal, the mortality rate of under-fives has decreased by 50% or more since 1990.  In China, since 1990, the mortality rate of under-fives has decreased from 45 deaths per 1,000 live births to 21 per 1,000 in 2008, a 53% reduction.

	Facts and numbers	Progress of countries
MDG 5 IMPROVING THE MATERNAL HEALTH OF CHILDREN		
Reduce the maternal mortality rate by three quarters.  Achieving universal access to reproductive health.	In developing regions, maternal mortality only decreased slightly from 480 deaths per 100,000 live births in 1990 to 450 deaths per 100,000 live births in 2005.  East Asia, North Africa, and Southeast Asia recorded decreased maternal mortality by 30% or more between 1990 and 2005. In Sub-Saharan Africa, very little progress has been made.  The proportion of births assisted by qualified health technicians in developing regions increased from 53% in 1990 to 61% in 2007.  Since the 1990s, the proportion of pregnant women from developing regions who have been examined at least once before delivery has increased from 64% to 79% in 2007.  Contraceptive use has increased in all developing regions. In 2005, 62% of women married or who lived in de facto unions used some kind of contraception, compared to 50% in 2000.  Contraceptive prevalence almost doubled in sub-Saharan Africa between 1990 and 2005 – but this region continues to be lagging because only 22% of all married women or living in de facto unions use a contraceptive method.	Honduras reduced the maternal mortality rate by 40% – from 182 to 108 deaths per 100,000 live births between 1990 and 2005.  In Malawi and Rwanda, the elimination of moderation rates paid by users of family planning services has contributed to significant increases in the use of such services.  In Rwanda, contraceptive prevalence increased from 10% in 2005 to 26% in 2008.  In Malawi, contraceptive prevalence has more than tripled since 1992, has increased to 33% in 2004.

	Facts and numbers	Progress of countries
MDG 6 COMBATING HIV/AIDS, MALARIA AND OTHER DISEASES		
By 2015, stop and begin to reduce the spread of HIV/AIDS.	Worldwide, the new rate of HIV infection decreased from a peak calculated by 3.5 million in 1996 to 2.7 million in 2008, a decrease of 30%.	In Uganda, the HIV prevalence rate among adults fell from 15% in the early 1990s to 5.4% in 2007.
Ensure, by 2010, universal access to HIV/AIDS treatment to all the people who need it.	Sub-Saharan Africa remains the most affected region. 67% of all people living with HIV live in this region, and with 1.9 million new infections in 2008, it is in sub-Saharan Africa that 70% of all new infections occur.	Cambodia was able to halt and reverse the spread of HIV, with prevalence down from 3% in 1997 to 0.8% in 2007.
By 2015, detain and start reducing the incidence of malaria and other serious diseases.	The number of AIDS-related deaths is estimated to peak in 2002, the year 2.2 million deaths occurred. Since then, it has declined to 2 million in 2008.  In December 2008, in middle and low-income countries, antiretroviral therapy was being given to approximately 42% of the adults and children (4 million people) who needed it, compared to 7% in 2003.  In December 2008, in sub-Saharan Africa, antiretroviral therapy was being given to 44% of the adults and children (3 million people) who needed it. Five years earlier, treatment coverage in this region was only 2%.  Currently, antiretrovirals are within the reach of all free of charge, thanks to the efforts of national governments and the World Fund to Fight AIDS, Tuberculosis, and Malaria.  Worldwide, coverage of services to prevent the transmission of HIV from mother to child increased from 10% in 2004 to 45% in 2008. In sub-Saharan Africa, 45% of HIV-positive pregnant women received antiretroviral drugs in 2008, compared with 10% in 2004.  In 2008, 31% of African households had a mosquito net treated with insecticide to fight malaria, an increase of 14 percentage points since 2006.	The number of new HIV infections among children fell to almost a fifth in Botswana, having decreased from 4,600 in 1999 to 890 in 2007.

	Facts and numbers	Progress of countries
MDG 7 ENVIRONMENTAL SUSTAINABILITY		
Integrate the principles of sustainable development into national policies and programs and reverse the current trend towards the loss of environmental resources.  Reduce biodiversity loss and, by 2010, achieve a significant decrease in the loss rate.  Halving, by 2015, the percentage of the population without permanent access to drinking water and basic sanitation.  By 2020, considerably improve the lives of at least 100 million people living in degraded neighborhoods.	The world is well underway about achieving the goal of drinking water. However, 884 million people worldwide continue to use unimproved water sources.  In 2006, 2.5 billion people – more than 37% of the world's population – did not have access to improved sanitation facilities, latrines, or other types of sanitation.  The proportion of people who lived without access to better sanitation decreased by only 8 percentage points between 1990 and 2006.  1.2 billion people in the world practice open-air defecation, which poses enormous dangers to the health of entire communities; 87% of these people live in rural areas.	Between 1999 and 2005, Costa Rica prevented the loss of 720 km² of forest in priority areas for biodiversity conservation and avoided the emission of 11 million tons of carbon.  In 2004, 75% of Ghana's rural population had access to drinking water, representing a 92% increase over 1990 levels.  In Mali, the proportion of urban and rural populations with at least one point of access to better sanitation increased from 55% in 1998 to 84% in 2002.  Guatemala increased its investment in water and sanitation resources, which contributed to an increase in access from 79% in 1990 to 96% in 2006.  South Africa was able to reach the MDG's goal of halving the proportion of people without access to drinking water, which fell from 40% in 1994 to 19% in 2006.  In Senegal, the proportion of people living in cities with access to water supply services increased from 74%-81% in 1996 to 98% in 2006.

	Facts and numbers	Progress of countries
MDG 8 WORLD PARTNERSHIP		
Continue to create an open, rules-based, and non-discriminatory commercial and financial system.  Meet the special needs of the least advanced countries, landlocked countries, and small island developing states.  Addressing the debt problems of developing countries globally.  In cooperation with pharmaceutical companies, provide access to affordable essential medicines in developing countries.  In cooperation with the private sector, make it accessible to all the benefits of new technologies, especially in the areas of information and communications.	Public development aid increased to US\$ 119.8 billion in 2008, compared with \$103.5 billion in 2007, an increase of 16% in real terms compared to 2007.  The proportion of imports from developing countries admitted to duty-free developed countries increased from 54% in 1996 to almost 79% in 2007.  The proportion of imports from developing countries admitted to duty-free developed countries increased from 70% in 2000 to almost 80% in 2007.	In 2008, the only countries that had reached or exceeded the target of increasing public development aid to 0.7% of the gross national product were Denmark, Luxembourg, the Netherlands, Norway, and Sweden.

Sources: United Nations Regional Information Centre (UNRIC).

However, the 1,000 Development Goals have faced several criticisms, including gaps in achievement levels between objectives and between regions, inability to articulate global targets and national and local priorities, addressing issues primarily related to developing countries, and, mainly, the lack of inclusion of issues such as human rights, equality, and effectiveness of governance, where the measurement of progress is difficult or controversial. Another recurring criticism of the MDGs was how indicators and benchmarks were developed by the UN Secretariat, regardless of member states and that many of the goals achieved, especially economic and poverty, we're much more depending on the expansion of emerging economies during the period covered by it, especially in China (Kanie, Bernstein, Biermann, & Haas, 2017: 10-12).

The great lesson learned from the experience of the MDGs was the need to use a technical approach in the definition of metrics and indicators of monitoring and measurement of the results obtained concerning the commitments proposed in the global agendas and the greater integration of the three dimensions of sustainable development (economic, social and environmental) through programs and policies focused on social issues and, particularly, social protection systems (Earth Summit 2002, 2002: 1-3). This experience gained was extremely useful for defining the metrics and indicators of the Sustainable Development Goals (Kanie, Bernstein, Biermann, & Haas, 2017: 20).

#### 2.2.2. Sustainable Development Goals - SDGs

The most ambitious goal and the biggest challenge of all Agendas.

