

## TERRITORY AND SCIENCE AGAINST HEGEMONIC: A FOUNDATION FOR THE PREPARATION AND MANAGEMENT OF SOCIAL POLICIES\*

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**Abstract:** Presenting a reflection around concepts that expand the view of science as managers and researchers is the objective of this essay. Thinking about a new methodological appropriation of research is essential, as well as transmitting this renewal to the elaboration and territorial management of public social policies is urgent. Based on the experience in the territorial management of social assistance in Londrina-PR, we seek to dialogue through a counter-hegemonic perspective, to think about the practical elaboration of socio-territorial policies, in addition to presenting contributions to rethink the manipulation of territorial information. It is based on active methodologies, such as social cartography, and the conception of popular science to value the speeches and knowledge of the population, in order to empower those who carry the knowledge of the cause and, with this, transform them into active subjects, which could enable an effective and authentic renewal of social participation in the sphere of power, considering the diversities and subjectivities present in the territories of experience.

**Keyword:** Against hegemony, Popular science, Social politics, Social cartography, Territory.

### O TERRITÓRIO E A CIÊNCIA CONTRA HEGEMÔNICA: ALICERCE NA ELABORAÇÃO E GESTÃO DAS POLÍTICAS SOCIAIS

**Resumo:** Apresentar uma reflexão em torno de conceitos que ampliam a visão de ciência como gestores e pesquisadores é o objetivo deste ensaio. Pensar em uma nova apropriação metodológica do fazer pesquisa é indispensável, bem como transmitir essa renovação para a elaboração e gestão territorial das políticas públicas sociais é urgente. A partir da experiência na gestão territorial da assistência social de Londrina-PR procura-se dialogar através de uma perspectiva contra hegemônica, para se pensar na elaboração prática das políticas sócio-territoriais, além de apresentar contribuições para repensar a manipulação das informações territoriais. Pauta-se em metodologias ativas, como a cartografia social, e na concepção de ciência popular para valorizar as falas e os saberes da população, a fim de empoderar os portadores do saber de causa e, com isso, transformá-los em sujeitos ativos, o que poderá viabilizar uma renovação efetiva e autêntica da participação social na esfera de poder, considerando as diversidades e as subjetividades presentes nos territórios de vivência.

**Palavras-chave:** Cartografia Social, Ciência Popular, Contra hegemonia, Políticas Sociais, Território.

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## EL TERRITORIO Y LA CIENCIA CONTRAHEGEMÓNICA: BASE PARA LA ELABORACIÓN Y GESTIÓN DE POLÍTICAS SOCIALES

**Resumen:** Presentar una reflexión en torno a conceptos que amplían la visión de la ciencia como gestores e investigadores es el objetivo de este ensayo. Pensar en una nueva apropiación metodológica del hacer investigación es indispensable, así como transmitir esa renovación para la elaboración y gestión territorial de las políticas públicas sociales es urgente. A partir de la experiencia en la gestión territorial de la asistencia social de Londrina-PR, se busca dialogar a través de una perspectiva contrahegemónica, para pensar en la elaboración práctica de las políticas socio-territoriales, además de presentar contribuciones para repensar la manipulación de la información territorial. Se basa en metodologías activas, como la cartografía social, y en la concepción de ciencia popular para valorar las voces y los saberes de la población, con el fin de empoderar a los portadores del saber de causa y, con ello, transformarlos en sujetos activos, lo que podrá viabilizar una renovación efectiva y auténtica de la participación social en la esfera de poder, considerando las diversidades y las subjetividades presentes en los territorios de vivencia.

**Palabras clave:** Cartografía Social, Ciencia Popular, Contrahegemonía, Políticas Sociales, Territorio.



### Introduction

The following elaboration arises from the reflection on the results of work already carried out in the municipality of Londrina that contributed to public management and provoked, in its development, the need to carry out discussions on the creation of management methods that include popular knowledge and qualitative information as fundamental techniques for understanding life contexts. To this end, the text explores the discussion of counter-hegemonic science by working on socio-territorial information in order to present reflections that add more subjective knowledge about the territories in which communities live. The results of the projects already carried out have improved the access to the territorialized information from the Social Assistance Secretariat and have developed other tools to support the management of public policies of social assistance services. Based on the results already achieved, although systematic objectives, this essay aims to highlight the incorporation of the use of unconventional forms of management such as social cartography, appropriating theories of popular science in order to promote reflection and rupture of the dominant paradigm strongly instilled in the administrative structure of public organizations – which for years have followed hierarchical patterns and vertical forms in decision making.

In recent years, the number of studies related to territorial problems and their implications in social policies has increased, just as there are a great movement returning to value the local scale in the understanding of global contexts through several joint and interdisciplinary methodologies.

In Geography, local studies aimed to comprehend territorial particularities aroused a resumption of studies of popular science, of emerging/subversive knowledge and practical knowledge, culturally inherited. For decades, authors have elaborated studies which evinced popular science and the practical knowledge against hegemonic as fundamental objects to comprehend territories and their particularities, all of them carrying interdisciplinary arguments that highlight philosophers, anthropologists and geographers from Latin America and Europe.

