

**SOCIAL
INNOVATION
IN HEALTH
INITIATIVE**



COMPREHENSIVE CARE MODEL FOR RURAL HEALTH: SUMAPAZ LOCALITY
MODELO DE ATENCIÓN INTEGRAL PARA LA RURALIDAD: LOCALIDAD DE SUMAPAZ

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|----------------------------|---|
| CONTINENT | South America |
| COUNTRY | Colombia |
| HEALTH FOCUS | Comprehensive healthcare, Primary Health Care (PHC) |
| AREAS OF INTEREST | Rural health, community-based health, intercultural health |
| HEALTH SYSTEM FOCUS | Improved access to quality care through community engagement techniques |



COMPREHENSIVE CARE MODEL FOR RURAL HEALTH: SUMAPAZ LOCALITY

Following evaluation of the health care needs of Sumapaz's rural population, a comprehensive care model for rural health was created in 2001 to guarantee access to health care. The initiative promotes community engagement and empowerment to design contextualized intervention strategies and so offer solutions to real life problems and challenges.

Authors: Martha Milena Bautista Gómez, Kathleen Agudelo, Diana María Castro-Arroyave

MODELO DE ATENCIÓN INTEGRAL PARA LA RURALIDAD: LOCALIDAD DE SUMAPAZ

Tras la evaluación de las necesidades de atención de la salud de la población rural de Sumapaz, en 2001 se creó un modelo de atención integral para la salud rural para garantizar el acceso a la atención de salud. La iniciativa promueve el compromiso y la participación de la comunidad para diseñar estrategias de intervención contextualizadas y así ofrecer soluciones a problemas y desafíos de la vida real.

Autores: Martha Milena Bautista Gómez, Kathleen Agudelo, Diana María Castro-Arroyave

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SIHI Academic Advisor: Prof. Lenore Manderson

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ABBREVIATIONS

| | |
|--------------------|---|
| APS | Primary Health Care |
| COLCIENCIAS | National Colombian Research Office |
| EAPB | Administrators of Benefit Plans |
| EPS | Healthcare Provider |
| FAO | World Federation for Food and Agriculture |
| ICBF | Colombian Institute of Family Welfare |
| Icontec | Colombian Institute of Technical Standards |
| IPS | Healthcare Provider |
| PIC | Collective Intervention Plan |
| UNDP | United Nations Development Programme |
| POS | Mandatory Health Plan |
| RIPS | Individual Records of Provision of Services |
| SIVIGILA | National Public Health Surveillance System |
| UAP | Primary Care Units |

CASE INTRODUCTION

Image 1. Chizagá Lake



Source: Martha Milena Bautista Gómez. 2020

Sumapaz is a rural locality in the south of the capital city of Colombia, Bogotá. It is considered pivotal to the country because of its important water reserve, its extraordinary plant and animal biodiversity, and a great variety of ecosystems. Sixty percent of this territory is a protected area within the Sumapaz National Natural Park, which is considered the world's largest paramo ecosystem¹ (SDP, 2010).

According to data from Subred Sur (Provider Medical Care Institution) (2018), Sumapaz has 2692 inhabitants, almost all traditional farmer, who live in isolated houses or small slums, and involved in cattle raising and potato production. At the social level strong community relations predominate in

Image 2. Sumapaz Farmer Cutting Wood



Source: Martha Milena Bautista Gómez. 2020

terms of cohesion and ties of solidarity (Montañez and Delgado, 1998).

The history and continued presence of armed conflict in this area has shaped the community's revolutionary tradition and political landscape. This has contributed to the creation of an expansive network of community organizations that remain decisive in social order (Bautista, 2018).

Factors such as agricultural work, rural routines, and sub-optimal living conditions due to ongoing socio-economic exclusion significantly affect the health status of the population. In addition, the lack of transportation options and high degree of isolated housing over a large territory pose challenges to both the quality and accessibility of health care.

¹ The paramo gives rise to the birth of innumerable rivers regulating the water cycle at the headwaters of Colombian

rivers, thereby sustaining the hydrological regime, and is considered a strategic area for water resource conservation at regional, national, and global levels.

