

BEGINNING OF PARTICIPATORY URBANISM AND THE SUSTAINABLE CITY: CASE OF RABAT, MOROCCO

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Abstract

Since its independence, Morocco suffered from many economic, social, environmental, and urban challenges. To deal with the existing dysfunctions, the State will look towards creating structuring projects, laws, national programs, etc. Except that all, the measures taken to remedy this do not integrate the population. The objective of this study is the participatory approach concretization in the process of sustainable development through a questionnaire targeting the resident population and the daily citizens in Rabat. As a result, various dysfunctions affecting mobility, pollution, and the living environment in general in Rabat were highlighted. These results will be the subject of a roadmap for an integrated and inclusive sustainable development project in a safe environment.

Keywords:

Participatory approach;
Sustainable urbanism;
Questionnaire;
Air pollution;
Sustainable development.

1 Introduction

The challenges of “sustainable” political or civic action are frequently presented under the a priori of the “consensus politics”, updated by Jacques Rancière (1998): who could be “against” the attention given to the future of our planet, threatened by global warming and other “global” risks? At the Earth Summit in Rio in 1992, sustainable development was presented as an approach that broke with the imperatives of economic growth, while maintaining a vagueness that could be appropriated by many actors with different objectives (Zaccai, 2011) [1].

Located in the northwest of the African continent, Morocco is changing in terms of its economic, social, environmental and urban development. Rabat, the territory of our study, it is more affected by this process.

Bearing the title of capital of Morocco and inscribed on the World Heritage List as "Modern capital and historic city: shared heritage", it faces many challenges to succeed in its transition process towards a sustainable city. It is in this perspective that we will focus on its urban development as well as the relationship that citizens have with their territory.

Before proceeding to the significant part, a conceptual and contextual framework is important insofar as we are going to define the two key concepts of our theme: participatory urbanism and sustainable city, as well as the national laws and programs, which frame the development of Morocco.

- Participatory urbanism: in a first sense, it is an approach to the production or development of living spaces giving rise to a sharing (co-production, co-decision) or even a transfer of responsibility (self-promotion, self-management) towards the inhabitants spontaneously mobilized or widely solicited. In a second sense, it is generic, designates any practice of manufacturing or fitting out inhabited spaces involving inhabitants, whatever the level of this involvement [2].

- Sustainable city: it is a project and a reference for public action, which succeeds that of the modern and post-modern city by inscribing the choices of urban development in an ecological and terrestrial materiality. The expression designates a city capable of maintaining itself over the long term

and facing the environmental, social, economic and cultural challenges of Global Change: by trying to adapt to it, but above all by transforming itself [3].

Regarding the effects of participatory approaches, they can relate to different dimensions of the process and decision-making.

There are three main categories of effects for participatory approaches. First of all, the substantive effects, these relate directly to the outcome of the decision-making, they influence the quality of the decision. The procedural effects directly concern the decision-making procedure, sometimes even independently of the impact on the result; we are interested here in the process for itself. The third category of effects - which can be described as "second level" - brings together those which no longer directly concern the environmental problem dealt with by the decision-making process but relate to the social context in which the decision-making process takes place: these are the contextual effects. Among these, some relate to the information systems in which the process takes place, while others induce a modification of the social context of the decision. The distinction proposed here is of course artificial and essentially heuristic.

Strong interrelationships exist between these different dimensions and any real process with several effects, which mutually influence each other and have mixed characters, at the same time substantive, procedural and contextual [4].

As for the contextual component, Morocco legally frames its environmental component, as it has also embarked on national programs and structuring projects to further concretize the importance of the environmental component in its territory.

In the same context, we will mention:

- Law No. 11-03 relating to the protection and enhancement of the environment:
 - Protect the environment against all forms of pollution and degradation, whatever their origin;
 - Improving the framework and living conditions of human beings;
 - Define the basic orientations of the legislative, technical and financial framework concerning the protection and environment management;
 - Establish a specific liability regime guaranteeing the repair of damage caused to the environment and the victims' compensation [5].
- Law No. 12-03 relating to environmental impact assessments:
 - Assess in a methodical and preliminary manner, the possible repercussions, the direct and indirect, temporary and permanent effects of the project on the environment and in particular on humans, fauna, flora, soil, water, air, climate, natural environments and biological balances, on the protection of historical assets and monuments, where appropriate on neighborhood convenience, hygiene, public health and safety, while taking into consideration the interactions between these factors;
 - Remove, mitigate and compensate for the negative impacts of the project;
 - Highlight and improve the positive impacts of the project on the environment;
 - Inform the population concerned about the project's negative impacts on the environment [6].
- Law No. 13-03 relating to stand against air pollution:

Decree No. 2-97-377 of January 28, 1998 supplementing the order of January 24, 1953 on the traffic and traffic police. Decree No. 2-09-286 of December 8, 2009 setting air quality standards and air monitoring procedures.

 - The law aims to prevent and fight against emissions of atmospheric pollutants likely to harm human health, wildlife, the soil, the climate, cultural heritage and the environment in general;
 - The purpose of the decree is to set air quality standards and define the procedures for setting up air quality monitoring networks [7].
- Law No. 28-00 relating to wastes management and their elimination
 - Preventing the harmfulness of waste and reducing its production;
 - Organizing the collection, transport, storage, treatment of waste and its disposal in an environmentally sound manner;
 - The recovery of waste by reuse, recycling or any other operation aimed at obtaining, from waste, reusable materials or energy;
 - National, regional and local planning for waste management and disposal;
 - Public information on the harmful effects of waste, on public health and the environment as well as on measures to prevent or compensate for their harmful effects;

• The establishment of a system of control and repression of offenses committed in this area [8].

- Law No. 36-15 relating to water, according to 1st Article, its general principles are:

• Set the rules for an integrated, decentralized and participatory management of water resources to guarantee the citizens right to access to water and with a view to rational and sustainable use and better development quantity and quality of water, aquatic environments and the hydraulic public domain in general, as well as the rules for the prevention of water-related risks to ensure the protection and people safety, properties and the environment;

• Establish water planning rules and tools including wastewater, desalinated seawater and others to increase the national water potential by considering climate change in order to adapt to it [9].