As United Nations Secretary-General Ban Ki-moon said, agenda 2030 "is an action plan for people, the planet and prosperity. It also seeks to strengthen universal peace in greater freedom. We recognize that eradicating poverty in all its forms and dimensions, including extreme poverty, is the biggest global challenge and an indispensable requirement for sustainable development. All countries and stakeholders, working in a collaborative partnership, will implement this plan. We are determined to free humanity from the tyranny of poverty and we want to heal and protect our planet. We are determined to take the bold and transformative steps that are urgently needed to change the world to a sustainable and resilient path. As we embark on this collective journey, we promise that no one will be left behind. The 17 Sustainable Development Goals and 169 goals we are announcing today demonstrate the scale and ambition of this new universal Agenda. They seek to build the Millennium Development Goals and conclude what they have not achieved. They seek to realize the human rights of all and achieve gender equality and the empowerment of all women and girls. They are integrated and indivisible and balance the three dimensions of sustainable development: economic, social, and environmental (United Nations, 2016: 1)".

Such a set of objectives and goals demonstrates the scale and ambition of this new Universal Agenda. The approved SDGs were erected on the bases established by the Thousand Development Goals (MDGs), to complete their work and respond to new challenges. They are integrated and indivisible and mix, in a balanced way, the three dimensions of sustainable development: economic, social, and environmental.

Approved at the United Nations Summit on Sustainable Development (September 25-27, 2015), the implementation of the SDGs will be a challenge, which will require a global partnership with the active participation of all, including governments, civil society, the private sector, academy, media, and United Nations (United Nations, 2016: 1).

The construction of the 2030 Agenda began in June 2012, with the Rio + 20 Conference on Sustainable Development, based on the Millennium Goals, but including issues such as natural resource management, sustainable consumption and production, effective institutions, good governance, the rule of law and peaceful societies. The reports of the Open Working Group on Sustainable Development Goals and the Intergovernmental Committee of Experts in Sustainable Development Financing formed the basis of the final Agenda package, through a series of intergovernmental negotiations in partnership with large groups and stakeholders, ensuring the widest possible participation for this new Agenda (United Nations, 2015: 3).

Discussions for the preparation of the document "Transforming Our World: The 2030 Agenda for Sustainable Development" lasted more than three years, involving heads of government and state and, finally, approved by consensus. The Agenda is an action plan for people, the planet, and prosperity. The actions of agenda 2030 and the SDGs are based on five axes of operation, also known as five "P´s": planet, people, peace, prosperity, and partnerships (United Nations, 2015: 3).

According to the United Nations (2015: 3), "it seeks to strengthen universal peace with more freedom, and recognizes that eradicating poverty in all its forms and dimensions, including extreme poverty, is the greatest global challenge to sustainable development." The Agenda consists of 17 objectives, 169 goals and 230 global indicators, a section on means of implementation and global partnerships, and a framework for monitoring and review. Below in Figure 3 the 17 objectives:

Figure 2.1 – The 17 Sustainable Development Goals



Source: https://www.un.org/sustainabledevelopment/news/communications-material/

The Sustainable Development Goals mark a historic shift for the United Nations towards a "sustainable" development agenda after a long journey of attempts to integrate social development with environmental sustainability. They also mark the most ambitious effort to put goal setting at the heart of global governance and policies. The agenda is not simply a continuation of unfinished elements of the Millennium Development Goals, but rather a step forward in proposing integrated actions that can address the complexity of economic, social, and planetary growth in the 21st century (Kanie & Biermann, 2017: 2).

The convergence of the concept of governance in the mechanisms for defining the objectives and goals of the Sustainable Development Goals was a watershed in the sense of recognizing and establishing governance as a premise for government actors develop public policies, such as laws, policies and regulations; planning practices, rules systems and procedures at sub-national levels; and certain actions of non-governmental actors, such as standards established by civil society networks or public-private partnerships, using, for this, the mechanisms for identifying issues, setting agendas, collecting and processing of information, negotiation, definition of political goals and their implementation and monitoring, which are part of governance, provides governments, international organizations and non-governmental actors to view the actions necessary for the materialization of SDGs, in a

systemic, planned and organized way, optimizing the structuring and execution of public budgets much more effectively and, consequently, more sustainable (Kanie & Biermann, 2017: 75).

The SDGs in practice is strategic, technical, pragmatic, and integrated actions - endorsed by the international community through United Nations Organizations - to address the great challenges that our species has faced, such as, climate change, migration for political, humanitarian, and climate reasons and twin revolutions in information technology and biotechnology that together can soon expel billions of human beings from the labor market (Harari 2015: 75) not only at the local, national and regional level, but also global, and assuming that the responsibility is everyone' responsibility, putting for the first time the human being at the heart of the issues, both as an active agent of economic, social and environmental transformation, and beneficiary achieving the Sustainable Development Goals (Kanie & Biermann, 2017: 75).

#### **CHAPTER III - METHODOLOGY**

The ambition and scope of this project work required, throughout its construction process, constant surveillance and discipline so that, through sound and coherent arguments, the feasibility and actual applicability of SSPAC are proven as a sustainable and supportive model of management and public administration.

For this purpose, the descriptive research method was used to analyze the evolution of human behavior in the management and administration of its collective requirements, relating it to administrative reforms, the evolution of the concepts of sustainability and solidarity, and the use in public administration of management tools and information and communication technologies, starting from a bibliographic review composed of the main authors, anthropologists, sociologists, administrators and economists in the areas. The purpose is to identify in the past and present, regardless of context, environmental, anthropological, sociological, technological, scientific, political and economic characteristics that have produced and produced management and administration systems public collective requirements in a sustainable and supportive manner, under the specific conditions of groups, tribes, villages, communities, cities, and nations, and associate them with the structural foundations of the SSPAC functioning.

For this, the research was based on studies by authors, such as Weber (1978), Osborne & Gaebler (1993), March & Olsen (1989), Pollitt & Bouckaert (2011), Castells (2010), Drechsler (2009), Strange & Bayley (2008), Harari (2015), among other thinkers relevant work on this subject.

As an empirical object, the Nordic countries and their public policies of social welfare and active citizen participation were analyzed, and the international experiences of participatory budgeting and the development of integrated business production chains.

Based on the concepts presented by the authors of the areas, sociology, anthropology, sociology, administration, and economics, the work will analyze the profile of these empirical objects, understanding all the work that was developed in the search for management and sustainable and supportive public administration. For this, a documentary search was required. The study will have an essentially qualitative character, with emphasis on observation and documentary study, while it will be necessary to cross the surveys with all the bibliographic research already done.

Table 3.1 – Objectives and methodologies				
Goals	Methodologies			
O1: Analyze the concept of sustainability in the different theoretical models and evolution to the present day.	<ul> <li>Bibliographic review (articles, books, manuscripts, theses, and dissertations).</li> </ul>			
O2: Analyze the concept of sustainability and the main lessons of the MDGs().	<ul> <li>Reports from the United Nations, World Bank, UNICEF, OECD, etc</li> </ul>			
O3: Identify the congruent elements of administrative reforms and the evolution of the concepts of sustainability and solidarity.	- Bibliographic review.			
O4: Empirical analysis of information and communication management and technology tools used in the routines of management and public administration.	- Bibliographic review.			
O5: Proposal for SSPAC management and public administration model.	- Author: Johnny Camello			

### CHAPTER IV - EMPIRICAL ANALYSIS: PROPOSAL OF AN IDEAL MODEL FOR **INTEGRATED SUSTAINABILITY (SSPAC)**

Over the past five decades, we have experienced remarkable environmental, economic, political, technological, and social experiences that have forced society and collective organizations (States, companies, NGOs, and International Organizations) to discuss the model ideal economic efficiency to achieve "meet the needs of the present generation without affecting the possibility of future generations to supply their " (WCDE, 1987: 18).