1. INNOVATION AT GLANCE

| Project Details | |
|--|---|
| Project Name | Comprehensive Care Model for Rural Health: Sumapaz Locality |
| Year Founded | 2001 |
| Founding Institution | Hospital Nazareth - Subred Sur |
| Country of Origin | Colombia |
| Participating Organizations | Bogotá Secretary of Health, Sumapaz Community Organizations, Colombia National University, Botanical Garden, among others. |
| Organizational Structure | Bogotá Health Secretary - Subred-Sur - Rural Liaison - Sumapaz Locality |
| Team Size | > 100 health workers |
| Innovation Value | |
| Value Proposition | Improvement of access to and quality of health services in the rural population, implementing health promotion strategies with community engagement |
| Beneficiaries of the Initiative | Rural Communities in Sumapaz, Bogotá, Colombia |
| Key Components | <ul style="list-style-type: none"> • Community participation • Comprehensive health access • Food safety and natural medicine |
| Operational Details | |
| Principal Sources of Income | Office of the Mayor of Bogotá - District Secretary of Health |
| Annual Spending | \$ 1.174.195 US (Approximately) |
| Scale and Transferability | |
| Population | Sumapaz Locality (Bogotá, Colombia) - corresponds to 2692 people and 609 families |
| Local Commitment | Educational Institutions Jaime Garzón and Juan de la Cruz Varela - Sumapaz community action agency - Agrarian Union. |
| Scale | The model has been operating in Sumapaz since 2001, and is in its initial phase in other urban and rural localities in Bogotá. |
| Sustainability | The financial sustainability of the Comprehensive Care Model depends on the resources of the District Secretary of Health of Bogotá. It is environmentally and socially sustainable to empower the community. |

2. CHALLENGES

Guaranteeing the quality and access of health care for the rural population in Sumapaz presented major challenges in terms of reducing physical access, socio-cultural, and political barriers, as well as those directly linked to the health care system.

On one hand, geographical barriers are inherent to remote rural areas. Factors such as the limited accessibility, its difficult access for topography and lack of roads, the high degree of isolation, and its deficient road infrastructure directly affect the coverage of health services and quality of health care. The continued presence of armed conflict in the area adds further complications.

Factors associated with rural life had a wide impact on the health of the population. The mainstream use of agrochemicals has likely led to disease and disability of some of its inhabitants, including several types of cancer. Likewise, muscular-skeletal conditions such as osteoarthritis are common given the excessive physical exertion required for their work; respiratory diseases due to dust mites and soot from wood cooking; and infectious intestinal diseases associated with a lack of potable water and poor nutrition. For these reasons, central points of innovation included the promotion of food safety, healthy work, and the reduction of the use of agrochemicals (Subred Sur. 2018).

The Sumapaz community often practices traditional medicine to provide solutions to their health problems, and community members tend to use local healers and methods in preference to western medicine. This represented a cultural challenge that required co-learning to achieve synergy between health perspectives.

The health system, on the other hand, had significant limitations in Sumapaz. In terms of health infrastructure. The locality had only one first-level health center,² which was insufficient to serve the entire population.³ Despite the fact that the health system in Colombia has developed mechanisms to guarantee coverage of the entire population, as provided by the Subred-Sur (2018), self-employment and the informal nature of rural work in Sumapaz means that 19% of the population is not affiliated with the health system.

For these reasons, the population had suboptimal health status similar to the most vulnerable regions in Colombia and in contrast with populations living in other localities in Bogotá. As stated in one of the interviews conducted with the innovation team: *"50% of the women who died in the capital district belonged to this locality, we had a mortality rate as high as that of Chocó, we even had a mortality rate of 72%"*. (Group interview, innovation team, November 14, 2019).

² A First Level Hospital is the least complex level of health care. It serves the population for disease prevention, general medicine, some specialists.

³ By law, all citizens must be affiliated with the "Obligatory Plan for Health" (POS) using a national health provider

(EPS), which is assigned by a health institution lender (IPS), an entity in charge of guaranteeing health coverage to the citizen.

3. INNOVATION IN INTERVENTION AND IMPLEMENTATION

Image 3. Home visits in Pasquilla Slum



Source: Martha Milena Bautista Gómez. 2020.