Due to the relevance of this discussion and the studies already carried out in the city of Londrina, there is a need for greater depth and urgency in the insertion of studies of popular knowledge guided by territorial themes linked to participatory research on social cartography and other cooperation methodologies. With the development of the theoretical and methodological framework that we wish to achieve in this essay, we intend to support and give meaning to alternative practices of territorial management where public policies of a social scope are implemented. In this sense, the methodological procedures that supported this reflection were: a) a theoretical-methodological

discussion based on a theoretical-philosophical framework about the issues that permeated the analysis; b) analysis of the research materials that encouraged this reflection, therefore, intrinsically related to the concerns present in the essay.

The article is structured from topics which aim to raise the discussion of general concepts of popular science against hegemonic as empowerment, of social cartography as an active method, of the characterization and trajectory of social assistance policy as a field of application of these demands, and, to conclude, a reflection around the territory and popular science as presuppositions for the application of the participative-research-action.

### The popular science against hegemonic as a presupposition to the socio-territorial empowerment movement

Quizá de estos empeños resulte no sólo una ciencia social más respetable, firme y propia nuestra, con una más clara definición de la crisis latinoamericana, sino también una política eficaz de cambio que lleve a una sociedad superior a la existente. Tal es la responsabilidad de los hombres de ciencia, y tal el engagement que adquirimos ante el mundo y ante la historia. (FALS, BORDA, 2015 p. 252)

To think about socio-territorial empowerment it is needed to enter into the core of the territorial logic of power which emanates from the central contradiction that exists inside the capitalist way of production, in other words, between the social and capitalist territorial logic. The capitalist operate aiming at the abstract space, in turn, the social actors are based on the concrete space – the lived space, that is, the absolute territory. In this movement derive the power relations which permeate the social practice executed in the territory (in the dimensions: economic, political, cultural, nature).

In this game of appropriation forces of concrete territory by the abstract, in which the lived space as a result of lives, of temporality of the social actors begins to be absorbed by the rhythm and the interest of the abstract space. Both interpenetrate in the historical process of space social production, however it is “[...] também a história de sua separação, de sua contradição. O dominante o conduz [o arrasta/prevalece]”. (LEFEBVRE, 2006, p. 233).

In the face of this separation/contradiction and, mainly, the domination trajectory from one under the other, which is part of the reflection about the popular science or popular knowledge that, as Fals Borda defends “[...] el conocimiento empírico práctico de sentido común, que ha sido procesión cultural e ideológica ancestral de las gentes de las bases sociales, aquél que les ha permitido crear, trabajar e interpretar predominantemente con los recursos directos que la naturaleza ofrece al hombre” (1981, p.22), because it can be the path to be followed by researchers to deal with the power of abstract space in order to prevail the interests of concrete space, perceived and lived by the social subjects.

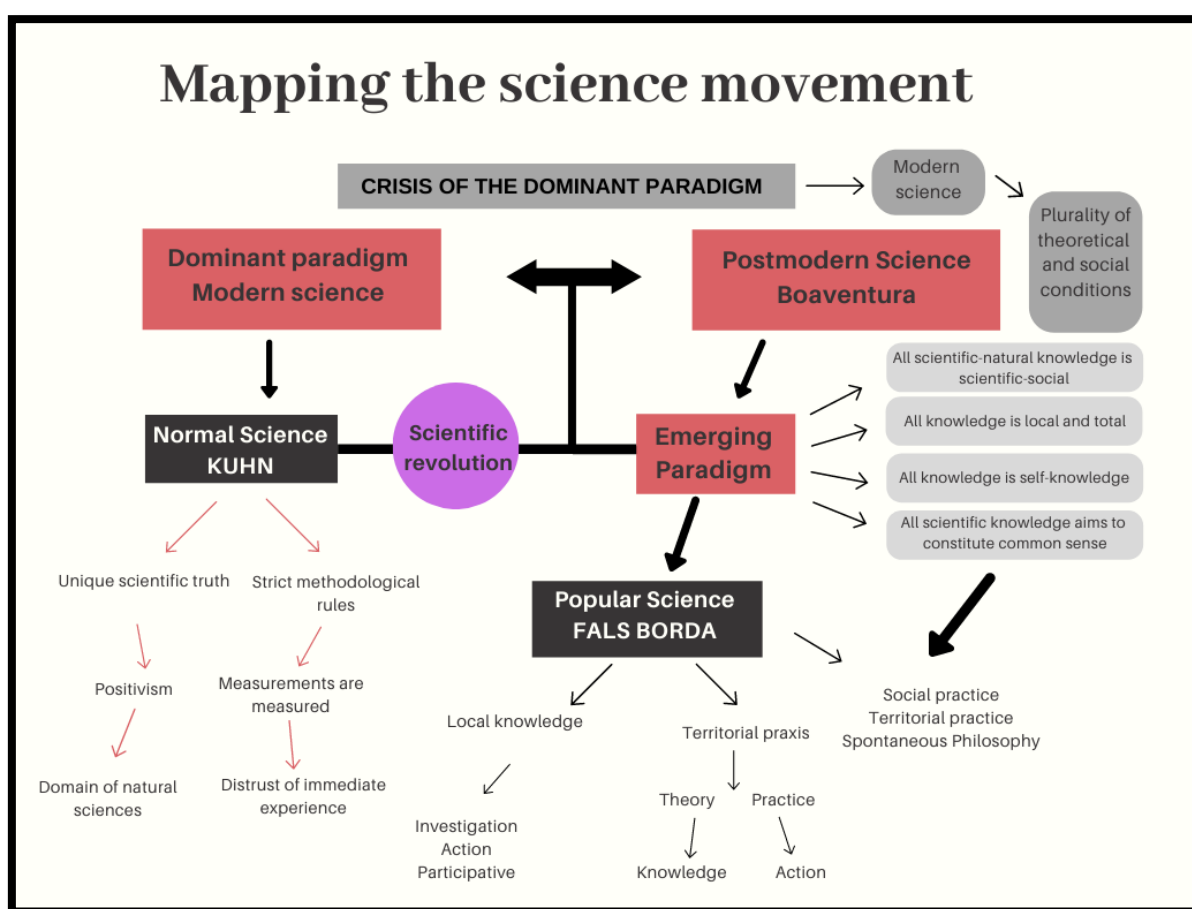
It is based on the premise that the popular knowledge can establish the resistance mechanisms and the fight against hegemonic in the face of science dominant paradigm – the modern science, the one appropriated by the interests of the dominant elite. This science is denominated by Kuhn (1975, p.45) as normal science, which leads the enclosure of the scientist's mind, since “A ciência normal não tem como objetivo trazer à tona novas espécies de fenômenos; na verdade, aqueles que não se ajustam aos limites do paradigma frequentemente nem são vistos”. This modern science paradigm reinforced a scientific vision based on the rigor of scientific procedures (rules, methods<sup>3</sup>, techniques)