In the 1970s and 1980s, society began to understand that the environmental issue should not be an exclusive concern for environmentalists, academics, and scientists, but rather an issue that required an urgent change in the paradigm and economic model practiced so far, linear. The conviction that the linear economic model and the American Way of Life was ideal for everyone, as it fueled the dream of consuming a middle class eager for cars, appliances, and homeownership, retreated when the planet began to show signs of exhaustion and whether realized that the future of the next generations was compromised.

This was essential for states, companies, non-governmental organizations - such as the United Nations and the World Bank - to understand that the environmental issue was not just a problem of some, but of all, that could only be addressed through the structuring and implementing sustainable public policies at a global level. As set out in Chapter II, this change of perception, not only on the part of organizations but also of the whole society itself, was fundamental for the holding of international forums and conferences, State Summits, international and international agreements, which developed the concepts of sustainability and solidarity and which were the basis for the definition of the Sustainable Development Goals (SDGs), approved at the United Nations Summit on Sustainable Development in the period 25 to 27 of September 2015.

In the 1990s, a real silent revolution occurred, caused by the mass commercialization of internet access worldwide. This has radically changed society's ability to access information, communicate, and do business. Companies and governments have set their trade and policy strategies at a global level. This new global vision of action promoted greater economic globalization of modern times and the shift of industrial and service production from developed countries - the United States, the European Union, and Japan - to developing countries, such as Brazil, Russia, India, and China (BRIC's), promoting economic growth and the decline in global poverty.

On the other hand, globalization promoted the deindustrialization of entire local sectors, such as the textile and footwear sector in Spain and Portugal, and car production in the United States, leading to unemployment and a drastic drop in reserves in the United States. States, because the service sector was unable to absorb the labor provided by industries that transferred their production to countries such as China and Mexico, and services such as technical call center support to India.

It was clear that for the city and citizens of Detroit in the United States, the thousands of jobs defunct were much more important with the transfer of production from general motors' local unit to Mexico than the company's shareholder gains with the reduction of production costs using Mexican labor. And that the Spaniards, by consuming Zara products produced in China, helped generate jobs in the Asian country and not in Spain.

Another downside of globalization was the fiscal imbalance of states caused by the extinction of millions of jobs. States were not prepared for the sharp drop in their revenues caused by job losses and many went bankrupt, being bailed out by the International Monetary Fund or, in the European case, by loans from the European Central Bank.

In 2008, the global economic crisis showed drastically and mercilessly that, in the same way, that globalization has provided the transformation of the world into a "global village" to communicate and do business, the integration of global financial markets, as well as the elimination by geographic distance technology, exposed the vulnerability of the international financial system concerning the contagion of financial crises. Just a week after the bankruptcy filing of U.S. bank Lehman Brothers, what was a local crisis in the United States had already become an international financial crisis.

Globalization was extremely positive in connecting people and markets through a single click, establishing a greater balance of power between the world's major powers and contributing to the reduction of hunger. However, from a broader perspective, the macroeconomic strategy has therefore failed to disregard local requirements and seek to establish public policies that provide a sustainable and integrated economic ecosystem, it has extinguished what was the health of local societies: jobs.

#### 4.1 The New Globalization

After these decades of change, it is possible to come to two conclusions: to recognize that we are at a time of profound structural and behavioral transformations, during a new event of globalization and that we do not know how to deal with all these transformations at the speed at which they occur.

According to Schwab (2018: 3-4), "globalization 4.0 is just beginning, but we are already very unprepared for this. Clinging to an outdated mindset and tinkering with our existing processes and institutions will not work. Instead, we need to rediscover them from scratch, so that we can take advantage of the new opportunities that await us, avoiding the kind of interruption we are witnessing today. As we develop a new approach to the new economy, we must remember that we are not playing a zero-sum game. It is not about free trade or protectionism, technology or employment, immigration or citizen protection, and growth or equality. These are all false dichotomies, which we can avoid developing policies that favor "and" over "or", allowing all sets of interests to be pursued in parallel."

A set of trends marks this new globalization, including the fragmentation of the global order, the expansion of individual power, and the fourth industrial revolution that quickly redefines the way we produce, consume, communicate and guarantee human well-being, creating radically

new demands on public policy and business performance, while modifying the way to deliver both (Schwabb, 2018: 3-4).

Therefore, according to Kostakopoulou (2008: 2), "it is not easy to reconcile challenges and problems of the 21st century with 20th-century resources and 19th-century models." Tackling the biggest challenges our species has ever encountered, which are: climate change, sustainable and supportive economic growth, and twin revolutions in information technology and biotechnology, (Harari 2018: 16) will only be possible if future-oriented stakeholders create a community of shared interest and ultimately a shared purpose (Schwab, 2018: 4), using a model of management and administration of collective (public) requirements that coordinate an economic, political and social ecosystem that guarantees the supply of the needs of the present generation without affecting the possibility of future generations to supply their (WCED, 1987: 18).

#### 4.2. The SSPAC

SSPAC is a model of management and public administration, above all, evolutionary. It is based on the shoulders of the great men and women who have so far dedicated their lives to the production of academic, scientific, and empirical knowledge in the areas of anthropology, ecology, sociology, economics, technology, politics, planning and management, and administration, and thus contributed to the evolution of sustainable and supportive Management and Public Administration. When grouped they become representative administrative management organizations such as villages, villages, districts, municipalities, cities, states, and nations. Thus, the positive empirical elements resulting from the administrative reforms of the past can be used as structural beacons, together with the evolution of multidimensional concepts of sustainability and solidarity, and to adapt them by methodological sequence, in particular at the level of financial, managerial, technological, material and human resources of the present in a planned, systemic, pragmatic, integrated, flexible, sustainable and supportive manner for the processing of collective (public) requirements by organizations (States, companies and NGOs, and International Organizations).

#### Integrated strategic areas

#### Strategic Planning

- Territory, Population, and Representativeness;
- Collective Demands (Legal Regulations, Services, and Public Equipment);
- Regional and Digital Participatory Budget;

- Complementary Chains of Products and Services;
- Education.

#### Management

- · Project and Program Management;
- KPI's management
- Collective Control:
- Accountability;
- Big data

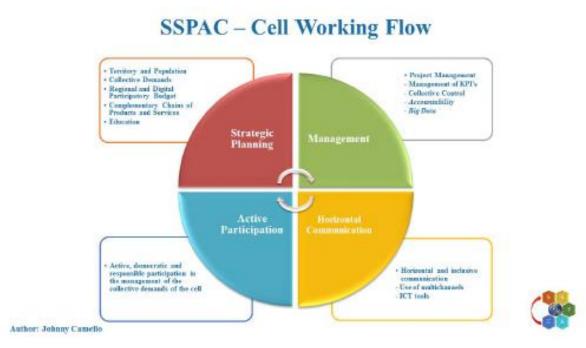
#### **Horizontal Communication**

- Horizontal and inclusive communication;
- Use of multi-channels;
- ICT tools;
- Feedback in real time.

#### **Active Participation**

 Active, democratic participation and held accountable in the management of collective demands of cells.

Figure 4.1 – Integrated strategic areas



#### 4.2.1. Strategic Planning in the Public Sector

According to Poister (2010: 247), "strategic planning is concerned with the formulation of strategy. In the long run, its goal is to promote strategic thinking, act, and learn continuously." Bryson (2004: 3) in his work on strategic planning in the public and non-profitable sectors, defines strategic planning as "a set of concepts, processes, and tools to shape what an organization (or another entity) is, what it does and why she does it." And for Vieg (1942: 67-68), "planning should be directed to action."

Thus, at SSPAC, strategic planning proposes the structuring of the "large photo" similar to what happens in a puzzle, which, according to Poister (2010: 247), "combines futuristic thinking, objective analysis and subjective evaluation of values, goals, and priorities to draw up a future direction and action courses to ensure the vitality, effectiveness, and ability of an organization to add public value" to the management and administration of collective demands.