In 2014, Rabat will hit hard in terms of its development through the major project "Rabat, city of light, Moroccan capital of culture" this project intended a transition from Rabat to an international metropolis. It mainly concerns seven major areas:

- The enhancement of the cultural and civilizational heritage of the city,
- The preservation of green spaces and the environment,
- Improving access to local social services and facilities,
- Strengthening governance,
- The requalification of the urban fabric,
- Consolidation and modernization of transport equipment,
- The revitalization of economic activities and the strengthening of road infrastructure.

As already mentioned, the challenge in Rabat is complicated as long as we find ourselves facing a crossroads city that radiates on a regional and national scale. In terms of its development, we must not limit ourselves to the territory of the prefecture only, but we must think of the neighboring prefectures and provinces, which are more or less dependent on the capital.

2 Materials and methods

This study aims to understand, frame and integrate the population in the process of metamorphosis towards a sustainable city. To do this, a questionnaire proved to be the most appropriate way to communicate with the population. The questionnaire is based on a simple sampling, a method of drawing a sample from a population which consists of choosing the elements at random, without a rigorous or systematic method, but also without regard to the nature, size, the value or any other particular characteristic of the elements in question, so as to ensure a neutral circulation [10]. That said it would be distributed arbitrarily in all social networks. This technique will make it possible to list the needs of the population targeted as well as their opinion and their interest in the subject. To do this, we used the Google forms platform, which remains a solution dedicated to companies and individuals who wish to carry out online surveys to collect information. This application allows you to create forms, and then collect data for analysis.

The two key concepts of this article have in common the well-being of the population in its territory. To concretize this link and in a technological approach, we used social networks precisely the two platforms Facebook and Whatsapp to share the questionnaire that we developed. The appeal of social networks in this exercise is linked to two scenarios; firstly, the projection in a connected city experience; secondly, this questionnaire coincided with the air of Covid 19 and therefore it is the best way to comply with protection standards. The maximum and best use of the information allows for the smooth functioning of the process of planning and management, as well as decision-making [11].

The population targeted of this questionnaire is the population residing in Rabat as well as the population of its periphery having a dependency for Rabat. The key objectives are:

- Age group of the population surveyed, place of residence, level of study and occupation;
- The level of satisfaction with the territory's components;
- Interest in the environmental aspect;
- Opinion on the project Rabat city of light capital of culture;
- Familiarization with urban planning documents;
- An open question to cite the dysfunctions according to each individual questioned.

Our questionnaire reached 500 people representing all territorial components. That said, the questionnaire succeeded in reaching our expectations and can serve as a roadmap for a transition towards a sustainable city.

2.1 Study area presentation

Rabat, the capital of the kingdom is located in the northwest of Morocco with a population of 572,717 [12]. It is bounded to the north by the Bouregreg wadi and the Salé prefecture; to the south by the Skhirate Temara prefecture; to the east by the Salé prefecture and the Skhirate Temara prefecture; to the west by the Atlantic Ocean, Fig. 1.

The prefecture of Rabat covers an area of 118 km²; it is made up of two municipalities, the municipality of Touarga and the municipality of Rabat. The commune of Rabat is divided administratively into five districts, Hassan arrondissement; Yacoub El Mensour district; El Youssefia district; Agdal Riad district; Souissi district [13].

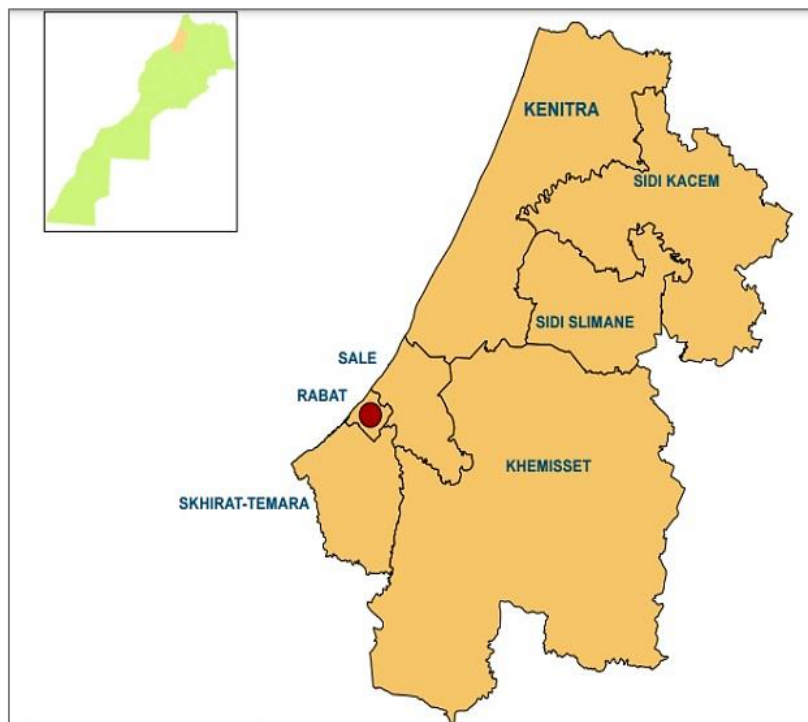


Fig. 1: Geographical location of the city of Rabat [14].

Benefiting from a crossroads geographical location, a concentration of tertiary sector activities, major higher education institutions, ministries and public administrations, security, green spaces and leisure, Rabat is now a radiant city in the national and regional scale. This radiation does not lack setbacks; it is the source of many phenomena in the prefecture such as land speculation, the birth of dormitory towns, pendulum migration, air pollution, etc.

Rabat is in full transition towards a sustainable city, through numerous structuring urban projects. It is in this perspective that the idea of integrating the population in this process becomes controversial.

The questionnaire that is the subject of this study is intended as a roadmap to frame the needs and the expectations of the population of Rabat and its surroundings, all in a healthy environment.

3 Results and discussion

The results of the questionnaire will be projected and analyzed in this section. The main objective is to bring out the current dysfunctions suffered by the population questioned. The other purposes of this questionnaire are:

- To find out whether the population is aware of the sustainable development importance.
- To know the degree of involvement of the population of Rabat at the level its urban planning (urban planning documents and major projects).
- To know if the population is ready to be part of the process of metamorphosis towards a sustainable city.

