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State management of primary health care in response to COVID-19 in Bahia, Brazil

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Abstract *This is an analysis of state management of Primary Health Care in response to the COVID-19 pandemic in Bahia. It is a qualitative case study with interviews with managers and regulatory documents analyzed according to the categories of government project and government capacity. State PHC proposals were debated in the Bipartite Intermanagerial Commission and in the Public Health Operational Emergency Committee. The scope of the PHC project focused on the definition of specific actions to manage the health crisis with the municipalities. The institutional support of the state to the municipalities modulated inter-federative relations and was decisive in the elaboration of municipal contingency plans, training of teams and production and dissemination of technical standards. The capacity of the state government was dependent upon the degree of municipal autonomy and the availability of state technical references in the regions. The state strengthened institutional partnerships for dialogue with municipal managers, but mechanisms for articulation with the federal level and social control were not identified. This study contributes to the analysis of the role of states in the formulation and implementation of PHC actions mediated by inter-federative relationships in emergency public health contexts.*

Key words *Federalism, State Government, Primary Health Care, COVID-19.*

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Introduction

In universal health systems whose management is supported by inter-federal arrangements for the creation and implementation of health policies, coping with COVID-19 has been conditioned by the cooperation between sub-national spheres[1-3]. Adequate and timely responses to the health crisis caused by the COVID-19 pandemic require actions to strengthen the health systems and increase the capacity of public management in intersectoral and intergovernmental articulation and compensation for socio-sanitary inequalities[4-6].

At the international level, countries with more successful management of the pandemic combined responses that involved social support and investments in the health system with articulation of mitigation measures[7]. The greater involvement of central governments with sub-national spheres provided more effective responses to the health crisis[8]. In scenarios of delayed initiatives and omission by national governments, such as Mexico[9] and Brazil[10], the actions were fragmented and hindered the pandemic control.

In Brazil, the federal government's deliberate position against Science was characterized by the denial of the health crisis. Added to this fact was the federative crisis, a product of the current model adopted by the government that includes reduced support for sub-national entities and the consequent intensification of the conflict with state and municipal governments[11]. These elements converged to the federal lack of responsibility in the response to the pandemic[12,13], contributing to the absence of an action pattern aimed at the prevention and control of COVID-19.

The national lack of coordination created the need for greater cooperation between states and municipalities in an attempt to ensure synergistic and timely actions[11-13]. In decentralized health systems such as the Brazilian one, there is a complex combination of multiple sub-national entities for the management of health crises with the complexity of COVID-19[11]. Given this scenario, it becomes more challenging[4] for the state management to coordinate responses in cooperation with municipal managers.

Moreover, it is worth mentioning the historical erasure of the role of the states in the management of the Brazilian Unified Health System (SUS, *Sistema Único de Saúde*) given the emphasis on the municipalization of health as a strategy for decentralizing the system[14], which may have modulated the action of the State Health Secretariats (SES, *Secretarias Estaduais de Saúde*) in managing the pandemic. This may have contributed to the creation of new designs for inter-federative articulation, whether vertical, between states and municipalities, or horizontal, between states or between municipalities of the same or different regions, but which are not disconnected from the existing obstacles regarding territorial inequalities of social vulnerability to COVID-19 and access to health services.

In this sense, the strategic role of the SES in the planning and management of health actions and services is reinforced[15,16]. In Primary Health Care (PHC), initiatives from other countries disclosed intergovernmental management strategies between national spheres and regional health authorities to define criteria for monitoring territories in relation to the risk of Sars-Cov-2 transmission and a surveillance system integrated to PHC[8].

In Brazil, there is a lack of evidence on state management of primary services in response to the health crisis caused by the COVID-19 pandemic. The analysis of the contingency plans of the 26 Brazilian states and the Federal District in the first year of the pandemic showed the incipience of proposals for PHC in a large portion of these documents[16].

Therefore, this study aimed to analyze the state management of PHC in response to the COVID-19 pandemic in the state of Bahia from January 2020 to August 2021, aiming to contribute to the analysis of the SES role in its creation and management capacity of actions centered on PHC in municipal territories.