#### 4.2.1.1. Territory and Population - Integrated Decentralization - Community Sentiment

"Millions of years of evolution have designed us to live and think as members of a community." (Yuval Noah Harari, 2011: 367)

The modern State promotes the reversal of the dynamics of the creation and application of public policies. Instead of being top-down and vertical, it becomes bottom-up and horizontal in a decentralized way, and promotes greater freedom of action and pluralism in Management and Public Administration, empowering citizens to make decisions concerning their interests and collective requirements, strengthening democracy and cost-effectiveness management (Amaral, 2010: 696).

Another important issue is the approximation of population services, consolidating the Principle of The Pursuit of the Public Interest and the Principle of Subsidiarity which is strongly promoted by the European Union as a practice of good governance for the resolution of the requirements put forward by citizens. According to Caupers (1994: 244), "decentralization brings the public administration closer to citizens, favoring local initiatives, increases social ties and fosters its sensitivity to citizens' problems and their needs".

According to Reigado (2000: 177), "decentralization promotes development at a time when sustainable development should be implemented based on a determined philosophy for a conception of the global problem, it is necessary to achieve proposals from all levels of decision, according to the Subsidiarity Principle, until it reaches the local scale. This should be systematically recognized by recognizing the sociocultural peculiarities of each human leaf, by which no univocal or exportable formula guarantees referral to sustainable development."

#### 4.2.1.1.1. Self-sustaining integrated decentralized performance

There is a Buddhist proverb that says: instead of wanting to cover the world with carpets, wear sandals. In medicine, there is a maxim that refers to that healthy cells form a healthy body. Similarly, SSPAC advocates, through its pragmatic systemic methodology, that to achieve self-sustaining global Public Management and Administration, local, regional, and national collective organizations (States, companies, NGOs) are needed self-sustaining. That is why this proposal is organized and operationalized on decentralized management, administrative and representative platform that fosters and implements public policies from the site to the global in an integrated manner.

#### 4.2.1.1.2. Small intimate groups that form intimate communities

For millions of years, humans have adapted to live in small flocks of no more than a few dozen people and developed social instincts that have provided our ancestors to establish friendships and hierarchies and hunt or fight together, adapted only for small intimate groups. After the Cognitive Revolution, intimacy among individuals helped *Homo* Sapiens form larger and more stable flocks. (Harari, 2014: 43).

Sociological research has shown that the maximum "natural" size of a closely united group is more or less than 150 individuals. Most people can neither know intimately nor interact effectively with more than 150 human beings (Harari, 2014: 43). Nowadays, with the advent of social media, for most of us, it is impossible to know more than 150 individuals, no matter how many friends on Facebook we pride ourselves on having.

Therefore, a primary self-sustaining public administrative cell is comprised of one hundred and fifty individuals, and when grouped with others, it is part of integrated local, regional, national, and international cells. The goal is for small groups to communicate and interact actively, thus creating not only social but affective bonds as well. This feeling of belonging strengthens the group as a whole in the search for projects and solutions for their collective demands.

#### 4.2.1.1.3. Representativeness

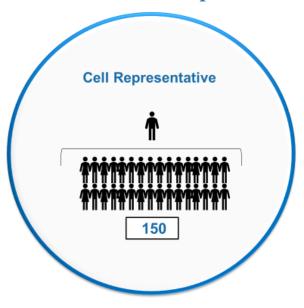
Each cell has the right to elect, through universal suffrage, a representative, and an alternate (Figure 2). For each grouping of one hundred and fifty cells, a representative and a regional

alternate (Figure 3) is elected. And for each grouping of twenty-two thousand five hundred cells, a representative and a national alternate is elected (Figure 4). Finally, national representatives elect an international representative and alternate (Figure 5). All for a one-year term entitled to re-election four times in a row.

The mission of representatives is to coordinate and manage the collective (public) interests and demands of cells in the dynamics of the four integrated areas of SSPAC - Strategic Planning, Management, Horizontal Communication, and Active Participation – through local, regional, national, and international participatory assemblies. They are the active actors and materializers of cell activities.

Figure 4.2 - SSPAC: Cell representative

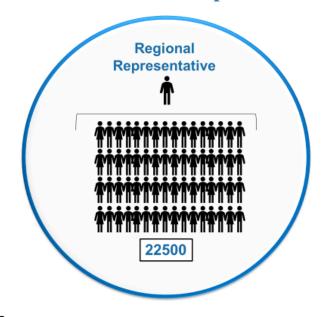
SSPAC - Territorial and Population Platform



Author:Johnny Camello

Figure 4.3 - SSPAC: Regional representative

## SSPAC - Territorial and Population Platform

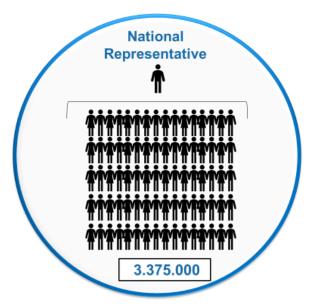


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Figure 4.4 - SSPAC: National representative

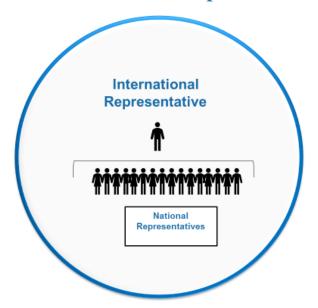
## SSPAC - Territorial and Population Platform



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Figure 4.5 - SSPAC: linternational representative

SSPAC – Territorial and Population Platform





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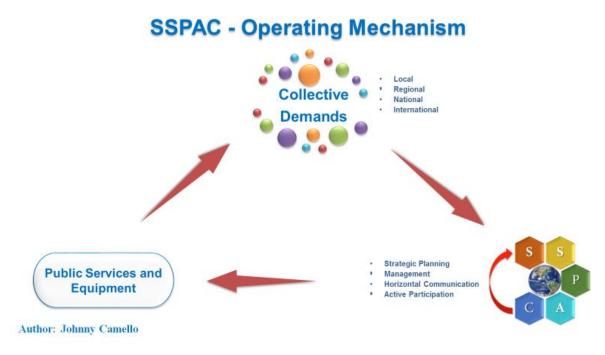
#### 4.2.2. Multidimensional collective demands

What is a public collective demand? It is the sum of the individual demands of citizens for public services and appliances, financed through the apportionment of their costs (taxes), among the individuals who make up this social nucleus. Demands can be current, strategic, or emergency. Short, medium, or long term. Local, regional, national, or international (Figure 6). Integrated or isolated at a geopolitical level. In the structural aspect, they are always multidimensional and processed by organizations (State, NGOs, and private companies), responsible for producing and delivering to their funders, citizens, services, and public equipment requested.

Table 4.1 - Multilevel Strategic Planning Dynamics

Multidimensional Collective Demands						
Location	Local	Regional	National	International		
Priority	1	2	3	4		
Term	Short	Short	Short	Short		
	Middle	Middle	Middle	Middle		
	Long	Long	Long	Long		
Integrati	Global Multilevel Integration					

Figure 4.6 - Operating Mechanism - SSPAC



Author: Johnny Camello

At SSPAC, the mechanism for processing collective demands – identified and prioritized in participatory budgets – are assimilated technically and financially in strategic planning and transformed into projects and programs for the production and delivery of public services and equipment at a local, regional, national and international level according to the ability of each geopolitical level of allocation of financial, technical, material and human resources.