3.1 Framing of the surveyed population

Before any phenomenon analysis, it is essential to identify the population being studied in order to contextualize and understand the results obtained. In our study, this framing will allow us to know if the questionnaire has reached the different sections of the population under this study, as well as to see the adequacy of the data collected with the real state of the city of Rabat.

From 500 people questioned, 269 are women or 54 % and 231 are men or 46 %. The quasi-equivalence of gender will make it possible to list the dysfunctions and unify the spatial and environmental vision at the prefecture level.

This survey affected all age groups with 330 people or 67 % belonging to the age group between 19 and 30 years old. 129 people or 26 % in the age group between 13 and 60 years old; 23 people or 4% representing the age group between 0 and 18 years old. 18 people or 3 % of the age group over 60 years old Fig. 2, [15].

Teenagers and adults are represented with a high rate on this questionnaire; this says that we are faced with a very active population experiencing a need at the economic, social, urban and environmental levels. The dominance of these age groups in any way does not mean ignorance of the needs of the entire population in the same territory.

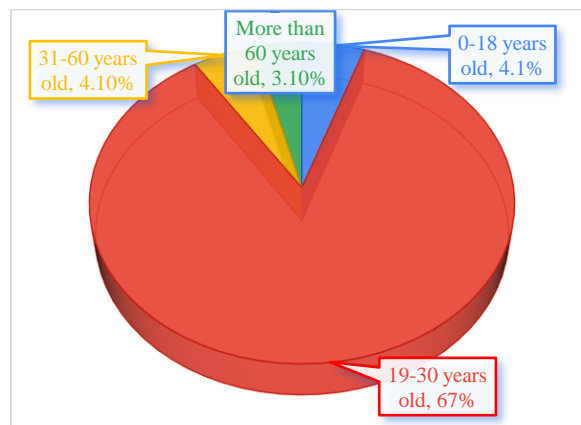


Fig. 2: Age group of the surveyed population.

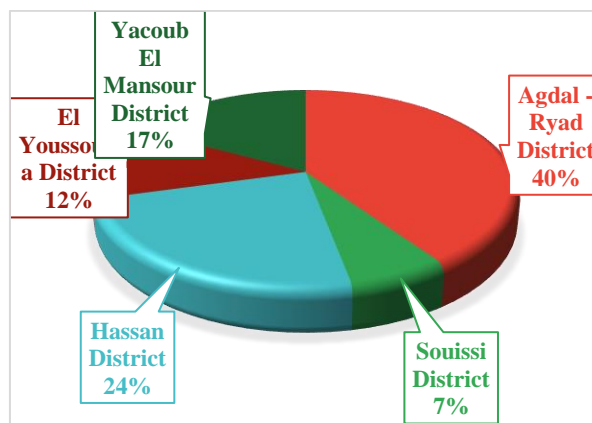


Fig. 3: Distribution of the resident population in Rabat.

At the level of this questionnaire, the population of Rabat is dominant with 293 people or 59 %, the 202 people representing or 41 % are from towns neighboring Rabat.

A dominance of 9 % of the population of Rabat at the level of the questionnaire compared to the resident population on its outskirts and in close relation with the prefecture; that said, the needs at the level of our analysis, two territorial components would be supported.

As for the resident population in Rabat, it is distributed according to the following districts. 111 people at the level of the Agdal – Ryad district, i.e. 40 %; 69 people in the Hassan district, i.e. 24 %; 50 people in the Yacoub El Mansour district, i.e. 17 %; 36 people in the El Youssofia district, i.e. 12 %; 22 people in the Souissi district, i.e. 7 %, and 5 people in the commune of Touarga, i.e. 1 %, Fig. 3. A dominance of answers at the level of the Agdal Riad and Hassan districts; these are the vital

districts of the prefecture with a concentration of administrations, economic activities, green spaces and leisure.

Concerning the non-resident population in Rabat, the results reveal that 48 % of the people surveyed belong to the Skhirate Temara prefecture, 44 % are from the prefecture of Salé, 5 % from the province of Khemisset and 3 % from the prefecture of Mohammédia, Fig. 4.

The prefecture of Salé and the prefecture of Skhirat Témara are juxtaposed with the prefecture of Rabat. The two prefectures are dormitory cities, which offer a real estate opportunity and a lower standard of living than that of Rabat.

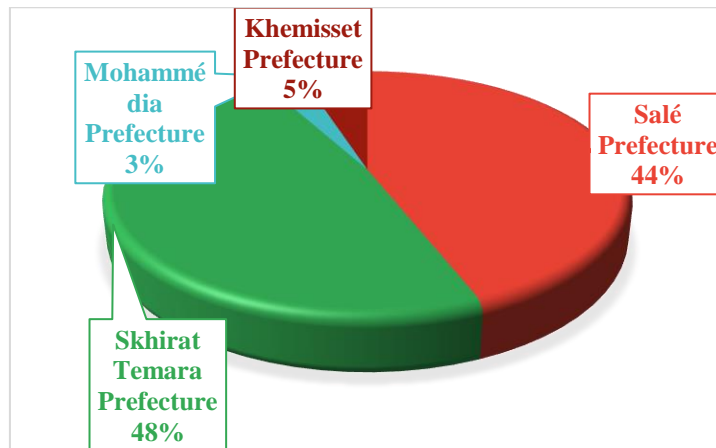


Fig. 4: Spatial distribution of the non-resident population in Rabat.

The educational level of the questioned people is 96 % have a higher education level, followed by 3 % with a high school level of study, and only 1 % in the middle school.

Almost all of the surveyed people have a higher education level; admittedly, the latter is not a condition for knowing the dysfunctions of its territory, but it is still important to discuss and further analyze its point of view, its expectations and its design, Fig. 5.