The comprehensive care model for rural health in Sumapaz was developed in 2001 by Nazareth Hospital. In 2016, this became the Subred Sur, the current health institution in charge of the implementation. Although over time, the

Image 4. Workshop in Chaquen Park



Source: Martha Milena Bautista Gómez. 2020

health care model has been adapting to the political and administrative changes in the district and in the health sector, the components and strategies have been consistent and are identified below (See Table 1

Table 1. Comprehensive Healthcare Model for Rurality: Location of Sumapaz

| Components | Strategies | Results |
|---|--------------------------------------|---|
| Community engagement: Study of necessities Co-construction of knowledge Community education | 10 Community Networks | <ul style="list-style-type: none"> ● Recognition of quality in health ● Decrease in morbidity and mortality ● Reduction of access barriers ● Generation of new knowledge ● Empowerment ● Creating value for communities |
| Comprehensive healthcare and access: Interinstitutional management Interdisciplinarity | Home visits "Health Routes" | |
| Food safety and natural medicine: <ul style="list-style-type: none"> ● Home gardens ● Agrochemical control ● Comprehensive medicine | Chaqué Park: (Public Health Park) | |

3.1 COMMUNITY ENGAGEMENT

Community participation has been one of the cross components in the care model in each of its phases. It is a model

created with and by the community through opportunities for dialogue and feedback, co-creation exercises, and the use of different technical and

methodological tools adequate to rural population.

To this end, the initiative included the co-construction of knowledge, given through communication between the community, the health institution and universities. The health care model recognizes the farmer's practical knowledge of the environment and the local culture, and integrates this with the knowledge of health professionals, researchers and academics. Various training courses are provided to the community that can then be applied to their specific needs and experiences, while academic research is carried out in the territory.

The model also promotes the integration of Sumapaz farmers with other urban and rural agents through various spaces. Twelve meetings for the "Knowledge and Taste Exchange" were conducted, one of them between afro and indigenous women of different Colombian regions with and Sumapaz farmer women, in order to recognize and express the value of their ancestral knowledge.

Another fundamental goal of the initiative was to identify needs in order to understand the social reality of the community and its health care deficiencies. Instead of adopting the perspective of the implementing institutions, this process of identification began with the perspective of the farmer as a political subject, as described below:

So in order to be able to generate impact and for the families to really believe in us... it was precisely because the needs of the community were identified in collaboration with the

community itself, and its members have actively participated in the whole process, we've never just implemented our own ideas, but rather, have worked directly with the farmers to identify their needs. (Interview, María, innovation team, November 13, 2019)

Since 2004, the report *Analysis of Conditions, Quality of Life, Health and Disease* has been elaborated by Subred Sur annually. This is a socio-epidemiological and geographical analysis document that combines different data collection methods and techniques: quantitative (health situation survey⁴), epidemiological (RIPS⁵ and SIVIGILA⁶), qualitative (BIT-PASE Methodology: Population, Environmental, Social and Economic), and various cartographic and documentary sources. The data from these diverse sources has illuminated the complexity social reality of the area, identified areas for further study, and allowed for the prioritization of particular health needs.

Based on this in-depth understanding, community interventions are carried out using an *experiential pedagogy* methodology, one of the main innovative features of the initiative. Its objective is to generate significant learning in the community through practical simulation workshops, appealing to the ancestral and local knowledge of the inhabitants, their links with the territory and their rural way of life, and using recreational-artistic tools adapted to the rural context.

An example of this was the workshop for the community where one of the

⁴ This survey was applied to address the need to have clear data about the specific population, keeping in mind that armed conflict and the high degree of migration has affected the exactitude of publicly accessible data and doesn't account well for the social reality of the population. With time, the data proved to be very useful,

not only for the healthcare field, but also for further research development and the implementation of all types of district programs.

⁵ Individual Registry for the Lending of Services

⁶ National Public Health Surveillance System

participants wrote a song alluding to the life of the farmer. This was performed by the environmental engineer and the doctor of integrative medicine, and then a recipe that uses rosemary oil to treat muscle aches was taught to farmers (Field Diary 1. Workshop of the Senior Citizen Network. November 12, 2019). Likewise, language is a very important element that facilitates the learning process. A frequent resource is the use of analogies about rural life to educate and transmit knowledge. For example, the program *de Ruanas para ruanitas* is a course offered to farmers, both men and women, on reproduction and infant health.

In this process, the main participation strategy of the model is the consolidation of ten community networks, with the purpose of training health promotion leaders in different topics of integrated health and differential care. The ten networks are: young people (1), chronic patients (1), disability (2), food, nutritional and environmental security (2), women (1), elderly people (1), early childhood (1) and healthy habitat (1).