#### 4.2.3. Participatory Budget (PB)

"Participatory Budget: Next-generation democracy" (Participatory Budgeting Project, 2016)

The Participatory Budget (hereinafter PB) originated in Brazil in the 1980s, and in particular, the model created in the city of Porto Alegre in 1989, over time, emerged as an example and reference of democratic innovation and a public management tool, both nationally and internationally. The model of the OP of Porto Alegre has had a wide impact on the national and international scenario, either for its pioneering in the construction of a complex mechanism of political dialogue with the population, either for its success concerning continuity throughout the Time. More or less inspired by the Porto Alegre model, hundreds of municipalities in the country and abroad adopted the OP. (Luchmann, 2014: 168)

Today, it is estimated that more than 3000 municipalities worldwide promote PB as an important instrument of participatory democracy (Participatory Budgeting Project, 2016: 9).

According to Luchman (2014: 171), "Porto Alegre's original model inspired the development of a PB concept that incorporated some of the central premises of participatory and deliberative theories of democracy, to the extent that it established new relations between civil society and the State, which were structured by a set of rules and procedures aimed at political inclusion and the promotion of social justice."

Participatory budgeting is now internationally recognized as an innovative practice of participatory democracy and a tool of public management and its use refers to different social, political and demographic contexts around the world; it is recognized by international organizations such as the UN and the World Bank as a practice of good governance and popular participation and has been adapted to the particular contexts of each city and organization thus hindering its theoretical, typological and conceptual framework (Mancuso, 2004: 13-14).

Comparative studies on an international scale by Sintomer, Herzberg, and Röcke (2008:168) – to build a standard – have established a methodological definition that includes a minimum set of criteria or requirements necessary to identify an experience such as PB according to Table 4.2 below:

#### Table 4.2 – Criteria and requirements needed for a PB experience

- a) The financial and/or budgetary dimension should be discussed; participatory budgeting deals with scarce resources;
- b) The municipal level must be involved or, then, at least one district (decentralized) with an elected representative body and some power in the public administration (the neighborhood scope is not sufficient);
- c) The procedure should be recurrent (a single meeting or referendum on financial issues are not examples of participatory budgeting);
- d) The process should include some form of public deliberation in the context of specific meetings/forums (the opening of administrative meetings or classical representative bodies for "ordinary" citizens is not the participatory budget);
- e) There must be some degree of accountability concerning the results.

Source: From Porto Alegre to Europe: Potential and Limitations of Participatory Budgeting, Sintomer, Herzberg, and Röcke (2008: 168).

Other characteristics observed in the various experiences of PBs around the world were the benefits. There was the strengthening of democracy, the increase in transparency and efficiency, awareness of people about spending, promotion of social justice, the balance of division of resources between regions, predominance in the allocation of resources to the most deprived regions, the stimulus to the feeling of community, bringing neighbors closer together

in the search for common goals and growth of citizen confidence in government (Secondo & Lerner, 2011: 23).

Besides, according to Herzberg (2011: 5-12), in terms of public sector modernization, PB can increase transparency and accountability in public administration, "opening the doors of funds" of the budgeting process and involving citizens in the learning and decision-making about their *trade-offs*. PB also charges citizens for new responsibilities as "co-producers" of public services and, in general, "co-decisionmakers" in political decisions that, in turn, fit into the "post-NPM" rhetoric called New-Weberian State (NWS).

The PB mechanisms of organization, participation, and, mainly, financial autonomy about the public budget, vary widely compared to each experience. In the city of Porto Alegre, for example, 100% of the budget is defined in PB (Siegli & Trogildo, 2015), while in New York, only a fraction of it is made available by the municipality to be used in the city's PB. But what is a consensus, regardless of the type of PB practice, is that it is a democratic innovation and considered the "democracy of the future" (Participatory Budgeting Project, 2016: 14).

As a rule, participatory budgeting (PB) involves an annual cycle of meeting and voting, and each city or organization that adopts it, adapts it to its specific needs (Participatory Budgeting Project, 2016: 3); however, the dynamics of PB will be used in the city of Porto Alegre, Brazil, with almost thirty years of experience according to Table 4.3 below:

#### Table 4.3 – The stages of PB in the city of Porto Alegre

Regions and Themes - The city was divided into 17 (seventeen) Regions and 18 (eighteen) Thematic. Any citizen can participate in the discussion of PB in his Region and the Themes, and in the Region discusses and defines the specific investments and services of the Region and in the Themes discusses and defines guidelines, investments and services for the whole city, that is, structural works and large projects.

Preparatory Meetings - The city accounts for the past year, presents the Investment and Services Plan (PIS) for the following year. A steering committee, community representative, creates the rules in partnership with government officials to ensure that the process is inclusive and meets local needs (Prefeitura Municipal de Porto Alegre, 2018).

Regional and Thematic Assemblies - The population elects priorities for the municipality, its advisors, and defines the number of city delegates for their respective regional forums and thematic discussion groups (Prefeitura Municipal de Porto Alegre, 2018).

Delegate forums - They are responsible for defining, in order of importance, of the works and services that will be discussed from May to July and for the analysis and approval of the Investment and Services Plan of your Region or Theme (Prefeitura Municipal de Porto Alegre, 2018).

Source: Orçamento Participativo - Regiões e Temáticas. Prefeitura Municipal de Porto Alegre, 2018.

After this cycle, the Councils of Participatory Budget (hereinafter PBC), vote to pass the budget laws of the municipality, the Budget Guidelines Law (BGL) and the Annual Budget Law (ABL), that is, the demands defined in PB, are parts of execution of next year's budget by law. In the city of Porto Alegre, 100% of the municipal budget is made available to be defined with the demands elected in PB (Siegli & Trogildo: 2015).

Another important aspect concerning the PB of Porto Alegre is the participation and empowerment of the poorest social layers of the population in all spheres of participation of PB such as the rounds, the Forum of Delegates, and the PBC.

When analyzing the works of the PB of Porto Alegre, from 1989 to 2000, it can be verified that there was a greater number of works in the poorest regions of the city; thus, it is possible to deduce that BP functioned as a powerful instrument of redistribution of incomes since the poorest regions received a higher volume of investments per inhabitant (Marquetti, 2003: 13).

The PB of Porto Alegre will fulfill 30 years of existence in 2019. It is a unique experience considering the cultural, social, and political context of Brazil. Its export to other continents produced variations that highlighted the strong innovative and modern characteristics of it as a tool for strategic planning and public management. What began in the late 1980s in the city of Porto Alegre as a proposal for participatory democracy and social justice, has become a powerful tool of good governance, active citizenship, effectiveness in resource allocation, reduction of clientelism, transparency, reduction of corruption, and strengthening of democracy with empirical results of improvement of quality of life, especially of the poorest population. (Marquetti, 2003: 2).

#### 4.2.3.1. Digital Participatory Budget (DPB)

Digital Participatory Budget is an online space for discussions with society on issues and priorities for local budget allocation. Such platforms exist both as an integral part of the face-to-face Participatory Budget and as exclusively digital experiences (Pogrebinschi, 2017).

However, the DPB in SSPAC will be used as a support tool for the face-to-face OP with the function of including those who cannot be personally involved in the OP, however, it should not be used to replace the dialogue and approaches personally, being necessary a good combination of the two modalities to ensure that it is as inclusive as possible (Ritchie, 2016).

#### 4.2.4. Complementary Chains of Products and Services

#### 4.2.4.1. Global Value Chains (GVC)

According to the OECD and World Bank Group report (2015: 14), "today's global value chains offer countries greater opportunities to specialize in specific aspects, or internships, the

development and production of goods and services where they exist comparative advantages." The current production system works with multinational outsourcing networks, providing companies with the possibility of working worldwide through global value chains.

For this, it is necessary to promote public policies that include local, regional, national and international connectivity and stimulate the creation of cross-border projects and sector coverage in conjunction with high-quality initial education, collaboration with universities and multinational companies for the transfer and development of knowledge and technology, vocational training for the proper qualification of the workforce, entrepreneurship and public-private investment in infrastructure. (OECD & World Bank Group, 2015: 86).