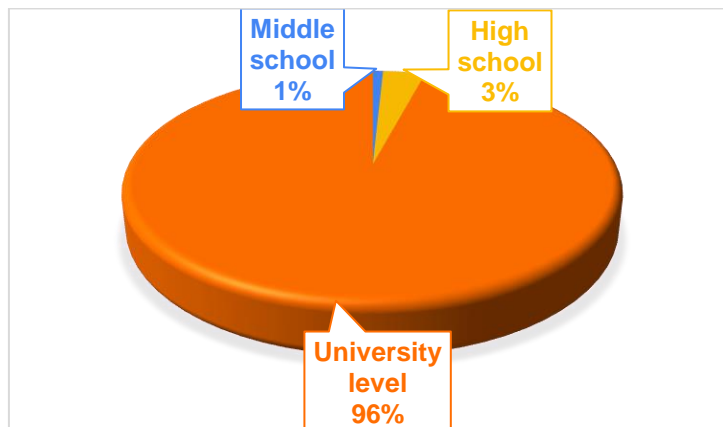


Fig. 5: Respondents education level.

According to the results of the questionnaire, 42 % of the population surveyed are employees, 39 % are in training, 10 % are entrepreneurs, and 9 % are either unemployed or job survey, housewife, freshly graduated, etc., Fig. 6.

Almost equality between employees and students; this situation fits perfectly with the general case of the prefecture being a city which concentrates administrations, services and large schools and which does not hit hard in industry.

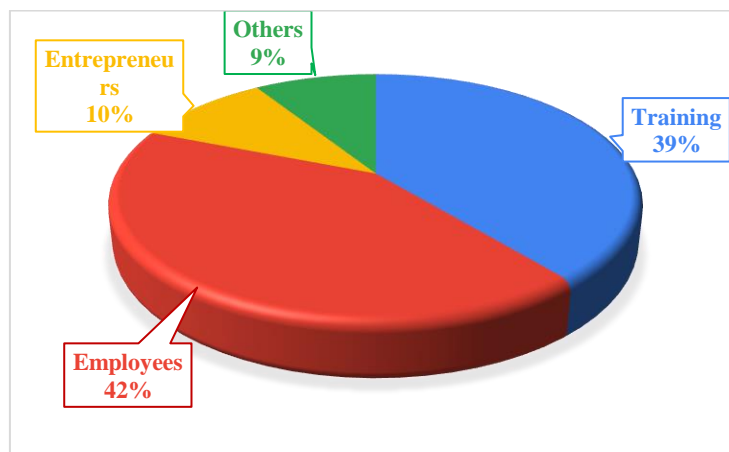


Fig. 6: Type of activity of the surveyed population.

General observation, this sampling is validated and can be a roadmap for a sustainable city project. It affected all age groups, different territorial affiliations and all social categories. Its results are in line and in harmony with the actual data from Rabat.

3.2 Population and territory

A territory attractiveness is assimilated generally to its capacity to attract and retain mobile factors of production and/or population. We will define this attractiveness as the ability of a territory to be chosen by an actor as a location area (temporary or long-term) for all or part of its activities; this attractiveness is a perceived attractiveness that only involves natural persons, individuals, households or teams, for example the management teams of a company or a public administration [16].

To be able to design a sustainable urban planning project, it is necessary to know beforehand the dysfunctions from which the territory that is the subject of the study suffers, hence the need to integrate the participatory approach at the level of all the project phases.

In our study, we asked questions that relate the existing relationship between respondents and the prefecture of Rabat.

The degree of satisfaction with the components of the city differs from one person to another depending on the need, accessibility, expectations, etc.

3.2.1 Population needs

More explicitly, the understanding of the city, its urban and social environments, its demographic structures, its urban and architectural specificities, its conversions, its interests, its rapprochements, its conflicts, its hatreds or even its most latent societal forms is therefore almost crucial before even thinking about setting up the digital project insofar as this understanding will undoubtedly lead to perfecting the modes of governance and planning, to optimizing the costs and expenses to be assumed and also to maximize the results in favor of all the different stakeholders, especially the local population [17].

The objective of this axis is to find out whether Rabat meets the needs of all age groups as well as people with specific needs.

According to the results of the questionnaire, 40 % affirmed that the prefecture meets their needs, against 60% who answered negatively.

The situation does not change for people with specific needs, 64 % of those surveyed find that Rabat does not meet the needs of this category.

The satisfaction rate for all age groups as well as people with specific needs is relative, the living environment offered by the city of Rabat is among the best in Africa, people tend to expect more is completely legitimate.

In the past, urban planning in Morocco was a reparative urban planning, it only and urgently responded to economic and housing needs in the absence of an overall vision integrating all the territorial components. Today, Rabat is in the urban planning phase of structuring projects that are thought out upstream and integrate all the territorial components.

The Rabat and Salé waterfront projects mark a fundamental break with the past. In fact, they inaugurate a new phase characterized by the emergence of “project town planning”, the methods of design and implementation of which differ significantly from those of “regulatory” town planning. [18].

3.2.2 Accessibility and transportation

Concerning the question of transport and accessibility, the population surveyed is satisfied concerning accessibility to neighboring municipalities with a rate of 41 %, accessibility to administrations with a rate of 41 %, traffic outside peak hours with a percentage of 56 %, the state of the roads with a percentage of 43 %.

The two points that are less satisfactory for the population surveyed are the quality of public transport with a percentage of 39 % and traffic during peak hours, which is not satisfactory with a percentage of 46 %, Fig. 7.

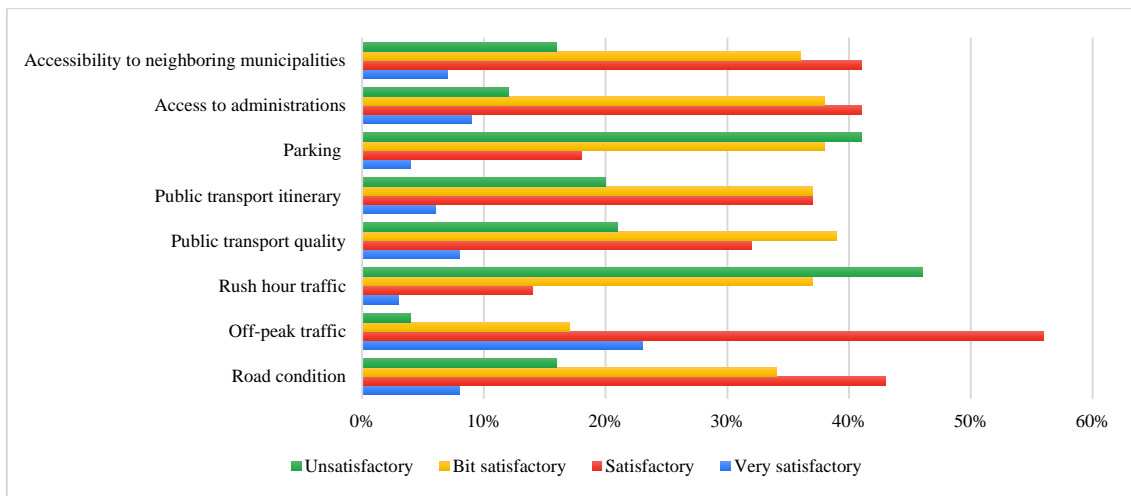


Fig. 7: Satisfaction rate of the population surveyed in terms of accessibility and transport.