3.2 COMPREHENSIVE HEALTHCARE AND ACCESS TO HEALTH

The comprehensive health perspective that the model proposes necessarily implies an interdisciplinary approach to understand the needs of the local population and to create comprehensive health interventions. For this reason, the implementation team is multidisciplinary, comprised of health professionals including physicians, nurses, dentists, health educators, nursing assistants, occupational and physical therapists, nutritionists, social workers and psychologists. In addition, a number of people from specific professionals

relevant to the rural sector are involved: environmental engineers, agronomists and a physician who practices integrated natural and western medicine. In addition, the team included someone from the health governance field and professionals from the social sciences.

Guaranteeing access to health also involved an inter-institutional management process, as proposed by the innovation team:

That we do not look at health as the levels of care, but in a linear way in such a way that from where I identify the need it is addressed ... that that need receives its answer in all its magnitude ... there is the integrality at the moment in which we all unite to provide with the true right to health and to give you a correct and assertive response to your need (Group interview, innovation team, November 14, 2019).

This intersectoral process has resulted in systems-level change in the following ways:

- The health framework was adapted to rural conditions, that is, to make the processes, procedures and requirements of district health policies viable in the project area.
- It was necessary to integrate different components of the health system in order to provide care and coverage to the entire population, either at the Local Medical Center and/or through home medical visits.
- The Subred Sur also managed to develop links between primary health care services in the locality and specialized health care in the urban area.

In addition, the model includes the design of creative and innovative strategies to lower barriers to access to health care. One of these strategies is

home visits, in which the team of health professionals goes to people's homes to follow up with patients regarding health conditions identified in outpatient care and to provide preventive care to other family members. This has been a key strategy for early disease detection, and to discourage unhealthy practices, and problematic home habits and daily activities, such as the use of agrochemical and firewood stoves inside the house.

One strategy to facilitate patient referral from Sumapaz to the city for medical attention is the so-called Health Route. This is specifically meant for Sumapaz members who cannot be attended to within the locality due to the complexity of their health problem. The health institution assigns a support professional who is responsible for facilitating the care coordination, organizing the medical appointment, and providing transport for patients to get to the urban health center and to return back home afterwards.

3.3. FOOD SAFETY AND NATURAL MEDICINE

The model's focus on building an ecosystem is based on a holistic perspective that, following WHO and PAHO definitions, conceives of health as a "state of complete physical, mental, spiritual, emotional and social well-being, and not merely the absence of disease or infirmity" (Subred Sur, 2016:7). This perspective strengthens the integrative nature of the model, taking into account the rural community in which it is developed, as explained by a member of the innovation team:

We worked on the whole issue of medicinal plants, because we understood that this is an

agricultural population that has a lot of adherence to these treatments. We articulate with the component of integrative medicine and develop actions so that the families can complement the conventional treatment given by the Subred Sur, achieve a greater adherence rate, and approach health in a more holistic way. (Interview, María, innovation team, November 13, 2019)

Throughout the implementation of the model, several different programs were developed, one of the most stable being Food Security. Food Security is a high priority because malnutrition has been one of the main health problems in the locality. The activities include the promotion of home gardens, the management of organic waste, the promotion of healthy diets and eating practices, and the inclusion of new nutritious foods. Another area of action is the promotion of healthy work, which includes good agricultural practices and the reduction and control of the use of pesticides.

There is also an Integrative Medicine Program, which began in 2016 and consists of integrating the methods and practices of conventional medicine with those of natural ancestral medicine. This innovative program in the health system is used with patients on home visits and through community networks, utilizing various strategies according to the needs of the patient. Examples of this include encouragement of people to use of medicinal plants, neural therapy for pain⁷, etc.

In this component, the main strategy of the model is the Chaquén Park, which, since its creation in 2007, was conceived as a center of interaction and learning under the principles of food security and

⁷ According with Vinyes (2003) Neural therapy extinguishes peripheral irritational stimuli, thus reducing

stresses in various tissues, and facilitates the successful application of other treatment techniques.

environmental protection (Hospital of Nazareth, 2008). Currently, the park is an agro-environmental space of 2.25 hectares with demonstration agricultural plots, where environmental education and training activities are carried out, as well as the promotion of sustainable agricultural activities from an economic, environmental and human health standpoint.