<sup>3</sup> The conception of Feyerabend (1977), in his work “Contra o método”, stands out with regard to his questioning of the domain of a single method and in favor of an “anarquismo epistemológico” in methodological terms of a “pluralismo metodológico”.

which pursues a rationality accepted as the only scientific truth, based on the positivism principles, having the domain of the natural sciences. The configuration of modern science brings in its matrix the segmentation of knowledge in disciplines, linked to the discourse of the positivist-scientific ideology, as Foucault says “Sob aquilo que se denominou o progresso da razão, o que se passava era o disciplinamento de saberes polimorfos e heterogêneos” (2002, p.218).

In Figure 1 it is possible to visualize the movement of change in science, the aim of this representation is to provide a reflective construct on the key points of dominant paradigm, the cracks of the crisis which foster paradigmatic transition movement, to think about the popular science’s role in the emerging paradigm, which is designated by Santos (2002a,2010) as “ciência pós-moderna”.

Figure 1



When carrying out a hermeneutic reflection<sup>4</sup> about science, Santos (2002a) has as central defense his antipositivist epistemological stance, and bases his argument in the conception that scientific knowledge must be seen as socially constructed, once its objectivity does not imply neutrality. In face of this defense, it demonstrates the fracture of the dominant paradigm binded to theoretical and social conditions, which refers to the crisis of modern science.

<sup>4</sup> Boaventura de Sousa Santos points that: “A reflexão hermenêutica permite assim romper o círculo vicioso do objecto-sujeito-objecto, ampliando o campo da compreensão, da comensurabilidade e, portanto, da intersubjectividade, e por essa via vai ganhando para o diálogo eu/nós-tu/vós o que agora não é mais que uma relação mecânica eu/nós-eles/coisas” (2002, p.15).

The theoretical conditions that had an influence on scientific rationality changes are the results of advances in knowledge, provided by the dominant paradigm, once “O aprofundamento do conhecimento permitiu ver a fragilidade dos pilares em que se funda” (SANTOS, 2010, p.24). In summary, the author presents four central theoretical gaps suffered in this science movement, namely: 1st) Einstein (theory of relativity), by admitting arbitrariness in time and space, thus made possible the perception of scientific rationality relativism; 2nd) Heisenberg and Bohr, by demonstrating that it is possible to observe or measure an object without interference, thus the object is changed when passing through measurement process, which refers to Heisenberg’s uncertainty principle by affirming that what we know from reality and acting on it; 3rd) Incompleteness theorem, which questions the measurement rigor, linked to the postulates of quantum mechanics; 4th) advances in the knowledge of microphysics, chemistry and biology, beginning to admit that changes occur through microscopic phenomena in a non-equilibrium situation, in an open system, which can lead to a new macroscopic state.

Regarding the social conditions which reflected in the crisis of the dominant paradigm, Santos (2010) considers that they are intrinsically related to the theoretic advances that excite an epistemological reflection through the scientists, which starts to realize the need of a philosophical analysis of science or scientific practice, which was repulsed by the positivist point of view, that leads to the “[...] desejo quase desesperado de complementarmos o conhecimento das coisas com o conhecimento do conhecimento das coisas, isto é, como o conhecimento de nós próprios” (Ibid, p. 30). This “desire” merges with the concern in relation to social and cultural conditions of the models of scientific research, and becomes part of the epistemological reflection. To this reflection unites the matter of the content of scientific knowledge, mainly in view of the fact that “Sendo um conhecimento mínimo que fecha as portas a muitos outros saberes sobre o mundo, o conhecimento científico moderno é um conhecimento desencantado e triste[...]” (Ibid, p.32). This characteristic combines with the scientific rigor, which is based on mathematical logic, which has as a rule that any phenomenon that cannot be measured, quantified, is not an object of science.