Traffic at peak hours and parking remain a major challenge for the prefecture, its influence and its attractiveness weigh heavily on its road network as well as on its environmental quality.

This problem is shared between the prefectures through the means of public transport it offers as well as the lifestyle of the population, which favors the individual car. In response to the traffic problem, Rabat is currently in a construction site of tunnels to reduce the traffic jam from which its territory suffers.

3.2.3 Liquid, solid and gaseous sanitation

With regard to the environmental component, the population surveyed is satisfied with almost all the components of this axis, ranging from waste and wastewater management to air quality as well as the cleaning and maintenance of the city. In figures, 45 % of the population is satisfied with air quality, 41 % with sewer maintenance, 47 % with the liquid sanitation network, and 44 % with the quality of drinking water. The two components that remain unsatisfactory are solid waste collection with a rate of 40 % and rainwater management with a rate of 44 %, Fig. 8.

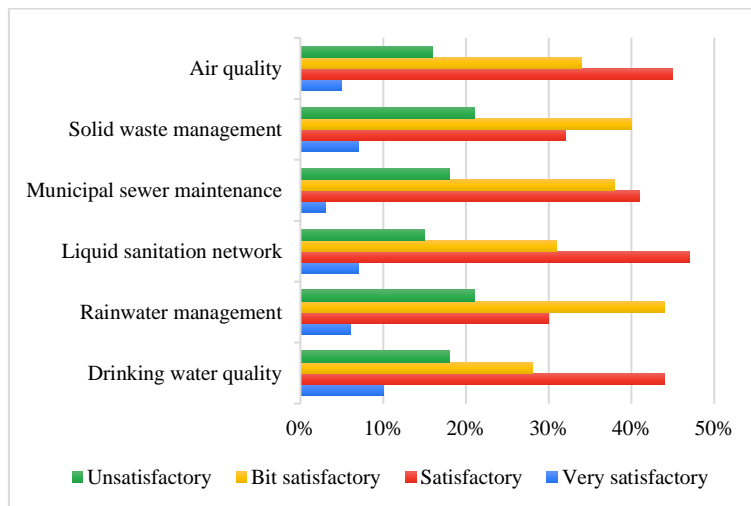


Fig. 8: Satisfaction rate of the population surveyed with liquid, solid and gaseous sanitation.

The liquid, solid and gas sanitation component, almost all of the components addressed in the questionnaire are satisfactory. As for the two unsatisfactory constituents at the level of this axis:

Rainwater in Rabat is collected directly in a combined network with waste water. As part of the Rabat city of light, capital of culture project, a wastewater treatment plant has been created. It is currently used to treat wastewater and rainwater, once treated the water is used to water the green spaces of the prefecture.

The solid waste collection is a challenge in Rabat, the collection is ensured at the level of almost all the districts of the prefecture, but the urban landscape remains marked by overflowing waste bins, the presence of garbage collectors at the level quarters for the collection of materials, etc. As part of the national household waste management program (PNDM), the Oum Azza technical recovery center was created, which is also the first center in Africa. This center has largely solved the problem of the uncontrolled landfill of Akreuch as well as the collection and recovery of waste.

3.2.4 Security

According to those surveyed, safety is satisfactory at the level of the prefecture with a rate of 42 %, as for safety at the level of means of public transport; it is unsatisfactory with a percentage of 37 %, Fig. 9.

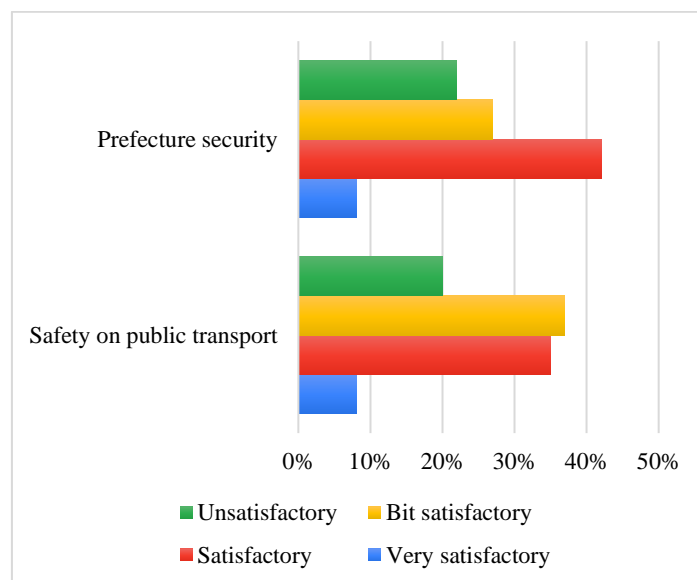


Fig. 9: Satisfaction rate of the surveyed population with regard to security.

As for security in Rabat, it is between satisfactory and unsatisfactory at the level of public transport as well as at the level of the prefecture. These results stipulate that at the level of the prefecture as in all cities, there are secure districts and others less secure.

As a solution to improve security in Rabat, the Concept of "co-production" of security is interesting insofar as the integration of the state and civil society is concerned.

Co-production with civil society is a benefit for security policies and human rights: it makes it possible to consider the needs and specificities of different audiences. The expertise of civil society is complementary to that of the professionals. This co-production promotes the feeling of belonging to the city, ensures a better appropriation of public spaces, devices: an active and responsible civil society. It improves relations with institutions (interknowledge, transparency of public action) and therefore the feeling of social cohesion and security and guarantees proximity with the inhabitants: cities and local authorities are best placed to lead this co-production, act as intermediary with other institutions. The participation of civil society is to be increasingly encouraged [19].