For the community, the Park is a shared meeting space at which people can learn

new practical knowledge and receive agro-environmental advice, which has had a positive reception by the farmers, as they themselves have expressed:

From Chaqué Park I have brought my little seeds and sowed them in my gardens with organic fertilizer, and that has really improved my health and the health of my family, to have a good healthy diet (Group interview, Sumapaz community, November 13, 2019)

4. ORGANIZATION AND PEOPLE

Unlike many social or innovative projects, the Comprehensive Care Model for Rural Health does not depend on a single manager. Although a group led its creation, it is a stable innovation, which has been directed and implemented by a number of different work teams.

4.1 THE INNOVATIVE ORGANIZATION

The innovation was created in 2001 by Nazareth Hospital, which at the time was the only health care provider in the locality.⁸ The initiative arose within a socio-political environment that was favourable to the creation of new mechanisms to improve access to and the quality of healthcare services. At the national and district level, the aim was to guarantee superior standards of quality in health care, while the new district government decided to focus on the recognition of the rural nature of the city in district policies, as described below:

I believe that the challenges of the district government at the time, the challenges of the

community, and those of the organization heads themselves, led to a historical moment that allowed the organization itself to say: Listen, let's think about something different, let's do something different, because this moment is probably not going to happen again... (Interview, Andrés, innovation team, November 15, 2019).

This was the beginning of the health care model, at that time known as "Healthy family, healthy community, natural environment", which was built on two fundamental perspectives: health prevention and the co-construction of knowledge. Then, in 2016, the hospital merged with other hospitals in the south eastern area of Bogota and integrated the Subred Sur that serves Sumapaz and the other urban-rural localities of Ciudad Bolivar, Usme and Tunjuelito. The health care office for rural population was created, and the Sumapaz health care model currently operates from this. (Subred-Sur,2018)

⁸ During the governance of Mayor Luis Eduardo Garzon (2004-2007), the Public Politics District for Rurality was

created. This coincided with the first time that a mayor from Bogota came to visit the Sumapaz locality.

4.2 THE IMPLEMENTATION TEAM

The motivation and commitment of both the initial implementation team and those who contributed later on in the shaping of the model have been fundamental to the success of the innovation, its sustainable processes, and overcoming various challenges.

To find the right team in Sumapaz, it was necessary to identify professionals who had rural experience. The team had to address all the challenges that accompany the work in this rural environment: the risk to public order and safety associated with armed conflict, the long travel distances, and the need for the worker to live in the locality during the week. Moreover, team members needed to be multidisciplinary professionals with the flexibility to work in different areas (for example, a psychologist needed to be able to provide clinical consultations and community interventions in schools). In addition, team members needed to approach the work from their area of knowledge and facilitate the community work with local farmers.

An interdisciplinary team was gradually formed with its members meeting all of these requirements. Most were young people who positively valued and showed a high commitment to their work, evident in the way they carried out the interventions and the links they established with the community. One of the team members stated:

I have learned a lot from some of my colleagues who have done a great job and are always creating new things in the 'Subred'... we stopped doing the typical lecture-style talks to put on a workshop, to build a process that we can enjoy... the idea is to do it in a fun and playful way so that it is easier to learn. (Interview Lucía, innovation team, November 13, 2019).

A dynamic of constant and continuous evaluation and improvement allowed the process of activity innovation and pedagogical strategies to fulfil the objectives of the model to be permanent. An example of this is the Quality Circles; these are daily discussion spaces about the challenges or problems in relation to community work, and the search for creative solutions.

5. RESULTS AND IMPACT

5.1 HEALTHCARE QUALITY AND ACCESSIBILITY

The implementation of the Comprehensive Care Model for Rural Health has demonstrated progress in healthcare quality and the reduction of access barriers, making a significant difference to the health conditions of Sumapaz compared with other rural territories with similar characteristics at the national and local levels. This is reflected in people's experiences in access and their health status:

Last year my daughter got a migraine, she fainted, she was at school and they called me to go to school for that reason, and when I arrived they were already taking my daughter to the hospital; that is, they don't wait for the person to get worse, but they start at once and they warn you. ...for me it's a good service. (Group interview, Sumapaz community, November 13, 2019)

The model currently covers 100% of the rural population in the Sumapaz locality.