Method

This is a qualitative research that adopted the case study as the investigation strategy, whose analysis unit was the state management of PHC in response to the COVID-19 pandemic in Bahia. This article analyzed the variables "government project" and "government capacity", components of the 'Triangle of Government', a construct created by Carlos Matus[17].

The study had as its investigation scenario the Health Secretariat of the State of Bahia (SESAB, *Secretaria de Saúde do Estado da Bahia*). The state is divided into nine macro-regions and 28 health regions, where the 417 municipalities are distributed. The SESAB regional management is decentralized into nine Regional Health Centers

(NRS, *Núcleos Regionais de Saúde*) that join their Regional Health Bases (BRS, *Bases Regionais de Saúde*) and respective Regional Intermanagement Commissions (CIR, *Comissões Intergestores Regionais*)[18].

The Primary Care Policy of the state of Bahia (PEAB, *Política Estadual da Atenção Básica da Bahia*) established by decree of the state governor in 2013[19] is managed by the Primary Care Board (DAB, *Diretoria de Atenção Básica*). Permanent education and the integration between primary care and health surveillance are considered strategic actions for qualifying primary care developed by the DAB in accordance with the PEAB. Bahia Telehealth, a structure of the State Family Health Foundation subordinated to the DAB, implements permanent education actions for primary care professionals in the municipalities. Institutional support is one of the axes of the PEAB implementation and the DAB organizes its work process into nine teams of institutional supporters who provide technical support and follow the 417 municipalities, with the NRS mediation.

Up to 2020, Bahia had 3,695 Basic Health Units (BHUs), primary care coverage of 84.34% and Family Health Strategy (FHS) coverage of 77.54%, with all teams being co-funded with state resources[20]. The first case of COVID-19 in the state was confirmed on March 6, 2020 and by June 10, 2021 there were 1,053,031 confirmed cases, 1,016,780 recovered cases and 22,195 deaths from the disease[21]. During the pandemic, the SESAB set up an Operational Committee for Public Health Emergencies (COES, *Comitê Operacional de Emergência em Saúde Pública*), responsible for the articulation of actors involved in the design of state responses to the pandemic, with the Bipartite Intermanager Commission (CIB, *Comissão Intergestores Bipartite*), the decision-making space responsible for approving such proposals.

The production of empirical research material combined documental analysis and semi-structured interviews with key informants. Three versions of the State Contingency Plan to Fight Sars-Cov-2 (PEC, *Plano Estadual de Contingência para Enfrentamento do Sars-Cov-2*), the first version of the State Vaccination Plan against COVID-19 (PEV, *Plano Estadual de Vacinação contra COVID-19*), 184 CIB resolutions and other documents of interest, available on the SESAB website, published between January 2020 and August 2021, were analyzed. Forty-four interviews were carried out, guided by a script that addressed issues related to the planning and state management of PHC in the pandemic, with a technical team and leaders linked to primary care, epidemiological surveillance and COES from SESAB and from three municipalities selected by convenience, between November 28, 2020 and April 12, 2021. In the case of the municipalities, excerpts from the interviews that addressed the relations with SESAB to face the pandemic were selected.

Data analysis was carried out according to the following steps: the first related to processing and lexical analysis using the software Interface of R *pour les Analyses Multidimensionnelles de Textes et de Questionnaires* (IRAMUTEQ), version 0.7 alpha 2. In this step, the full transcription of the interviews was organized; followed by exhaustive reading for appropriation of the interviewees' discourse; pre-coding according to the dimensions of the interview script and arrangement of data in a single textual corpus. In the second stage, the textual corpus was analyzed using the descending hierarchical classification (Reinert's method), grouping new thematic classes using the chi-square test (chi^2) to measure the association between words and their classes (Analysis of Similitude), confirmed when the chi-square value was > 3.84 and the value < 5% ($p < 0.05$). After that, Bardin's discourse analysis was performed to interpret the meaning of the interviewees' words, recovering the text segments where these words appeared, and the most frequent lexicon started to make sense in the context of the discussion. Subsequently, this material was compared with the documental analysis and confronted with the categories that comprise the analytical plan of the study (Chart 1), namely: 'government project', related to the decision-making process, its actors and content of the state PHC proposals to face the COVID-19 pandemic and 'government capacity', corresponding mechanisms, instruments, forms of articulation and conditions of the DAB's management capacity that modulated the state's relations with other administrative spheres in response to the pandemic.