3.2.5 Living environment in the Rabat prefecture

Human beings have been and will be searching for shelter and a safe and relaxing place from the earliest days of their creation [20]. An individual's perception of their place in life, within the context of the culture and value system in which they live, in relation to their goals, expectations, norms and concerns. It is a broad conceptual field, encompassing in a complex way the physical health of the person, his psychological state, and his level of independence, his social relations, his personal beliefs and his relationship with the specificities of his environment [21].

At the level of our questionnaire, the five axes addressed out of seven are satisfactory and two axes are unsatisfactory. What is satisfactory concerns the quality of life generally with 43 %, the quality of buildings with 49 %, the quality of green spaces with 45 %, public lighting with 49%. Regarding what is unsatisfactory, it concerns local facilities with a percentage of 41 % and leisure spaces with 39 %, Fig. 10.

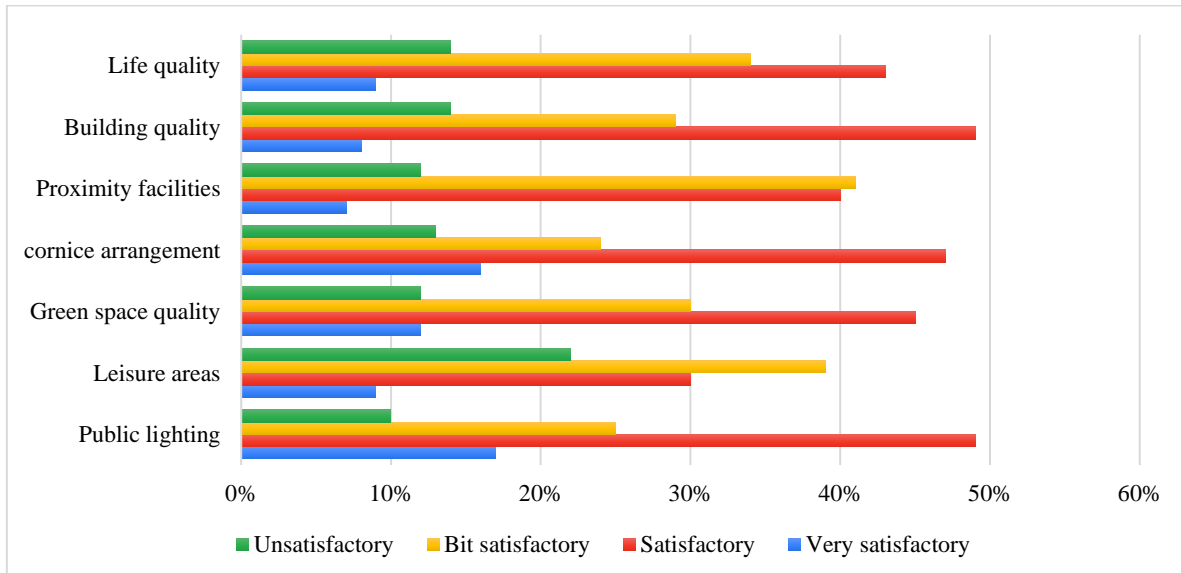


Fig. 10: Perception of the living environment in Rabat.

The general living environment offered by Rabat to its population is satisfactory. From 6 points addressed in this questionnaire, only the leisure areas and local facilities are unsatisfactory. This observation is linked, among other things, with the post-colonial period of Morocco, where Rabat was the object of migration and rural exodus, generating unhealthy neighborhoods with high densities and a total absence of urban planning. Currently Rabat as part of the National Initiative for Human Development (INDH), intended to bring sports and educational activities closer to residential areas. The establishment of these lands is also part of the integrated program "Rabat City of Light, Moroccan Capital of Culture" with the objective of integrating young people into social life and protecting them against all forms of delinquency, as well as develop cultural and sporting activities in the city. The

project contains more than 100 playgrounds (football, basketball, volleyball, handball and skateboarding courts).

From 500 people surveyed, the satisfaction rate with the territorial components varies between satisfactory and unsatisfactory. According to the results, 60 % of the components addressed in this questionnaire are satisfactory, 30 % are a bit satisfactory and 10 % are unsatisfactory.

3.3 Population and sustainable development

One of the greatest challenges that architects and planners face today is controlling operating costs and creating more liveable spaces in neighbourhoods and cities through sustainable designs [22]. It is not rare that development plans and projects fail because they do not meet people's needs and because they destroy or damage the natural resource base. Both present and future generations suffer the consequences. Development and conservation are not contradictory. On the contrary, they are two inseparable components of sustainable development. Development without conservation deprives future generations of all well-being, while conservation without development deprives present generations [23].

The objective of this axis phase is to know if the surveyed population is initiated to sustainable development, climate change, urban planning documents, active at the level of civil society, etc.

The result concerning the consultation of planning documents reveals that 15 % of the surveyed population confirmed having already consulted a planning document. The town planning documents consulted are mainly the development plan, the master plan for urban development, Fig.11.

The ignorance of the city planning component by the population surveyed is an alarming phenomenon in this study.

The responsibility is shared between the citizens and the State, such as:

- Total absence of mediatization; awareness raising among citizens on the importance of consulting town planning documents;
- The timid communication of the date of projection of the development plan at the level of the municipality so that the population formulates their remarks before its approval;
- Difficulty in consulting city planning documents at the level of the administrations concerned;
- Citizens' disinterest in the urban planning aspect, etc.

Its elements are all factors that mean that the majority of the population has never consulted an urban planning document.

The active population in the civil society is 20 %, including only 5 people who are active in the sectors of development, urban planning and the environment.

The rate of people active in civil society is also one of the indicators of the interest that this population has in its territory, this interest is almost absent in the field of the environment, city planning and development, Fig. 12.