By pointing out the theoretical and social conditions which ignite the crisis of the science dominant paradigm, it is possible to foresee that its basis is on an unstable area, once: “A configuração do paradigma que se anuncia no horizonte só pode obter-se por via especulativa. Uma especulação fundada nos sinais que a crise do paradigma actual emite, mas nunca por eles determinada” (Ibid, p. 36).

The characteristics of the emerging paradigm – postmodern science – carries with it the cracks to be repaired through a scientific conception that promotes a path in the direction of Fals Borda’s words (2015) – which is in the epigraph of this topic – that is, the scientist takes the responsibility for the territory, the social context that is included, in favor of a territorial praxis involved in social engagement. That such engagement can promote a socio-territorial empowerment of society, as the author defends that sociology (social science) has to renounce its position of a “post-mortem science” to give rise to purposeful and more responsible research techniques before the socio-territorial inequality experienced by population with the hegemonic power of modern science at the service of a dominant elite.

The thinking of Fals Borda has an interlocution with Boaventura’s, in the moment which the studies from the first one about the “popular science” gain resonance in the emerging paradigm analyzed by the second one, in the words of Santos “Sendo uma revolução científica que ocorre numa sociedade ela própria revolucionada pela ciência, o paradigma a emergir dela não pode ser apenas um paradigma científico (o paradigma de um conhecimento prudente), tem de ser também um

paradigma social (o paradigma de uma vida decente)” (2010, p.37). In Figure 1 it is possible to observe the author thesis about the emerging paradigm. It is not the objective of this essay to analyze these thesis, but to seek to explore the interconnection between this “revolutionary” movement of science, with the defense of the potentiality of “popular science”, within this movement, in order to underpin an against hegemonic knowledge. It is worth saying that: “A contra-hegemonia, portanto, é construída para (o) e pelo povo, do campo e da cidade, contra a ordem político-econômica-cultural dominante [...] numa práxis dialógica, participativa, respeitosa, solidária, cultural e ecológica” (SAQUET, 2019, p.32, emphasis of the author).

The theses which configure the paradigm of postmodern science go through two ruptures, involved in the following questions: 1st) how is science done? and 2nd) what do we want science for? According to Santos (2002a), these questions allow scientists to reflect the role of the hegemony of modern science in society and to think how: “Contribuirá a ciência para diminuir o fosso crescente na nossa sociedade entre o que se é e o que se aparenta ser, o saber dizer e o fazer, entre a teoria e a prática?” (SANTOS, 2010, p.7). On the same reflective track, Fals Borda instigates the researcher to think “En especial, qué exigencias nos ha hecho y nos hace la realidad del cambio en cuanto a nuestro papel como científicos y en cuanto a nuestra concepción y utilización de la ciencia?” (2015, p.253).

From these questions raised by the authors, it is clear that the core of the paradigmatic transition of science is found in science conception and from it will exude the form of scientific doing, which is tied to the method present in the theses: 1) All knowledge is local and total; 2) All scientific knowledge aims to consist of common sense. These theses refer to the posture of a “methodological transgression”, since the “doing science” will be based in the socio-territorial conditions, therefore, it will not start from the predetermined theoretical-methodological imposition arised from the dominant knowledge, but will be elaborated in territorial praxis.

Since the motor idea that questions the imposed rationality aims a transformative rationality is founded on territorial praxis, through the recognition of popular knowledge, which brings in its essence “[...] su propia racionalidad y su propia estructura de causalidad, es decir, puede demostrarse que tiene mérito y validez científico en sí mismo” (FALS BORDA, 1981, p.22). It is exactly this potential popular knowledge that must be valued, heard and brought to light through research that transposes the method (FEYERABEND, 1977) established by the dominant science, to break the “law of silence” hitherto applied to other knowledge, which can fracture the modern science edifice, built by a minority of intellectuals that claimed the power of scientific knowledge as the only truth, by breaking with this logic the popular science expresses its subversive power and its potential against hegemonic (SANTOS, 2002b, 2010; FALS BORDA, 1981, 2015).

The motto of the potentiality of popular science as a basis for tracing a science that can provide socio-territorial empowerment is based in this transposed method through research procedures that can make the population’s voice be heard, by seek for different forms of active participation from social subjects in the research their empirical, concrete, vital knowledge of their territory to be incorporated in the proposal of action of elaboration of public policies for territorial development, in the perspective that the “man of science” has to assume an “commitment-action” before the living territory, with a purposeful research, not working “post-mortem science”. Accordingly, Saquet defends that “A construção da ciência popular e contra-hegemônica, então também passa pelo território-lugar, enraizamento, pela proximidade social, territorialidade ativa (...)” (2019, p.44).