Its two health care centers (UAP San Juan and UAP Nazareth) are accredited by the Colombian Institute of Technical Standards (Icontec). Health tracking indicators show clear results of the improvement in health quality, especially in the focus areas of maternal and perinatal health and nutrition (DANE, 2016, 2017, 2018): There were no maternal, perinatal, infant or under five deaths in 2016, 2017 or 2018.

5.2 CREATING VALUE FOR THE COMMUNITY

The effort of so many years of work in education and capacity building brought tools and skills to the population that transcend the field of health and contribute to individual and community development in several areas.

The health care model improves the quality of life of the population in a comprehensive manner through the mechanisms of social inclusion for traditionally excluded groups such as people living with disabilities and women. The model also supported community empowerment processes and promoted work health, as one of the members of the implementation team mentioned: *"we have achieved with much effort and a lot of extra-mural work the reduction of the entire agrochemical component"* (Interview, María, innovation team, November 13, 2019)

Training and education spaces have been sources of new knowledge for farmers, including in the development of leadership skills. Likewise, there have been important achievements in environmental and food security in terms of reducing the use of pesticides in the production of food for self-consumption, supporting farming families to adopt clean production systems, and

developing productive agricultural and livestock projects as a result of training spaces.

5.3 AWARDS AND RECOGNITION FOR THE INNOVATION

Over the course of the implementation of the innovation, a number of recognitions were obtained:

- (2003) First place for the food and nutritional security project for its contributions to child nutrition awarded by the Éxito Foundation.
- (2003) Second place for its contributions to child nutrition awarded by The Colombian Family Welfare Institute (ICBF).
- (2010) The Chaqué Park was recognized as a case of innovation for human development by The United Nations Development Programme (UNDP).
- Award for the development of human potential with the program: Ecotherapy and mental care by the senior management of the public service.
- National Corporate Social Responsibility Award for the Human Potential Development component and therapy center of the Chaqué Park
- (2017) The Food and Agriculture Organization (FAO) recognized the attention model as a process of innovation of strategies to encourage families to cease using agrochemicals and to enter organic farming systems.
- (2019) The Botanical Garden recognized the team for the environmental contributions it had made to Bogotá District.

Finally, the most important achievement has been that of the community, because

it has managed to institutionalize itself within the territory. As some of its officials mentioned,

"We are like one family" (Group interview, Innovation team, November 14, 2019)

6. SUSTAINABILITY, SCALABILITY AND REPLICABILITY

An important strength of the Comprehensive Care Model for Rural Health is the sustainability it has achieved from economic, social and environmental standpoints. It has been able to adapt very well to a variety of political-administrative changes – from a change in initiative leaders to social changes in the locality.

This seems to have been influenced by three fundamental factors. The first is the result of the health tracking indicators, since these reflect the effectiveness of the model, and something that obviously works cannot be changed so easily.

Secondly, the model is embedded in the community. When asked in a discussion group why the model has been sustainable over time, the directors of the Subred Sur unanimously responded: *"because of its empowerment of the community"*. That is, it is a community that knows how to demand its rights and will not allow the quality of health that has been achieved to be lost.

Finally, the model has been externally recognized, and the distinctions and awards it has won have elevated its visibility, highlighting the impact of the model. Therefore, there is no justification to end the project. Although the model has survived political regime changes to which this type of process might be

vulnerable, the main risk to its continuation is politics, given that the district finances the entire project. It is a rather costly model for the district, due to distance, transport, and personnel costs, among other factors.

In terms of potential opportunities for scalability and replication, with the creation of the Subred Sur, the model has expanded to other rural areas in Bogotá (Districts: Ciudad Bolívar, Usme and Tunjuelito).

In the short term, if the current health structure is sustained, the model will focus on exploring the possibilities of expansion in these new areas. The greatest challenge is to achieve sufficient knowledge of community health needs, as well as of the territories and their populations, in order to study and identify relevant needs and design strategies as was done in Sumapaz.

The model could be replicated in other subnetworks in the city. As one of its leaders explained, it could become a model for health in the city, and could be implemented in other rural areas outside Bogotá, with similar living conditions and health needs. This would eventually bring broad benefits to vulnerable communities for whom barriers impede quality and access to the minimum necessary health.

7. LESSONS LEARNED

A key condition for social innovation is the collaboration between different actors in the health system. Although the initial idea is the creation of an innovative person or group, there must be regulatory frameworks that make the initiative viable and support the inclusion of new processes. There needs also to be a receptive and participatory community, without which it is not possible to make structural changes.