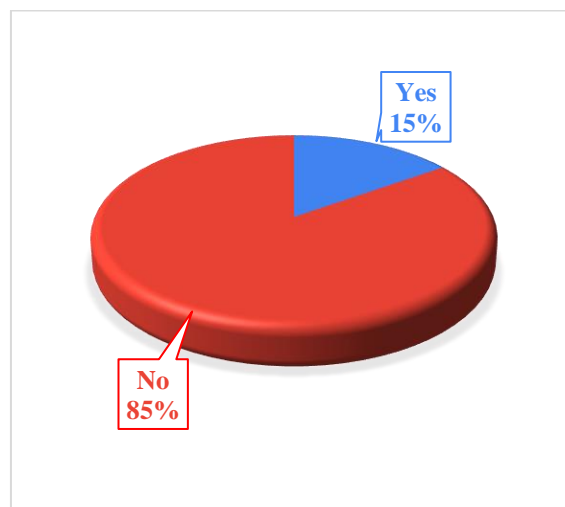


Fig. 11: Rate of people having consulted an urban planning document.

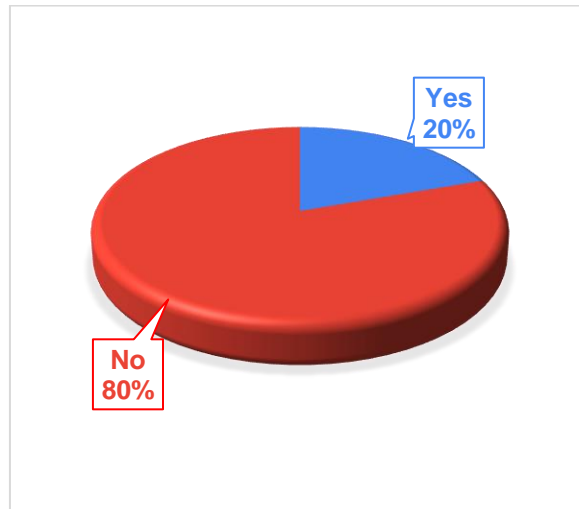


Fig. 12: Rate of the active population in the civil society.

Awareness of the effects of climate change is strong among the population surveyed, 94 % said they were aware of this phenomenon. Being a global phenomenon, the effects of climate change worry the entire globe. The surveyed population is also aware of this fact. This result can only confirm the importance of the role played by the media and social networks in sensitizing and alarming the population.

83 % of those surveyed confirmed that they wanted to participate in the implementation of sustainable development projects.

The last closed question in this questionnaire is a question that deals with the desire to participate in the process of change towards a sustainable city through participatory urban planning. Almost all of the people expressed the will to be part of this process.

To succeed in this transformation, 68.6 % of the population surveyed think that it is necessary to opt for a model of sustainable development that combines foreign models and the territorial, social, economic and environmental specifications of Rabat; 26.4 % think Morocco should create its own sustainable development model; 5 % think a foreign model should be followed, Fig. 13.

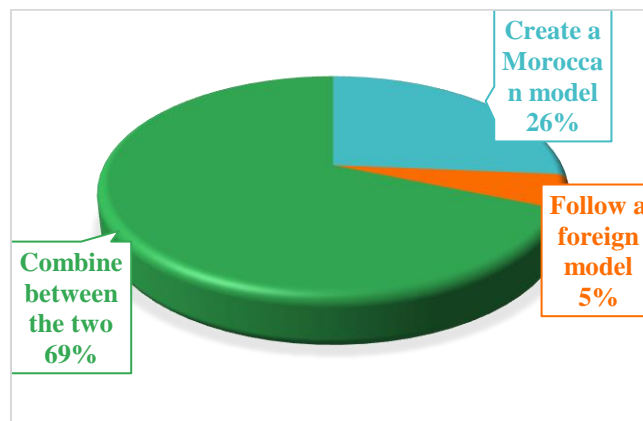


Fig. 13: The model to follow according to the surveyed population to succeed in the sustainable development process.

Those surveyed also agreed that to make this transition a success, it is necessary to base ourselves on existing sustainable development models and adapt them to the Moroccan context generally and to Rabat specifically.

Concerning this axis, the report is mitigated between the ignorance of the city planning aspect and the strong will to take part in the sustainable development process.

Among the dysfunctions mentioned in the questionnaire, we will mention: the disparity between the districts of the prefecture; traffic jams, the absence of public toilets; insufficient parking, non-use of renewable energy; the non-indication of information on routes and durations at the level of some means of public transport; land speculation; air pollution ; the begging phenomenon; the lack of

security in some neighborhoods; the lack of e-administration; adapting the perception and policy of tourism in the city of Rabat and trying to create tourist poles that reflect the image and identity of the prefecture; street vendors and informal sector activities; the state of the road network at the level of some districts; lack of entertainment and accessibility for people with reduced mobility.

The city of Rabat is satisfactory in terms of public services. However, the disparity known between her different neighborhoods. The recent connection of marginalized neighborhoods to the rest of Rabat by adequate public transport has softened some of these disparities. We also believe that students are in need of spaces dedicated to them and at their disposal, public spaces or facilities, with free access. We also think that there is a huge supply of work that could be generated in Rabat, and which could make it an economic hub within the region that would never risk being deposited. The connection between Rabat and neighboring towns must be strengthened with appropriate infrastructure and accessible means of transport. Nevertheless, we must also think about increasing job offers in Rabat and regulating informal works, so that it can generate constant incomes and it would no longer harm the proper functioning of the city.

4 Conclusion

Local government and experts can recognize needs, potential and capacities for local development more clearly and comprehensively [24]. But the integration of the population in the process of sustainable development is now a necessity to create an integrated territory that integrates all the components.

General observation, the aspirations of Moroccans reflect the depth and immensity of the work of transformation to be carried out to put in place a "New Model of Development" bringing hope and confidence in the future : a transformation that not only triggers greater value creation, but also an equitable sharing among all citizens; a transformation that does not only lead to more production, but also to an expansion of the actors concerned by this production and balanced relations between State and society, consecrating the centrality of citizens, in their rights and their duties. The analysis of adaptation possibilities should be based on the identification of factors affecting the transformation of urban infrastructure, urban building developments and urban systems, such as the natural system (biologically active areas), public spaces system and mobility system in relation to the functional and spatial structure in the urban land-scape [25].

Citizens in demand for quality public services and work opportunities, but also for empowerment and emancipation. So that everyone, according to their potential, aspirations and desires, can assume an active role in the development of the Nation [26].