According to Zuazua & Lohmeyer (2019: 4), "economic ecosystems are another excellent example of highly adaptive systems. Around the world, high-tech industry, higher education institutions, and venture capitalists tend to recognize their interdependence, and thus form strong communities of self-interest that are, in essence, ecosystems that favor the healthy 'coo-petition' of ideas and solutions. By emulate such precedents, governments can demonstrate that collaboration in ecosystems is a demand for greater competitiveness, no longer merely an alternative."

#### 4.2.4.2. Circular Economy

A circular economy is an economic system that aims to minimize waste and make the most of resources. This regenerative approach is in contrast to the traditional linear economy, which has a "take, make, discard" production model. (Ellen MacArthur Foundation, 2013: 68).

Circular Economy excels in resource efficiency, cleaner production in abroader system comprising companies, networks or chains of companies, eco-industrial parks, state and private enterprises, regional government and private infrastructure, and consumers to support resource optimization. Everyone has a role in achieving the Circular Economy.

According to Lowe (2005: 76), "there are three basic levels of action in the circular economy: 1) at the individual company level, managers seek greater efficiency for cleaner production, reduce the consumption of resources and the emission of pollutants and waste, reuse resources and recycle by-products. They also promote the design of sustainable products and processes in recycling savings plans; 2) the second level consists of reusing and recycling resources within industrial parks and grouped or linked industries so that the resources circulate fully in the local production system and 3) which is based on integrating different production and consumption systems in a region so that resources circulate between industries and urban systems. This level requires the development of systems for the collection, storage, processing, and distribution of municipal or regional by-products".

The steps at all three levels include the development of resource recovery and cleaner production companies and public facilities to support the achievement of the concept of the Circular Economy. This adds a strong dimension of economic development through investment in new ventures and job creation, opening opportunities for national and foreign companies (Lowe, 2015: 76).

By observing these systems, focusing on the analysis of human well-being, ecological economists call them "natural capital". According to them, "natural capital is the source of all-natural resources and sinkholes that absorb by-products from human activities." Natural capital accounts should be recharged through large investments in forest restoration, pastures, deserts, farms, watersheds, oceans, and atmospheric balance. This "restoration economy" should also recover the unrecoverable investment in human habitat and infrastructure to prolong its life. Here investments will create huge opportunities for the development of enterprises and job creation (Lowe, 2005: 62).

In the Circular Economy, all sectors are looking for necessary gains in efficiency, not just the heavy industry. These include planning and development of land use; transport, urban construction, trade, design, and operation of municipal infrastructure, agriculture, and families. There must be gains at all stages of the product lifecycle, from resource extraction to recovery or final elimination (Lowe, 2005: 61-62).

Those who defend the Circular Economy believe that it does not mean a drop in the quality of life for consumers and loss of revenue for industries. According to them, circular business models can be as profitable as linear models. To structure models that are economically and environmentally sustainable, the circular economy focuses on areas such as design thinking in all phases of the production processes, increasing the useful life of products and recycling practice (Ellen MacArthur Foundation, 2013: 76).

According to Lowe (2005: 76), "the concept of Circular Economy is gaining acceptance due to the urgent need for an alternative approach to achieve both economic development and environmental protection." The direct relationship between resource issues and global changes becomes evident, such as changes in the chemical balance of the atmosphere, climate change, river and ocean pollution, cross-border pollution, and biodiversity loss. The deterioration of ecological systems - local, national, and global - requires solutions that allow their restoration, and a recycling or circular economy is only a partial economic solution.

#### 4.2.5. Education

#### 4.2.5.1. Design, Society and Sustainability

Education is an indispensable pillar in SSPAC's strategic planning for the continuous and evolutionary development of its cells, and consequently of collective (public) organizations in a sustainable and supportive manner.

According to Poister (2010: 247), "strategic planning is concerned with the formulation of strategy. In the long run, its goal is to promote strategic thinking, act and learn continuously" and according to Queiroz's definition (2009), "research is a systematic process of building knowledge that has as main goals generate new knowledge or corroborate/refute some existing knowledge."

In this sense, SSPAC focuses on education in a strategic, investigative, and pragmatic way, to promote through schools and universities, scientific studies and research focused on the design and redesign of dynamics and methodologies of development (micros and macroeconomics), social and environmentally sustainable and supportive and also on the continuous improvement and innovation of services and equipment multi-dimensional audiences demanded and delivered to society by collective (public) organizations.

This SSPAC dynamic of integrated knowledge generation at local, regional, national, and international levels, converging strategic planning and research with the support of computer technologies, creates a mass of knowledge and data segmented by themes, regions, and organizations in an agglutinating way. , like pieces of a puzzle, which, when fitted together, assemble a "big picture", what we call today Big Data, extremely important for decision making by the cell representatives in the participatory budgeting and strategic planning phases of SSPAC.

#### 4.2.5.2. Metadiscipline in the creation of teaching methodologies

This ideal educational platform to support the Education model suggested by SSPAC already exists. The concepts of design and meta discipline are already used in various educational institutions around the world, both in the pedagogical sense, and as suggested by SSPAC, in the development of studies and research inserted in the daily life of institutions in the search for practical solutions for complex themes of human groupings such as the relationship between design and the city, social design, collaborative design ( and the science and engineering of sustainability. (Mihelcic et *al* 2003: 5318)

#### 4.2.6. Management

It is in the Management phase that all work produced during strategic planning – identification, analysis, proposals, technical qualification, and budgeting of demands – is organized, and converted into projects and programs to be implemented by work organizations (matrix and temporary), and their respective managers and coordinators, and after finalized, transformed into demanded public services and equipment (Neves, 2001: 101). It is at this stage too that Key Performance Indicator (KPI's), the form of collective control, accountability (transparency) and used Big Data information by work organizations.

Work organizations can be stable, temporary, or the combination of the two. Belong to the public, private and non-profit sectors, or a combination of the three. Geographically local, regional, national, international, or integrated according to strategy and the nature of objectives, it complies with pragmatic criteria of technical and managerial training, budget, and need for integration. After the structuring of work organizations, projects, and programs are dismembered for defining project management.

#### 4.2.6.1. Project management

Project management defines the results to be achieved and the minimum resources necessary to complete the defined objectives, providing work organizations more agility of action and consultation of planning goals, thus managing the risks of achieving them and at the same time focusing on the organization's attention in the objective and achievement of results, effectively creating change. (Wirick, 2009: 39).

The main focus is the results and achievement of the established goals. The projects are divided into phases with the activities necessary to complete the delivery of the project and its results can be evaluated by the work organizations and interested parties. The objective is to ensure that all activities are linked to delivery with a timeline and costs identified and defined (Wirick, 2009: 39).

The organization of project work is done through the application of the SPECC model, which contains five phases:

- Start configure goals, expectations, and scope of the project;
- Planning develop a specific plan for the tasks and activities to be completed, including schedule and budget;
  - Execution run Plan;
  - Control respond to changes, adjust schedule, goals, and expectations as needed;
  - Closing deliver the final project and evaluate the project and the process.

After closing, the results are documented and the project files are created, so that, through the knowledge acquired, the next projects can be managed even better.

The materialization of SSPAC's actions is done through the active participation of the citizens who make up each cell, through the responsible management of their demands. It is a model of management and administration of pragmatic and conclusive collective demands. However, this model takes into account the particular characteristics of public sector organizations when addressing projects. It recognizes these particular characteristics and

incorporates them in a permeable and positive way - using strategic planning as a guide - for the completion of projects.

One of the common factors for the failure of project management in the public sector-depending on the mandates of elected representatives being defined in time - is the common and recurrent practice of customizing the results, only positive ones, of public projects. Empirical experiences reinforce the importance of projects being managed and coordinated, not only by the equipment allocated to the projects but throughout the community. According to Wirick (2009: 9), "little is accomplished in the public sector by solitary individuals or even by teams working alone."