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Chart 1. Analytical categories, definition and analysis criteria of the empirical material.

Analytical category	Operational category	Criteria
Government project	Ideas, proposals, objectives, actors and spaces involved in the creation and decision-making process to constitute the state PHC response to the COVID-19 pandemic.	Actors and spaces involved in the creation process of the state government project for PHC in the COVID-19 pandemic. Proposed content of state decisions directed at PHC in coping with the pandemic in the state of Bahia.
Government capacity	DAB's management capacity to operationalize state proposals aimed at PHC in response to the COVID-19 pandemic.	Mechanisms and instruments used by the state management to support the PHC response in the municipalities. Conditions of the DAB's management capacity that modulated the state's relations with other administrative spheres in response to the pandemic.

Source: Authors.

Results

The data analysis corpus consisted of 88 texts from the interviews and the classic textual statistical analysis obtained 19,618 occurrences, 2,481 forms and 1,315 Hapax (words that appear only once). In the Analysis of Similitude, an interconnection between the words was observed, considering the index of co-occurrences that may be stronger or weaker, depending on the thickness of the lines (chi² test). Therefore, the thematic contents were identified based on the central lexical element "*pandemic*" and its different connections, with emphasis on the stronger associations with the terms: PHC, municipality, state.

Actors and spaces involved in the process of creation of the state government project in the PHC response to the pandemic

The DAB was the main actor in the creation of the state government project for PHC during the pandemic. Other participating actors were SESAB's Epidemiological Surveillance structures and the Bahia State Council of Municipal Health Secretariats (COSEMS, *Conselho Estadual de Secretarias Municipais de Saúde da Bahia*). State PHC proposals were debated and agreed between SESAB and COSEMS at the CIB, the main homologation space for state health crisis management strategies, in which the director of DAB had a seat.

Another institutional decision-making space mentioned by managers was the COES, where the DAB was invited to participate, as it was not a member of the Committee. In this space, proposals were translated into technical notes issued as recommendations to health services. According to reports, technical documents were prepared through the collaboration between the DAB, Epidemiological Surveillance and the COSEMS, discussed with municipal managers in the Collegiate of Primary Care Coordinators (COCAB, *Colegiados de Coordenadores de Atenção Básica*) of the health regions.

We created it jointly, because this action, we chose to be coordinated by the DAB and it should be coordinated by them and we created some Technical Notes (TN) together. We also had some meetings with COSEMS and with PHC professionals to discuss notes (EGE9).

Proposed content of state decisions directed at PHC in coping with the pandemic

During the study period, it is worth mentioning that, according to interviewees and analysis of CIB resolutions, the central topic of the meetings in this Commission on facing the pandemic was the distribution of clinical and ICU beds in the health regions, to ensure care for moderate and severe cases of COVID-19, given the chronic shortage of hospital beds, especially in the interior of the state. Another relevant topic that emerged in the first half of 2021 was the distribution, among municipalities, of vaccine doses for the priority groups defined by the National Operational Plan, amidst a scenario of vaccine shortage and lack of national coordination.

It was symbolic, once, a technician who worked giving support to the CIB meetings, said something like this, 'the meeting of the beds is about to start' (EGE11).

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The documental survey allowed the identification of the proposal content of state decisions on the PHC response to the pandemic in two editions of the PEC and in the Vaccination Plan, approved by the CIB; in addition to two specific resolutions issued by that Commission (Chart 2). Technical documents also revealed management decisions regarding the conduct to be observed by PHC professionals in the care and surveillance of COVID-19.

The interviewees mentioned the production of several technical notes. However, on the SESAB website, only a Standard Operating Protocol (SOP) issued by DAB in March 2020, and the document called "Strategies for the mitigation of social distancing measures" dated of July 2020, authored by state surveillance were located. Next, a systematization of the proposed content will be presented in order of relevance: versions of the PEC, Vaccination Plan, specific CIB Resolutions on PHC and technical-operational documents.