For the study to be exhaustive, we have planned to leave the last question in the questionnaire open to allow each participant to quote their opinion and the dysfunctions that they believe are important for improving the quality of life in Rabat. Nature rehabilitation and considering of biodiversity announce new paradigms likely to change the ways of managing cities or are they only ways of remedying in a homeopathic way urban dysfunctions? In the form of puns, can we ask ourselves if it is simply a question of "rethinking" the most glaring evils, that is to say providing partial medication, instead of rethinking the place of the living in the city [27]?

References

- [1] HAMMAN, P.: Sustainability and social bond: transition and transaction in experimentation, *Sociologies*, June, 2016, <https://sociologies.revues.org/5384>, consulted on April 3, 2017.
- [2] ZETLAOUI-LÉGER, J.: Participatory urbanism, 2013. In CASILLO, I. - BARBIER, R. - BLONDIAUX, L. - CHATEAURAYNAUD - FOURNIAU, J. M. - LEFEBVRE, R. - NEVEU, C. - SALLES, D.: Dictionary critical and interdisciplinary of participation, Paris, GIS Démocratie & Participation, <http://www.dicopart.fr/fr/dico/urbanisme-participatif>.
- [3] EMELIANOFF, C.: Sustainable city. *Ecological Thought Dictionary*, 2015, pp. 1038-1042, halshs-02898892.
- [4] VAN DEN HOVE, S.: Participatory approaches for governance in sustainable development: an analysis in terms of effects, *Cahier du C3ED – University of Versailles*, 2000.
- [5] Dahir n 1-03-59 of 10 rabii 1 1424 (12 May 2003) promulgating law No. 11-03 relating to the protection and development of the environment.
- [6] Dahir n 1-03-60 of 10 rabii I 1424 (12 May 2003) promulgating law No. 12-03 relating to environmental impact assessment.
- [7] Dahir n 1-03-61 of 10 rabii 1 1424 (12 May 2003) promulgating law No. 13-03 relating to stund

against air pollution.

- [8] Dahir n 1-06-153 of 30 chaoual 1427 (November 22, 2006) promulgating law No. 28-00 relating to waste management and elimination.
- [9] Dahir n 1-16-113 of 6 Kaada 1437 (August 10, 2016) promulgating law No. 36-15 relating to water.
- [10] Canadian Institute of Chartered Accountants, Article taken from the Accounting and Financial Management Dictionary, version 1.2, 2006.
- [11] RYSZ, K. - MAZUREK, K.: Contemporary foundations of the theory of urban development – case study smart, slow and compact city theory. *Environmental & Socio-economic Studies*, Vol. 3, No. 4, 2016, pp. 39-46, <https://doi.org/10.1515/enviro-2015-0072>.
- [12] High Commission for Planning, General Population and Housing Census, 2014.
- [13] Ministry of the Interior, General Directorate of Local Authorities, The Rabat – Salé-Kénitra region, general monograph, 2015.
- [14] Ministry of energy transition and sustainable development – environment department: Regional information system for the environment and sustainable development Rabat Salé Kénitra. HPC, RGPH 2014, <https://siredd.environnement.gov.ma/Rabat-Sale-Kenitra/Home/Region> Statistics Canada, Age Categories — Life Cycle Groups, 2017.
- [15] POIROT, J. - HUBERT, G.: The Attractiveness of Territories: A Multidimensional Concept, *Developing Worlds*, Vol. 149, No. 1, 2010, pp. 27-41.
- [16] MOUTTAKI, A.: Rabat, intelligence in the light of urban constraints, *Geographic space and Moroccan society review*, 2021, pp. 45-46.
- [17] MOULOUDI, H.: Waterfront development projects in Rabat (Morocco). Action systems and stakeholder strategies, *Les Cahiers d'EMAM*, 22 | 2014, online December 31, 2013, accessed February 12, 2023. <http://journals.openedition.org/emam/568>, doi: <https://doi.org/10.4000/emam.568>
- [18] BOUNOUAR, F.: Citizen's role in promoting urban security, Seminar proceedings, Security sector governance at the local level, 2020.
- [19] MOHAMMADIAN, Z. - SHAHBAZI, M.: Study of the Effect of Sustainable Architecture on the Design of Residential Buildings (Case Study: Qazvin Pardis Complex). *Civil and Environmental Engineering*, Vol. 14, Iss. 2, 2018, pp. 91-98, <https://doi.org/10.2478/cee-2018-0012>.
- [20] NESS, G. D. - GOLAY, M. V.: Population and strategies for national sustainable development: Guide for national policy makers: how to take population and environment into account in sustainable development strategies? IUCN, Gland, Switzerland and Cambridge, 1997, UK. Xii, +184 p.
- [21] ABD EL AZIZ - NOHA AHMED: Water Sensitive Landscape Case Study: Public Open Green Spaces in Naser City, Egypt. *Journal of Landscape Ecology*, Vol. 9, No. 3, 2016, pp. 66-83. <https://doi.org/10.1515/jlecol-2016-0015>.
- [22] WHOQOL Group: Development of the WHOQOL: Rationale and current status. *International Journal of Mental Health*, N. 23, 1994, pp. 24-56
- [23] SUBASIC, B. - OPACIC, B.: Challenges of the Cultural Policies as a Sustainable Development Engine: Example of a Good Policy / City of Pancevo. *Journal of Heterodox Economics*, Vol. 2, No. 1, 2016, pp. 29-58, <https://doi.org/10.1515/jheec-2015-0011>.
- [24] GROCHULSKA-SALAK, M.: Re-Urbanization in a Model of Sustainable Development of an Eco-City. *Acta Scientiarum Polonorum Architectura*, Vol. 20, No. 1, 2021, pp. 3-12, <https://doi.org/10.22630/aspa.2021.20.1.1>.
- [25] The Special Commission on the Development Model. The New Development Model, General Report, Unleashing Energies and Restoring Confidence to Accelerate Progress and Prosperity for All, April 2021.
- [26] ARNOULD, P. - LE LAY, Y. F. - DODANE, C. - MÉLIANI, I.: Nature in the city: the improbable biodiversity, *Geography, economy, society*, Vol. 13, 2011, pp. 45-68.