Commitment-action runs through the question: what is science for? For, the commitment-action is that it will guide the scientist-researcher to make decisions related to his research methodological



practice (theme, technique, research group-subject), focusing on whom science can contribute for, in the words of Fals Borda:

El compromiso-acción es, esencialmente, una actitud personal del científico ante las realidades de la crisis social, económica y política en que se encuentra, lo que implica en su mente la convergencia de dos planos: el de la conciencia de los problemas que observa y el del conocimiento de la teoría y los conceptos aplicables a esos problemas.  
(Fals Borda, 2015, p. 244)

Therefore, the commitment-action subtends to a vision of science that converges and paves the way of a science emerging paradigm which allows research to turn to the “[...] pautas sociales y por trascendentales cambios políticos que llevan a los científicos a una evaluación de su disciplina y a una reorientación de la misma. De este proceso van resultando no sólo la acumulación del conocimiento científico sino también su enriquecimiento, su renovación, su revitalización” (FALS BORDA, 2015, p.252). From this commitment-action results the methodological practice of participatory-action-research (IAP), which aims at a methodological and interdisciplinary plurality, and is based in popular knowledge, mainly, emphasizes the dialogic-participant technique, to hear the voices of who lives the territory. At the same time, it refutes the basic characteristics of normal science, that is, renounces the arrogance of scientific knowledge; breaks the asymmetrical relation between researcher (interviewee) and researched (interviewer) to enter in popular knowledge; insert the subjects in an active and present way in the investigation, therefore “[...] el método de investigación-acción y con el apoyo de las ciencias emergentes y subversivas” (FALS BORDA, 1981, p.34).

The intrinsic concern with the forms of social participation stands out in the territory norms, when thinking about the science role, linked to a territorial development. In this analysis, the importance of methodological practices that can provide direct participation by population in the elaboration of socio-territorial public policies is highlighted. In this case, it is believed in the potential of social cartography, as a tool to insert popular knowledge, in the perspective of achieving alternatives of participation that contradicts with the hegemonic model of power, which Santos and Avritzer (2003, p.14) call as counter-hegemonic practices:

[...] teoria contra-hegemónica da democracia: os actores que implantaram as experiências de democracia participativa colocaram em questão uma identidade que lhes fora atribuída externamente por um Estado colonial ou por um Estado autoritário e discriminatório. [...] implica questionar uma gramática societária e estatal de exclusão e propor, em alternativa, uma outra mais inclusiva. (Santos e Avritzer, 2003, p.14)

It is observed that the science movement in this paradigmatic transition process aims to recognize that it is necessary to penetrate other knowledge and make the light of these knowledge shine, which were extinguished by the power of the light irradiated by modern science.

As such, it is considered that by developing social research, as the focus of this investigation, it is up to public social assistance policies to appropriate of mythological practices, such as social cartography, which provides population to exercise its power, through the socio-territorial empowerment in the search of a social emancipation, because “A práxis territorial, portanto, tem o essencial significado da unidade teoria-prática, empiria-dedução, pensar-fazer, juntamente com a sua politização, no nível da consciência e da vida cotidiana feita de ações e reações, concretudes e abstrações” (SAQUET, 2019, p. 97).

Therefore, this revolutionary science movement has to follow a convergence line between science – the systematized knowledge and the popular knowledge – to be applied in favor of a territorial development, based in the territorial praxis against hegemonic. In this context, it is considered essential to present reflections on active methodologies that aim at the authentic participation of the population in the elaboration and monitoring of public policies, such as social cartography, which will be the core of the reflection in the next topic.

### The social, alternative, popular or subversive cartography

Social Cartography is understood as a new tool linked to planning and social transformation, “being used for the participatory-action-research and communitarian development” (LANDIM NETO et al, 2013). It is a way of planning practiced in opposition to the hegemonic model, being a territorial construction in which the power relation is transformed through the active participation of the inhabitants in the living territories, where the general interests strive to guide policies and its specificities.

Cartography, as well as the methodologies incorporates in the use of cartographic representations, shapes a technical, objective and imposition language. With great progress in times of war, it can be said that cartography has been improved to obtain control and power, in most of the time in history being used as intelligence tool which determines decision making of great importance. Clearly, decisions from the highest levels of government.

The map has always been in favor of dominant groups, it ended up intensifying its use as an important management tool, as well as being improved and caused even more detachment through the utilization of specific languages and high technology, selecting its use to a restricted group, which complicates the understanding and makes it available to a few. In the same way, there was a look about the geographic information system (GIS), which are generally perceived as an exclusive tool for technical and objective management and not, contrary to the discourse or the map, on the side of subjectivity, of argumentation, of ideas, of representations and of discussion. Joliveau had already said that cartography, for sure, strived for many years to demonstrate accuracy, neutrality and objectivity rather than to be obstinate in its uncertainties and subjectivity (2008. p.50).

Cartographic representations were perceived for long periods as an exclusive product of technicians or “knowledge bearer” through languages and codes which made it difficult for laypeople to access in its capacity and totality. An example are the rare exceptions in which the cartography power was used by the hands of minorities – where interpretations of adverse causes are possible and thereby contested. However, it is also not because of the “lack of domain” under the cartography tools and their analysis that this capacity and scope of map manipulation is denied. It is something far beyond and has a direct relation with the support and maintenance of a capitalist/colonial system that we live in.

It is necessary to review concepts to comprehend why there is a lack of validation of the citizen’s ability to manipulate maps or to learn management tools, whether produced through formal technical resources or simply guided by knowledge of the cause, instinctively and of experience. Informal knowledge, of cause or of praxis from these citizen, are not considered legitimate knowledge products and, therefore, are invalidated or underestimated. It is what we can call, according to Boaventura de Sousa Santos, as “sociologia das ausências”, that is, everything that the canon does not legitimize or recognize is declared non-existent. Non-existence here takes the form of ignorance or inculturation (SANTOS, 2002c, p.247). Non-existence of knowledge, absence of culture and invisibility of the subject



comprises a logic of social classification – necessary for capital – which guarantees the naturalization of hierarchical differences in society, with race and sex being the most evident and problematic. The logic of non-existence is produced in the form of insuperable inferiority because it is natural. “Those who are inferior, because it is insurmountable inferior, cannot be a credible alternative to those who are superior” (SANTOS, 2002c, p.248).