The first version of the PEC, dated February 2020, did not provide details on the PHC role in coping with the pandemic. The second version, published in March and updated in June 2020, defined a specific PHC axis, whose actions highlight the role of the state government in guiding the work of professionals in the care and surveillance of COVID-19; in identifying strategies for the acquisition and rational use of supplies and PPE; and in offering Telehealth support to the demands when facing the pandemic. The PEC explains PHC as one of the possible entry points for suspected cases; however, it did not include the basic units in the modeling of the care network to face the pandemic, structured into Service Centers, Exclusive Emergency Service, COVID-19 Referral and Support Units.

In June 2021, the third version of the Plan[22] was published, without modifying the care network model, but the role of PHC in facing the pandemic is declared, in line with the State Policy on Primary Care, namely:

Primary Health Care is the preferential gateway to the Unified Health System, having, during outbreaks and epidemics, a crucial role in the response to the disease of concern. It offers effective care, in addition to maintaining the longitudinality and coordination of care at all levels of health care, with great potential for early identification of severe cases that must be managed in specialized services[22] (p. 11).

In this version, the content of the PHC axis is improved, regarding the scope of actions directed at municipalities in the organization of the response regarding the provision of technical, normative support and permanent education actions on COVID-19 in PHC. There were specific proposals for the production of information on the established capacity of basic units that treated the suspected cases, monitoring of actions carried out at the local level and encouraging municipalities to fill out the B form – Flu Syndrome. The community health agent (CHA) role in the pandemic was mentioned in this document, aimed to meet the demands caused by the return of school activities in the territories.

Although the offer of technical support to municipalities in the qualification of PHC was one of the specific objectives of the PEC, the proposals were restricted to the support of specific actions to face the pandemic and did not address the state government's role in ensuring the necessary conditions for its consolidation in the coordination of care and in the ordering of care networks in a comprehensive way.

In early 2021, the PEV for Bahia was published with consecutive updates as a result of the expansion of priority groups. The definition of the most appropriate strategy for vaccination against COVID-19 was a joint attribution of the state and municipalities. There is a clear indication for the provision of vaccination rooms in health units as the place where immunizations are offered, which reinforces the relevance of PHC in facing the pandemic. The document also included recommendations for organizing the circulation flow of the target public in these services, seeking to prevent crowding.

Some specific aspects of PHC in coping with COVID-19 were addressed in the CIB meetings, with the following guidelines: standardization of personal protective equipment (PPE), COSEMS request on the flow of cases of Severe Acute Respiratory Syndrome in primary care, course for early identification and care of COVID-19, use of the B-Form/Flu Syndrome as an active 'case-finding strategy', and remote use of information and communication technologies (ICTs) for PHC care in general.

Among these topics, only two of them were the subject of a CIB resolution, in July 2020, among 184 resolutions on the pandemic issued between March 2020 and August 2021. Resolution n. 107/2020 approved the Health Telesharing Program with the Basic Care of the State of Bahia, in which it was proposed to use remote ICT for the resumption, expansion and strengthening of PHC care in the municipalities. Resolution n. 112/2020 dealt with the organization of

Chart 2. State proposals for PHC to face the pandemic, State of Bahia, 2020 to 2021.