The experiences of Participatory Budgets, in particular the democratic dynamics used in assemblies, from the identification of demands to their approval, were fundamental for communities to awaken to their collective power of action and, at the same time, allow, the development of competencies in project managers and coordinators, of managing interests due to the success of the implementation of the projects. The involvement of the various groups and stakeholders, which not only participate in the projects but also influence their results, should be managed with the aim of ensuring the delivery of projects according to what was defined in strategic planning (Wirick, 2009: 9).

In this sense, the community has as its responsibility, first identify, then develop actions by managers and coordinators of projects with the capacity and competence to visualize projects as a community enterprise that involves multiple groups with different interests for problem-solving; and who, also, have the aptitude to manage complex processes required by law or administrative rule, react quickly and positively to mishaps, which are a constant in public sector projects, and manage conflicts between stakeholders, recognizing the interests of even those who can oppose the project, and interact with the media when necessary (Wirick, 2009: 24).

At SSPAC, project managers and coordinators must think about project management in a sustainable and integrated way. The main objective is the implementation of projects is to materialize strategic planning so that, in addition to being multidimensional in a sustainable way, acting in the dimensions of education, employment, health, environment, spatial planning, security, justice, among others, is geographically multilevel, that is, integrate and local, regional, national and international demands; that is, act locally thinking globally (Neves, 2001: 101-102).

#### 4.2.6.1.1. Key Performance Indicator (KPI) management

At SSPAC, KPI is essential as a tool for monitoring, controlling, and producing data that can be used to measure the performance and quality of projects and archived for future reference (Wirick, 2009: 67). Another fundamental issue for the use of the tool is accountability and transparency in the execution of projects by its managers (Crawford & Helm, 2009: 75-76).

#### 4.2.6.1.2. Collective control

At SSPAC, projects and programs are effectively run and managed by the work team(s) defined in the Strategic Planning phase. However, the monitoring and control of execution are shared with the representatives of the cells involved in them. This collective control is done through the sharing with representatives, the KPIs of results - schedule and expenses - sent by the public communication channels and face-to-face meetings provided for in the implementation agenda of each project (OECD, 2016: 217).

#### 4.2.6.1.3. Accountability (prestação de contas)

This process struggles over how, from conception, in Strategic Planning, to finalization, through the Management phase, projects and programs are systematically submitted to accountability both for representatives and individuals of the (s) cell (s). Thus, the community closely monitors the execution of projects, monitoring the performance of public managers as well as the commitment to manage results (Poister, 2010: 249).

#### 4.2.6.1.4. Big Data

The use of big data as a management tool has been around for some time in countries such as Australia, Japan, Singapore, South Korea, the UK, and the US to reduce risks and increase the efficiency and effectiveness of government decision-making (Kim, Trimi, & Chung, 2014: 79). At SSPAC, it involves the production, retention, and manipulation of information created in the four stages of operation whether during permanent public administrative routines or through local, regional, national, and international projects and programs, integrated and multidimensional form. Thus, all cells produce, share, and consume information in all four phases of SSPAC continuously. This dynamic offers decision-makers statistical, technical, and scientific subsidies to define more effective, efficient, and assertive projects and programs in meeting collective demands by public organizations.

#### 4.3. Horizontal communication

#### 4.3.1. Horizontal and inclusive communication

Inclusive horizontal public communication is characterized as a means of forming consensus and public opinion and of expression and publicity of the public sphere through participatory democracy (Squire, 2003: 76).

According to Squire (2015: 76), "the communication theory that underlies this horizontal and public concept is derived from a dialectical conception of the sender/receiver relationship, in which culture, beliefs and socio-cultural and political productions of this receiver have as much power as those arising from the sender pole, that is, in this dialectical relationship, both and another communication pole are producers".

This "collective subject" as well as defined by Squire (2015: 77), "points out as main characteristics, its physical dispersion, and its symbolic character, which are consolidated from subjects of common interest, by itself, mobilizers". Therefore, the design and structuring of communication projects, as well as their objectives, are integrated and linked to the objectives and target audience of projects and programs in strategic planning. In this sense, it is important, to achieve the objectives outlined in communication projects, there is a clear identification of the target audience of each project and program, and the definition of the best tools and communication channels to establish an inclusive, pragmatic, transparent, and effective communication.

Horizontal public communication, however much requires complex management, as it operates horizontally at the target audience level and uses multiple channels and communication tools, when conducted ethically, responsibly, transparently, and inclusively by public organizations, contributes to the formation of a new model of management and public administration, more participatory and democratic, strengthening in citizens the feeling of community and cooperation (Novelli, 2006: 87).

Therefore, SSPAC uses horizontal communication as an indispensable tool for inclusion, mobilization, participation, and transparency by the individuals who make up cells at all levels, of all activities in its four integrated areas: strategic planning, management, horizontal communication, and active participation using multiple information and communication channels. Existing ones, such as community radios, neighborhood newspapers, sound cars, speakers and new ones such as web pages, emails, blogs, social networks, and mobile applications actively, transparently, and democratically, both on the part of the senders as well as on the part of the receivers, creating a flow of propositional interaction guided by issues related to the short, medium and long-term objectives defined in strategic planning.

According to Duarte (2008: 27), "the public interest must be seen above the individual and collective interest; the citizen is the center of attention; communication is a broader process than

information; it is necessary to adapt the instruments to the needs, possibilities, and interests of the public and to understand that the communication system is a single whole".

Communication is pragmatic, that is, with a beginning, middle, and end purposely restricting itself to issues relevant to a specific and adjusted activity or action, through modern technologies of integrated management of information channels and communication (visual, audiovisual and digital), to reach all groups of individuals in the cell.

#### 4.3.1.1. Using multi-channels

#### 4.3.1.1.1. e-Participation

It is almost a consensus in most of the literature regarding e-participation that technology is a transformative agent of any activity, because it provides greater and more diverse participation of individuals, intensifies its effect, and alters its form (Sæbøa, Roseb, & Flak, 2008: 401).

Consultative activities, such as online consultation or e-consultation, are used by government political agents as a tool for active citizen participation through their opinions, wills, and positions on an issue (or a whole) of interest or concerning the public thing, improving the quality and legitimacy of public policies and increasing citizens' confidence in the political class (Sæbøa, Roseb, & Flak, 2008: 409).

In this sense, deliberative and advisory activities structure the information and communication bases for an activity that, according to some authors, is considered a particular category of e-participation that is decision-making, or e-decision that has as a main function assisting public servants in policymaking. As some examples of this category would be the collective elaboration of public policy documents, inclusion of opinions, or feedback of citizens in public policies (Sampaio, 2016: 941).

However, it is important to note that in some programs, before digital e-Participation tools are created as a support for activities that already use the face-to-face form of participation, there should be care that digital solutions do not compete or overlap with face-to-face activities, thus generating, instead of inclusion, digital exclusion. According to Sampaio (2016: 941) "the use of mixed methods — processes with online and face-to-face phases — tends to generate more successful programs"

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#### 4.3.1.2. Information and Communication Technology Tools (ICT)

Information and communication technologies, going forward to ICT's, encompassing hardware and software, have eliminated all geographic, demographic, and cost limitations for sharing information and communication globally. With the rapid expansion in the 1990s of the

commercial internet, tools such as websites, emails, VoIP, and others were created that gave corporations and people the possibility of interaction with anyone who had internet access in the world. This unprecedented possibility had the first impact on the market and consumption, creating forms of business and sales over the Internet. Then it was the turn of collective interaction through social networks, allowing many people to interact in the same virtual environment. Soon after the advent of the Internet, another technological leap, the use of all these technologies through mobile telephony, creating billions of "channels" of information and communication at the individual level, profoundly modified the way consumers interact citizens, respectively, with the market and the State. Finally, but not least, the creation of Big Data, which makes it possible, through its parameterization, to reach millions of individuals at the same time in a personalized way.