It is in this sense that, searching for ways to break with this paradigm, Santos proposes the reflection about the “ecologia dos saberes”, contrasting the idea of universal truth, or as the author himself suggests, “monocultura do saber”, therefore, the logic of

[...] monocultura do saber e do rigor científico, tem de ser questionada pela identificação de outros saberes e de outros critérios de rigor que operam credivelmente em contextos e práticas sociais declarados não-existentes pela razão metonímica. Essa credibilidade contextual deve ser considerada suficiente para que o saber em causa tenha legitimidade para participar de debates epistemológicos com outros saberes, nomeadamente com o saber científico. (SANTOS, 2002c, p. 250)

The “ecologia dos saberes” seeks to overcome “monocultura do saber” by doing a reverse movement of traditional science based in the dominant paradigm. Its objective is not only identifying the speeches of population in order to legitimize the local knowledge conquered with the praxis, but also to abolish pre-established concepts that make this knowledge known as ignorance inferior. The central idea of the sociology of absences is that there is no ignorance in general, nor knowledge in general. “All ignorance is ignorant of a certain knowledge na all knowledge is the overcoming of a particular ignorance” (SANTOS, 2002c, p. 250).

It is from these reflections that we connect the sociological function of social cartography as an activity that has the potential to extrapolate the fields of traditional research along the lines of the dominant paradigm and enter in what Boaventura calls of “sociologia das emergências”. Whereas the sociology of absences moves in the field of social experiences, the sociology of emergences moves in the field of social expectations. Expectations, therefore, the “sociology of emergences” approaches the future, is the investigation of alternatives that fit the horizon within concrete possibilities. “The sociology of emergences enlarges the present, adding to the broad real the possibilities and future expectations that it holds” (SANTOS, 2002c, p. 257). Thus, it seeks a more balanced relationship between experience and expectation, that is, bringing actions closer to reality acting on possibilities, capacities and possible alternatives of social transformation.

Alternative, popular or subversive cartography must be used to value the space itself. This is how we can also call it “cartography of social action”. The living territories are also resistance territories, where there are people who build it and further resists. They suffer the lack of rights, they do not have the minimum and, even so, they reinvent themselves every day from their actions and subjectivities. Hence the importance of social subjects which actually exist, in their eventual conditions as subjects, subjects from their own action and that, in fact, are on the streets, are the people who are on the streets, talking, happening, saying, acting, doing. This is the action cartography referred to (RIBEIRO, 2012, p.10). It is necessary to take more and more ownership of these cartographies, the actions which are based on place-territory, the rooting, the social proximity and the active territoriality to, even more, transforms into a dominant form, the hegemonic form of see and read the persistent relations between society and State.

## Socioterritorial policy: Social assistance and the search for participatory planning

The 1988 Federal Constitution is a big landmark to Brazilian social policies. In 1988, politics became responsible for supporting social minimums became part of the Social Security tripod. Articles 203 and 204 from CF88 present a set of security which has as objective to ensure the citizen and guarantee minimum assets to face the different realities. The articles also present the duties of states with regard to budget, participation of population and political-administrative decentralization, with coordination at the federal level and execution at the state and municipal levels as well as charitable and social assistance entities. (CONSTITUIÇÃO DA REPÚBLICA, ART. 203º, 204º de 1988)

Political-administrative decentralization in Social Assistance was fundamental for politics to achieve minimum categories of effectiveness in its urgencies. The decentralization of power between government levels and local levels enables benefits in management with the increase of relations between society-state and promotes development which involve a more effective articulation of popular participation, such as incentives to reformulate local actions providing greater contact and understanding of the reality of each territory.

In 1993, after great social mobilizations and the impeachment of Fernando Collor de Melo, Itamar Franco, upon assuming, endorsed the LOAS (Organic Law of Social Assistance). According to the MDS (Ministry of Social Development and Combat Hunger), the

LOAS preconiza que a gestão da política e a organização das ações devem ser articuladas em um sistema descentralizado e participativo, organizado nos três níveis de gestão governamental. Assim, a regulamentação da Assistência Social a define como competência das três esferas de governo e, por sua vez, a sua implementação torna-se tarefa explicitamente compartilhada entre os entes federados autônomos. (BRASIL, 2004, p. 82)

Despite the achievements, social policies have gone through difficult decades with the predominance of neoliberal government in Brazil. However, in 2002, under the government of Luiz Inácio Lula da Silva, there was a greater emphasis on attempts to more effectively integration of public policies on social scope. With the approval of National Social Assistance Policy (PNAS), in 2004 the Unique System of Social Assistance (SUAS)<sup>5</sup> was established, which provides, only in 2011, the Socio Assistance Vigilance with the creation of Law 12.435 and includes as one of the structuring objectives of Social Assistance. SUAS was a milestone in the structuring of social policies in Brazil, as it enabled better management, operationalization and applicability of measures according to each service.