Likewise, a comprehensive perspective of health is fundamental in health-specific social innovation. This implies that multidisciplinary and intersectorality are key factors to understanding the complexities of health

and to propose different ways to approach traditional health problems. This integrates new perspectives during diagnosis, design and implementation, enriching health interventions.

Community participation, understood as the tangible impact of the community during the whole innovation process, links the knowledge of the communities, illuminates the social reality of health, and designs effective strategies for intervention. As the initiative develops deeper social participation processes, the effectiveness intervention increases, especially when these projects are focused in complex territories or communities

CASE APPROACHES

The fundamental pillar of innovation of the Comprehensive Care Model for Rural Health is the health institution's capacity to understand the social reality of the population, and to utilize that understanding of the knowledge, needs, and culture of its inhabitants to build an intervention model with innovative strategies.

Successful implementation would not have been possible without the synergy between the various actors involved in the system. The implementation team created the aforementioned innovative strategies to improve health in a complex rural context, while the health system created the health framework and allocated funds. The community, its organizations and its leaders have been influential in improving community health and currently provide social sustainability to the model.

Using the effective mechanisms of Knowledge Transfer, the health care model has managed to develop processes of Social Appropriation of Knowledge as a result of this collaboration between communities and the health institution. This has resulted in effective community interventions, giving social and cultural sustainability to the model's implementation, and developing capacities in communities that transcend the healthcare field.

REFERENCES

- Alcaldía Mayor de Bogotá. Diagnóstico social con participación social 2009-2010
- Bautista, M. (2018). Configuración del territorio rural de la localidad de Sumapaz, en el marco de las formas de desarrollo, adaptación y cambio social. Ed. Universidad de Granada. 2018. <http://hdl.handle.net/10481/51159>
- DANE (2017). *Bases SDS -RUAF-ND -Sistema de Estadísticas Vitales (2010-2016).*-ADE. Bogotá
- DANE (2018). *Bases SDS -RUAF-ND -Sistema de Estadísticas Vitales 2017.*-ADE. Bogotá
- DANE (2019). *Bases SDS -RUAF-ND -Sistema de Estadísticas Vitales 2018.*-ADE. Bogotá
- Giraldo, P. (2008). Criterios y lineamientos sociales para los procesos de ordenamiento territorial ambiental y desarrollo sostenible en la localidad de Sumapaz. Bogotá: Alcaldía Local de Sumapaz
- Hospital Nazareth I Nivel. E.S.E. Propuesta medicina alternativa y terapias complementarias
- Hospital Nazareth I Nivel. E.S.E. (2008). Parque Temático Chaquen “Por una familia sana, una localidad saludable y un entorno natural”. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2010). Anuario epidemiológico 2010. Localidad de Sumapaz. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2011). Anuario epidemiológico 2011. Localidad de Sumapaz. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2012). Anuario epidemiológico 2012. Localidad de Sumapaz. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2013). Diagnostico local con participación social 2013 Localidad de Sumapaz. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2014). Diagnóstico Local con Participación Social 2014 Localidad 20 Sumapaz. Bogotá, D.C.: Alcaldía Mayor de Bogotá.
- Hospital de Nazareth I Nivel E.S.E. (2015). Atlas de salud pública. Bogotá: Alcaldía Mayor de Bogotá.
- Montañez, G., y Delgado, O. (1998). Espacio, Territorio y Región: Conceptos básicos para un proyecto Nacional. Revista Cuadernos de Geografía, 120-131.
- SIHI (2019). Case Compendium 2015-2018. Available from: <https://socialinnovationinhealth.org/wp-content/uploads/2018/05/sihi-case-overview-booklet-2018-digital.pdf>
- Subred Integrada de servicios de salud Sur E.S.E. (Subred Sur) (2016). Plan de Intervenciones colectivas
- Subred Integrada de servicios de salud Sur E.S.E. (Subred Sur) (2018) Análisis de condiciones, calidad de vida, salud y enfermedad - 2018 Sumapaz. Bogotá, D.C.: Secretaría Distrital de Salud
- Vinyes, D (2003). Terapia Neural. *Natura Medicatrix*, 21(3):175-185. Barcelona, CAT.: Available from: <http://www.terapianeural.com/articulos/13-informacion-basica/18-ique-es-la-terapia-neural>