Document	Content summary	Access link
State Contingency Plan to Fight the New Coronavirus – SARS-Co-V2. 2nd edition. June 2020 .	PHC axis: support and guidance on prevention and control measures for the COVID-19 virus; guidance to multidisciplinary teams for the implementation of the Clinical Management Protocol for the New Coronavirus (SARS CoV2) in Primary Health Care/MoH; guidance to health professionals in caring for historically excluded and more vulnerable populations; reorientation of the assistance provided by the municipal health teams for the necessary interventions according to the case progression; identification of strategies for the acquisition and distribution of supplies and PPE, as well as its rational use; guidance on the follow-up and monitoring of patients in home isolation in partnership with local health surveillance teams; holding WEB meetings with topics related to the New Coronavirus; referral of Telehealth to meet demands related to coping with the Coronavirus. PHC units as one of the gateways to care for suspected cases but they are not part of the assistance network for coping with the pandemic.	http://www.saude.ba.gov.br/wp-content/uploads/2020/06/Plano-de-Continge%CC%82ncia-Coronav%C3%ADrus-Bahia-2020-2606.pdf
State Contingency Plan to Fight SARS CoV-2.3rd edition, 2nd review. June 2021.	PPHC Axis: holding Collegiate of Primary Care Coordinators on the topic, using telehealth tools and other videoconferencing tools; articulation with municipalities that have cases of COVID-19, supporting health management, based on the guidelines for the organization of Primary Care-PC, in the fight against SARS-CoV-2; technical review of Procedures and Manuals for Health Professionals in coping with the coronavirus in the state of Bahia; survey and consolidation, by municipality and health region, of the number of Family Health Units and Basic Health Units that are points of Care in the Network for COVID-19 care; sharing and matrix support of municipalities in relation to legislation, protocols, regulations, among other technical products that guide municipal management for the organization of Primary Care; survey and consolidation of actions carried out by municipalities to face SARS-CoV-2; Permanent Education activities aimed at PC professionals working in the care of COVID-19; mobilization of the Municipal Health Secretariats on the importance of filling out the B- Form/IS instrument for the active search of COVID-19 cases; referral to the Health Telesharing Program with Primary Care in the state of Bahia as a strategy to resume, expand and strengthen the care offered by Primary Care in municipalities during and after the COVID-19 pandemic, through the remote use of Information and Communication Technologies - ICTs; production of educational activities and information materials through Telehealth to support professionals in coping with the Coronavirus; guidance on the possibility of using Information and Communication Technologies to monitor and meet the demands related to coping with SARS-CoV-2; identification of strategies for the acquisition and distribution of supplies and Personal Protective Equipment - PPE, as well as their rational use; Guidance on how to properly fill out the fields in the Individual Registration on e-SUS, aiming to qualifying health care (Social Name; Race/Skin Color; Is a member of a Traditional People or Community; Uses Medicinal Plants and Homeless Citizen); preparation of an informative technical note on COVID-19 for Primary Health Care workers in the municipalities of the state of Bahia; qualification of Community Health Agents to act in the face of the demands of the territory emerging from the return to school activities in the context of COVID-19. PHC units as one of the gateways to care for suspected cases but they are not part of the assistance network for coping with the pandemic.	http://www.saude.ba.gov.br/wp-content/uploads/2021/07/Plano-estadual-de-contingencia-SARS-COV2_Com-Linhas.pdf
Bahia Health Secretariat. Primary Care Board. Standard Operating Protocol N. 001. Service flow for suspected cases of COVID-19. Salvador, 03/17/2020	"Standardization of actions for the early detection of people characterized as suspected cases of infection with the new SARSCoV-2 coronavirus; initial management; activating transport and referral of suspected cases to the referral unit in a timely and safe manner; registration of clinical information, international travel history or contact with a suspected or confirmed case; investigation and recording of close contact data; carrying out immediate notification; adoption of measures to prevent severe cases and deaths; and guidance to the population on preventive measures". It indicates the biosafety measures to protect users and professionals of basic health units.	http://www.saude.ba.gov.br/wp-content/uploads/2020/03/POP-Fluxo-de-atendimento-de-casos-suspeitos-de-COVID-19_17-03-2020_BAHIA.pdf

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Chart 2. State proposals for PHC to face the pandemic, State of Bahia, 2020 to 2021.