A contribuição da Assistência Social nessa perspectiva, implementada como política pública alicerçada de direitos, deve se realizar por meio de uma estrutura político-administrativa que ressalte a fundamental relevância do processo de descentralização, quanto ao redesenho do papel e da escala espacial de organização dos serviços do Estado Brasileiro, que possa facilitar a transferência, em blocos de competências, das ações para os territórios mais próximos da população e de suas necessidades [...] (BRASIL, 2004, p.89)

From these processes of conquests, Socio Assistance Vigilance, listed as one of the structuring objectives of Social Assistance, is now also characterized as a function of polity and supports the activities of planning, organization and execution of actions developed by the services. Thereby, it aims to analyze territorially the protective capacity of families and in it the occurrence of vulnerability,

<sup>5</sup> It is a system nationally constituted with a single management, characterized by a shared management and co-financing of actions by the three federated levels and by the social control exercised by the Social Assistance Councils of the municipalities, States and the Union. At SUAS, the actions of social assistance are organized with references from the territory where people live, considering their demands and needs. (BRASIL, 2014)

threats, victimizations and damages present in the most distinct realities of the population's living territories.

Regarding to the reality of the territories, Londrina city, since 2005, has been playing an active role in improving management based on territorial bases. The first systematic approach was with the creation of the IRSAS System (Computerization of the Social Assistance Services Network), a control and action management system within policies, which offers to managers access to services reports, programs, projects and benefits in all territories of the municipality.

In 2014, it was started an effective work directly with the territories, which were rearranged based on a proposal presented to the Secretariat and to all services linked to the social assistance territories of the municipality. The proposal was approved and put into effect in 2015. The research that gave rise to the proposal was concerned not only in redesigning the coverage areas of the CRAS (Social Assistance Reference Center) units in the municipality, but also in standardizing them, respecting the areas of the IBGE (Geography and Statistics Brazilian Institute) Census Sectors. The motivation of the research based on the expectation of standardizing the coverage areas to, this way, enabling the access to socioeconomic information present in the database of the research Institute.

With the results achieved in the rearrangement of the coverage areas, in 2018 it was possible to produce territorial information to all services in the network and ensure that Social Assistance Secretariat could perform its management based on data cartographically represented in the territory, as well as comply with the obligations imposed in Law 12.435 from 2011, which included the Socio Assistance Vigilance as an objective of Social Assistance Policy throughout the country.

As can be seen, the information experience conquered by Social Assistance Secretariat of Londrina, until now, has followed objectives and systematics paths induced by the State requirements in the generation of territorial information in order to objectify decision-making and better distribution of resources. The reflection presented in this essay does not aim criticize nor oppose arguments to technical and systematic paths crossed by the management of socio-assistance services, but rather to present a proposal for the integration of these technical/objectives of popular/subjective knowledge, both in the academic scientific field, but also in the elaboration of public policies of a social scope.

### The territory and the popular science as a precondition for a participatory-action-research

"O que não é quantificável é cientificamente irrelevante. (...) o mundo é complicado e a mente humana não o pode compreender completamente. Conhecer significa dividir e classificar para depois poder determinar relações sistemáticas entre o que se separou." (SANTOS, 2010 p.15)

This reasoning, at first conduces us to the methodical thought in which the quantitative is valued as an exclusive relevance for science. The complexity of the world cannot be reduced to a universal truth in which the human mind is able to interpret and take it as the only and finished truth. It is necessary to divide, classify, but not with the intention of isolating and creating closed models, but, rather, allowing looking at the whole with a heterogeneous vision, being able to comprehend the territory, the territorialities and places of life from the diversity of each subject.

It is in this context that we affirm the need and importance of working the social policies based in territorial information bases, because the closer to the reality of the individuals who experience them, the more authentic the representations of the presented demands will be. However, to realize the speeches and the contexts which the individuals are constantly manifesting in the living territories, it is necessary to work on valuing this knowledge, as well as understanding the dominant

epistemological principles that form the trait of our colonized society. Or we can put what Santos (2002c, p.262) calls “trabalho de tradução” in the impulse of “sociologia das ausências” and “sociologia das emergências”. This is nothing more than an interpretation work of the cultural particularities, in order to establish other meanings and value other truths, taking into consideration their desires and powers. Thus, we see the importance of inserting the discussion of popular science in the management of public policies.

The discussion about the insertion of the discussion of popular knowledge in public policies scope can provides not only a work of valorization and empowerment to citizens who use policies, but also arouses new ways of looking to the territory, as well as supports the participatory planning which promotes more genuine decision-making to reality. This way of planning intends to link actors and territories, “build the territory with the actors and mobilize the actors through the territory with the hypothesis that, in this relationship, both will change” (ACSELRAD, 2008, p.38).

Popular science and its power as a transforming agent based on participatory and cooperative research can be the more effective way to achieve objectives of understanding the territorial reading.