ICT's and the information and communication systems that use them contribute as support for public management in strategic issues, administrative, financial routines, and services provided to citizens, resource management, and production processes.

And as Neves pointed out (2001: 45), "providing the alignment of the ability to serve by public agencies with the needs of interaction, communication, understanding, and coordination of actions together in the State with the multiple economic actors, social and political interests in the public interests of the population in an inclusive and participatory way".

It is important to highlight that the use of ICT in the global public sector in recent years has produced important empirical results regarding productivity gain, speed of response to requests for internal and external needs, and reduce costs and errors in production processes. (Neves, 2001:45).

Thus, ICT's should play an essential role in organizations today, enabling access to specific information and knowledge, strengthening exchanges and creating proximity, providing information from organizations, strengthening the improvement of external image, facilitating public service and reducing service delivery time, giving greater security and accelerating decisions, automating procedures and simplifying routines, creating new services and public equipment, enabling decentralization and coordination and, finally, influencing the definition of strategies and facilitating its implementation (Neves, 2001: 45).

#### 4.4.1. Active participation

# 4.4.1.1. Active, democratic, and responsible participation in the management of the collective demands of the cell

Active participation: Relationship-based on the partnership with the government, in which citizens engage directly in the formulation of public policies and have recognized their role in proposing options (Novelli, 2006: 86).

According to Novelli (2006: 87), "the model of active citizen participation presupposes a horizontal communication process based on partnership and stimulating society's engagement in the formulation of public policies. The new information and communication technologies, which favor the interaction between social actors regardless of their geographical locations, are valuable tools for enabling the most active participation of the citizen. This is a communication model that is still in the experimental phase in several countries. In Brazil, the experience of developing participatory budgeting in some municipalities has demonstrated the success of the initiative, which focuses on deliberative participation in investments and supervision of public spending by society".

However, the actual exercise of active participation differs greatly in form and effectiveness, depending on the involvement of individuals and the quality of organizations for participation.

And according to the United Nations (2008: 19-20), "one way to understand this diversity is to compare the varieties of practice in two dimensions, namely the scope and intensity of participation. In terms of scope, participation may, in principle, cover four distinct types of activities, which together may constitute the act of governance - namely: (a) determine people's preferences on alternative social outcomes and processes alternatives to achieve these results; (b) formulation of policies, rules, and institutions based on these preferences; (c) implementation of the proposed policies, rules and institutions; and (d) monitoring, evaluation and guarantee of responsibility in the formulation and implementation of policies. Participation can be considered the most extensive in its scope when it occurs in each of these phases".

Concerning active participation, it is essential to pay attention to the growth of feelings of belonging, collective responsibility, cooperation, and citizenship in citizens. As Neves (2001: 117) concluded, "the recipients of the action are those who exclusively feel the problems or needs to which one wants to respond and, consequently, those who can help to find the best solutions", thus benefiting the problems or needs to be addressed public organizations that expand the social civic capacity and legitimacy by citizens, the implementation of projects and programs.

#### CONCLUSION

By examining the major issues posed to modern public management and administration such as climate change, the revolution in information technology and biotechnology, essentially economic growth (for job creation) and the environment, it was clear which are global and that to face them, the process of evolution of governance in states, as well as the effort of international organizations through global agendas, was fundamental to consolidate the application of sustainability concepts and solidarity as a basic premise for the formulation of public policies that promote sustainable and supportive economic, social and environmental development.

What has been found is that the threat of climate change will present to human societies unprecedented and complex challenges that can cause ecological and social disasters, such as the expansion of deserts, the disappearance of ice caps, the elevation of oceans, increased recurrence of extreme weather events such as hurricanes and typhoons, dismantling agricultural production, flooding cities, making much of the world uninhabitable and dispatching hundreds of millions of refugees in search of new homes. Twin revolutions in information technology and biotechnology, as in the Industrial Revolution, may impact both the labor market and the need to formulate new social and political models.

Another issue that has become apparent is that in order to promote sustainable per capita economic growth – necessary for the maintenance and growth of the disassociation population in relation to environmental degradation – it will be necessary to increase the level of productivity of economies through diversification, technological modernization and innovation, focusing on high added and labor-intensive sectors, job creation, entrepreneurship, creativity and innovation, encouraging formalization and growth of micro, small and medium-sized enterprises and improved the efficiency of global resources in consumption and production, supported by the development of a reliable, sustainable and resilient quality infrastructure, including regional infrastructure and cross-border and last but not least the national inclusive and sustainable reindustrialization movement, significantly increasing industry participation in the employment sector and GDP through integration into value chains and markets and encouraging scientific research and innovation in the.

Another noticeable and important evolution to highlight is the paradigm shift in the urban development of cities. Governments and societies are developing projects that make urban centers more inclusive and sustainable, adopting a policy of planning and managing their demands in a participatory, integrated, and sustainable way and developing economic relations, social and environmental-positive areas between urban, pre-urban and rural areas, strengthening national and regional development planning.

SSPAC is a proposal for an evolutionary Public Management and Administration model. It was conceived based on the learning and absorption of knowledge produced by administrative reforms and their convergence with the evolution of sustainability and solidarity concepts over time globally. It uses factual and concrete arguments to affirm the feasibility of its actions for the pragmatic existence of a pathway of the environment in the search for the balance between market interests and the public and that public organizations have and are the means necessary to coordinate, together with all active actors in society, this coexistence of interests in a sustainable and supportive manner.

The project proposal suggests that only through strategic planning can it be verified not only micro and local collective needs and opportunities, but macros and global ones, and that all of them are interdependent, integrated, and complementary. It structures collective representativeness in such a way that leaders exercise in practice the rights and responsibilities of individuals in the search for solutions to their collective needs in a participatory and active way. It associates economic, social, and environmental development with continuous academic production of knowledge through scientific research developed in educational institutions and shared horizontally, integrated, and freely. It also argues that sustainability necessarily involves the effective and efficient management of the material, financial and human resources of the cell in which administrative routines, projects, and public programs are developed within the principle of sustainability.

Under this proposal, technology is used as a catalyst for diversities and distances within the cell, understanding that it provides everyone's access to information and promotes inclusive, transparent, and democratic horizontal public communication. SSPAC sees in the active participation of citizens the resumption of community consciousness and the recovery of the feeling of group belonging that involves rights, but also responsibilities that should not and do not need to be outsourced.

However, as in the other reforms, the implementation of SSPAC as a model of management and public administration depends on the will and work of elected and effective civil servants. Having as an example the Participatory Budget, which in some cities of the world was seen by some politicians as a threat to their power and personal objectives, and thus renegade evidence the fragility of SSPAC in this dependence of decision to be implanted or not. Another critical factor of SSPAC is the high requirement of management to integrate short, medium, and long-term interests and objectives and contextual disparities of the society's multiple active

actors, such as local, municipal, state and administration of work, trade unions, businesses, social assistance associations, churches, and community initiatives.

It is in this sense that it is necessary to continue the scientific research of democratic representative systems so that, through anthropological, sociological, political, and cultural studies, it is possible to improve them, making them more accurate, fast, safe, reliable, transparent and participatory, to act on a modern, effective and efficient management and administration base.

There is a Buddhist proverb that says "it's worth wearing slippers more than covering the world with carpets." Bringing the philosophical meaning of the phrase to administrative decentralization and public management, we can affirm that as a modern country strategy (State and market) it is better to develop and execute public policies that strengthen economic fundamentals, politicians, and social rights from the place to the global in an integrated way, not the other way around. A good example of this proposal for public administration stimulus in the Nordic countries. Already in the 1990s, they promoted a major administrative and political reform at all levels of government, promoting a real decentralization that empowered local communities in the autonomous and responsible management of their collective demands. They had the courage and determination to confront the forces of "poor market" and "bad politics", subjugating them to the public interest, and today they reap the fruits of these changes, leading almost all international socio-economic indicators. Healthy cells make a healthy body.

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