Document	Content summary	Access link
Bahia Health Secretariat. Strategies for mitigating social distancing measures during the fight against COVID-19 in the state of Bahia in 2020. 1st edition, Salvador, July 2020.	"The SUS-Bahia care model adopts Primary Care as a gateway and has the characteristic of being capillarized, reaching 82.21% coverage in the state of Bahia, expanding the possibilities of disseminating health promotion strategies, monitoring and early detection of new cases. It is important to consider the different strategies that Primary Care can adopt together with health surveillance teams, expanding the capacity to detect, monitor and contain new cases and their contacts. It should be noted that through the 'Monitor Covid' application and the implementation of Form B for the active search for COVID-19 cases, Primary Care will be able to screen cases in its assigned area, detecting them early and referring them to the medium and high-complexity services when necessary. Also, the notification and treatment of mild cases would happen at an early stage, improving the sensitivity of the surveillance system". "The active search for cases through the identification of individuals at symptom onset will favor the implementation of timely isolation measures, adequate monitoring of cases and identification of health conditions, including those related to work. To think about the population's health care requires the mobilization of actors who work in health surveillance and primary care, aiming to prevent disease worsening and consequent hospitalization. The Health Units, once articulated, increase the health surveillance capacity of the SUS, acting in health promotion and prevention, providing care, testing and isolation, thus avoiding the collapse of the health system".	http://www.saude.ba.gov.br/wp-content/uploads/2020/10/Estrategias-para-a-Flexibilizacao-das-Medidas-de-Distanciamento-Social.pdf
CIB Resolution n. 107/2020	"It approved the Health Telesharing Program with Primary Care in the State of Bahia, expecting to resume, expand and strengthen the care offered by Primary Health Care in the municipalities, during and after the COVID-19 pandemic, through the use of remote Information and Communication Technologies (ICTs). The Telesharing Program comprises two integrated offers: specialized Teleconsulting (exchange of information and opinions between health professionals with the aim of clarifying doubts based on scientific evidence) and Teleconsulting with the intention of referral (discussion of a case in which the Primary Care professional requesting the consultation intends to refer the person assisted in their Health Unit to receive care at the specialized referral service). The Program offers specialized teleconsulting in different medical specialties such as: Angiology, Cardiology, Endocrinology, Pediatric Endocrinology, Stomatology, Gastroenterology, Gynecology, Hepatology, Immunology, Infectious Diseases, Mastology, Occupational Medicine, Nephrology, Neurology, Nutrology, Oncology, Orthopedics, Pediatrics, Proctology , Psychiatry, Rheumatology, Urology".	http://www5.saude.ba.gov.br/portalcib/images/arquivos/Resolucoes/2020/RES_CIB_107_2020.pdf

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primary care in the follow-up and monitoring of cases with the approval of the follow-up flow and the sending of the municipal consolidation weekly, through the implementation of Form B for the registration of cases of Influenza Syndrome.

The SOP on the flow of care for suspected cases of COVID-19 for professionals at basic health units was the first technical orientation on PHC actions issued in March 2020. It contained instructions on clinical and epidemiological procedures, activating health transport, biosecurity and population prevention measures.

As for the recommendations for mitigating social distancing measures, published in July 2020, the role of PHC in strengthening surveillance in the territory stands out, as part of the capacity of the health system to be considered in the return of economic activities. To improve the sensitivity of the surveillance system, the use of the "*Monitor Covid*" application developed by the Northeast Consortium and the implementation of Form B for the active search of cases prepared by DAB was proposed.

Chart 2. State proposals for PHC to face the pandemic, State of Bahia, 2020 to 2021.

Document	Content summary	Access link
CIB Resolution n. 112/2020	"Provides guidelines for the organization of primary care, in the follow-up and monitoring of cases of COVID-19, promoting guidance for the monitoring of cases of COVID-19 by primary care, approving the follow-up flow and sending the municipal consolidated data weekly".	http://www5.saude.ba.gov.br/portalcib/images/arquivos/Resolucoes/2020/RES_CIB_112_2020.pdf
COVID-19 State Vaccination Plan	"This plan brings together institutional political actors relevant to the implementation of actions in the locoregional territory, such as the Regional Health Centers (NRS), Primary Care Boards (DAB), Municipal Health Secretariats, Sanitary District of Indigenous Health (Dsei/Bahia) and the collegiate instances of SUS management and agreement, such as COSEMS, CIB, CIR, and social control, such as CES and CMS (...)Considering the places with the greatest population flow and with the aim of facilitating access to vaccination, the municipalities, together with the state, will define the best strategy to vaccinate the population, in a quick and timely manner, in the vaccination rooms of the health units and at mobile vaccination clinics (...) Vaccination against COVID-19 may require different strategies, due to the possibility of offering different vaccines, for different age groups/groups and considering the reality of each municipality. When preparing local micro-programs, the following aspects should be considered to define vaccination strategies: vaccination of health workers: requires joint work between Primary Health Care, Urgency and Emergency care, especially for those who work in exclusive units for COVID-19 care; vaccinating the elderly: house-to-house vaccination can be a strategy in response to those who have limited mobility or are bedridden; drive-thru vaccination in urban centers; Organization of the primary health unit on different vaccination fronts, aiming to avoid crowds (consider the disposition and circulation of these people in the health units and/or external vaccination clinics).	http://www.saude.ba.gov.br/wp-content/uploads/2022/03/Versa%CC%83o-atualizado-11-03-22-Plano-Vacinacao-COVID-19-CIVEDI-DIVEP-8-edicao.pdf