When dealing with investigation in the bias of popular science involving participatory research, it is important to highlight that this study

[...] não se trata do tipo conservador de pesquisa planejado por Kurt Levin, ou as propostas respeitadas de reforma social e a campanha contra a pobreza nos anos 60. Refere-se, antes, a urna “pesquisa da ação voltada para as necessidades básicas do indivíduo” (Huynh, 1979) que responde especialmente as necessidades de populações que compreendem operários, camponeses, agricultores e índios – as classes mais carentes nas estruturas sociais contemporâneas – levando em conta suas aspirações e potencialidades de conhecer e agir. É a metodologia que procura incentivar o desenvolvimento autônomo (autoconfiante) a partir das bases e uma relativa independência do exterior [...] (FALS BORDA, 1981, p.42)

In order not to fall into the methodological assumptions of “cartografia dita de atores”, according to D’Aquino, Seck et al. (2002) sets, in which the extraction of representations and local knowledge is done in the form of rudimentary maps or simplified schemes that, in this case, end up being more useful to researches and external agents than to the local population itself. That is why the representations generated from the participant-research need to generate material which is able to highlight popular demands, but also generate official and methodological results that can be used to expose to government technicians and agents a “formal” document with technical and precise burden to demand rights and subsidize deliberations. Methodologically, we fall into “a two-way street” in which we need the subjective approach to express reality, but also the complexity of synthesizing this subjectivity in a spatial and methodological format. In this perspective, Joliveau clarifies:

É a partir do confronto entre essas duas abordagens - os saberes locais, concretos e pragmáticos, mas dificilmente generalizáveis dos atores de terreno, de um lado, e os tratamentos espaciais, sistemáticos e abstratos de outro, que pode nascer uma compreensão melhor dos fenômenos que transformam o território. (Joliveau, 2008, p.47)

The purpose of this reflection is not only to promote the transformation of the territory, but to provide facts to understand it more effectively, by highlighting the urgency of appropriating methods of social cartography in participating researches. Overcoming the “cartography called actors” to a “cartography made with and for actors” and, this way, valuing the people who build their territories and transport knowledge which materialize daily in social life. Knowledge which materialize through plural, multiform interaction and unity in diversity. “The territory, in this perspective, can be understood as a

context, as a territory-place linked to territories-places by multiple relations that (i)materialize in different transmultiescalar networks” (SAQUET, 2018, p.111)

When talking about the transference of knowledge in social life, we talk about people with unique capacities and powers and who cannot be classified and/or generalized according to exclusively office researches. People have diverse and creative capacities, although many times the simplest and humblest are made invisible and discriminated against by the State’s eyes. The researcher who produces the knowledge cannot be disconnected from the natural and social life, from the life that exists in the living territories in which he studies, closed in his laboratory developing thoughts based on his perceptions and particular needs of his world, in a “internal dialogue” with himself. (SAQUET, 2019 p.56)

Society is very rich and unfolds in different directions to manifest (even though indirectly) its yearning and means of survival. It is a very active society, but it is read in a terribly simplifying way, and according to a negativist rhetoric, or then according to the rhetoric of those who present themselves as great knowledgeable of their yearnings – and thus do not even bother to listen to it – they prefer to simplify the reality in which they pose as translators, in which they act very badly, “because simplifying a complex reality always results in increasing social risks” (RIBEIRO, 2012, p. 9)

Reformulating a new vision of working on researches of cartographic representation of social demand implies in review the very notion of territory and transformation of traditional research into participatory-action-research. Transcend the notion of using only spatial and methodological treatments of the census view and the collage to space made through household data which, as is known, belongs exclusively to the State, for a more complete use in which it is possible to cross methodological and subjective information.

With this, other views of the territory and of territorialities can incorporate the research-action, “can be understood and worked on in the praxis of a trans-scalar and trans temporal way, that is, as social and social-natural, symmetric and asymmetrical relations, especially as synthesis of cooperation and solidarity relations” (SAQUET, 2019, p.45). “Cooperation and solidarity are ways, within participatory-action-research, of contribute and promote a new intercultural communication” (QUIJANO, 1992) and, according to Aníbal Quijano, promoting an “exchange of experiences”, or, according to the same idea, a “knowledge ecology” as Boaventura de Sousa Santos puts it.

## Conclusion

In Brazil, the intervention in the social issue through public policies is faced with the need/challenge of democratizing the relations with public authorities and optimizing the access to social rights, as well as resolving socio-territorial inequalities without excluding local singularities and diversities. Thus, it becomes essential to think public policies in an articulated and territorialized way, that is, it implies in manage active potentialities in social relations and power processes from the perspective of the territory.

We understand, together with Fals Borda, that it is necessary purposeful and more responsible researches in face of the social inequality experienced by the population with the vigor of hegemonic power and of modern science at the service of the capital and the dominant elite. The reflections of Boaventura present the concepts of the sociology of absences, knowledge ecology and the sociology of emergences linked to social cartography and the emancipation of the citizen, along with empowerment as the subject bearer of territorial praxis and knowledge of the cause, repeatedly defended by the authors presented.

We exposed the trajectory of territorial social assistance policies in the case of Londrina in search of participatory planning which, in consonance with the reflection presented, makes us comprehend and identify the place of popular science in the management of social public policies and what is its relevance in the population's empowerment practices, as well as considering the application of active social cartography methodologies – which directly confront the management – based on methodological and vertical logics.

With that, we aim at the essay in a reflection around the concepts which try to move us away from the colonizer/capitalist/dominant logic to value the subject and discuss methods that open the opportunity to a new manipulation of information in the territorial management of public services. We aim to expand the dialogues not only between disciplines, but also with other knowledge, with the speeches and readings of the other. So that, more than ever, it is necessary the dialogic and democratic practice that seeks, in an effective way, to represent all others, many others, so that we, or most of us, can have a place as people in our territorial and social representations. And for this to become reality, as we have seen, the territorial reading must be horizontal and moves from the local to the global.



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