Source: www.saude.ba.gov.br/coronavirus.

State management capacity for PHC in response to the COVID-19 pandemic

The initial articulation between the state and regional and municipal managers was guided by a work plan that prioritized the macro-regions with greater community transmission of Sars-Cov-2 and guided the process of preparing the municipal contingency plans (MCP). The MCP model designed by DAB was inspired by the PEC version and the NRS and BRS were strategic in the articulation between the state and local managers in the municipal planning process. The prior experience of DAB's institutional support to the territories facilitated the state's role in coordinating the creation of the MCP.

We always worked with this matter of planning together with the territory, not only involving the municipality, but also, and mainly, the health regionals [...] each supporter was assigned to a certain region, to be able to serve both the municipalities and the regional itself. We kept on articulating [...] (EGE12).

We created a model of a municipal contingency plan, with what it was necessary to be contained in each of these plans. We sent it to the bases and the bases made the offer to the municipalities, so they could make a more realistic plan (EG12).

The state management of actions aimed at PHC was operationalized mainly in a remote manner, through the expansion of Telehealth resources to offer virtual rooms for the debate between the DAB and regional and local representations, in the context of social distancing. The debates involved the dissemination of scientific recommendations, offering of short courses and web lectures for PHC and health surveillance professionals, with the support of COCAB in this process. Other mechanisms included the use of WhatsApp messages, social networks and Telehealth virtual platforms to disseminate information aimed at municipal PHC managers.

As a Telehealth Center, before the pandemic started, we expanded the technology scope we had. We sought to get more virtual rooms so that we could handle the web meetings in view of the need

to provide guidance to the municipalities remotely [...] (EGE3).

Despite the state-municipal articulation mechanisms presented herein, SESAB's institutional capacity was asymmetrical. First, because the state managers were unable to institute discussions and monitor the implementation of the MCP in all municipalities in Bahia. The DAB's relationship with PHC and surveillance coordinators was related to the degree of organization and autonomy of the Municipal Health Secretariats (MHS) showing that in the territories of municipal secretariats with greater technical and administrative capacity, there may have been less dependence on the central state level and, consequently, less adherence to the proposed actions.

There are PHC coordinators who have a slightly more independent work process and managed to make this articulation with others who have a certain difficulty. For instance, Salvador has a more structured organizational structure, so they don't demand this more direct support (EGE13).

Second, because the lack of technical references for PHC in some Centers and BRS impaired the territorial availability of technicians with expertise to support state actions. Moreover, in some health regions, DAB technicians had more consolidated relationships and, in others, more incipient ones.

There are bases that don't have anyone of reference for the PHC and have one for surveillance, but there is no one for the PHC. There are bases that have a professional who accumulates all the sections, in which the error is actually having one, but the professional is in charge of all the surveillance and also of PHC, you know? (EGE12).

It depends on the interpersonal relationships with the technicians. We have stronger relationships in some bases and, in some centers, we have more difficulties (EGE13).

DAB increased the partnership with COSEMS aimed at dialoguing with municipal managers, mainly on conflicting agendas for agreements involving the distribution of PPE and supplies sent by the Ministry of Health. However, no articulation mechanisms were identified between the state and federal levels and social control. The scenario of lack of national coordination was mentioned by the interviewees who recognized the support of the National Council of Health Secretaries (CONASS, *Conselho Nacional de Secretários de Saúde*) and the National Council of Municipal Health Secretariats (CONASEMS, *Conselho Nacional de Secretarias Municipais de Saúde*) in replacing the role that should be played by the federal government.

COSEMS was a partner. The DAB made an entire organization to distribute what the MoH guaranteed, initially, due to the difficulty, even, of purchase. Neither the municipality could buy, nor the state. What was made available by the MoH, the DAB had this role in an articulated way together with the COSEMS in a joint spreadsheet, it was even something that was agreed upon (EGE13).

CONASS and CONASEMS became our interlocutors, assuming the role that was formerly held by the Ministry of Health, articulating with foundations, obtaining funds for the states. It was a very complicated thing. There was no guidance except from technical notes and many appeared after we had already published the state TN (EGE3).

We did not have a greater articulation in relation to this. We've already talked about this, these spaces for bringing civil society more often into the discussions... these spaces are more fragile. Unfortunately, this is also an articulation that needs to be strengthened (EGE11).

Discussion

At the CIB, the visibility of PHC in the directives on the pandemic was timid, in contrast to the emphasis of debates and resolutions on hospital care. This evidence indicates the centrality of the hospital-centered model in coping with the pandemic, a predominant logic in Brazil and in other international experiences[23,24].

Making PHC the care coordinator and organizer of the care network, given the hegemonic hospital-centered model, is a radical proposal to change the organization of the SUS, a bold government project. The directionality of the project conditions and is conditioned by the government's capacity as a social actor[17]. Projects that mean significant changes in the work of an organization will require more government capacity. To what extent the institutional support offered by the DAB to municipal PHC coordination was sufficient given the complexity of the required change is a question to be answered in future studies.

The CIB stood out as a strategic space for decision-making and action regulations aimed to fight the pandemic, in line with the institutional role of this collegiate in the implementation of policies at the state level. The CIB's action in response to the pandemic, as the space responsible for producing action regulations for COVID-19, was an evidence also found in other states[25].

The pandemic management could be an opportunity to create the necessary conditions to strengthen PHC in Bahia, considering the gov-

ernment capacity that the DAB accumulated throughout its trajectory of institutional support to municipal administrations. However, it is worth highlighting the institutional constraints caused by the precarious cooperation between the SESAB and the Ministry of Health and the dismantling of territorially-based and community-oriented PHC already underway and derived from the review of the National Primary Care Policy since 2017[26], which compromised a sustained response of PHC as care coordinator and network organizer. The capacity to govern deals with the mastery of techniques, methods and skills, necessary for actors to conduct theoretical, methodological and technical government processes"[17]. It was evidenced that the capacity of the state government was greater in strategies of higher expertise in the central management, such as the handling the ICTs and cooperation with the regional/municipal levels.

On the other hand, the state management capacity during the pandemic was heterogeneous at the regional level, which conditioned the support and monitoring of municipal actions and is related to the recentralization logic of the regional management in the state of Bahia, implemented from 2015 onwards, which promoted the extinction of the regional boards and the creation of the NRS and BRS, many of them without the necessary personnel structure to perform the required functions together with the municipalities.

Another determinant of the state management capacity was the degree of autonomy of the SMS. Studies indicate that larger municipalities have more autonomy in the implementation of health policies, due to the greater structuring of their departments, which implies less dependence on the state government[27]. This scenario, which combines autonomy and interdependence between sub-national entities, highlights historical challenges in the regional management of the SUS[28].

It should be noted that PHC actions in the pandemic are responses predominantly implemented at the municipal level[25], but it should be emphasized that the relative autonomy of managers at a municipal level combined with the erasure of the state role[14] can contribute to a strong local bias to the detriment of regionalized responses[29,30]. Regarding the complexity of the COVID-19 pandemic, this may limit the synergistic effects of the response of each local sphere in the regional territory[31].

The evidence from this study endorsed the multiplicity of actors needed to build the viability of state proposals for PHC, which is in line with Matus' proposals[17] regarding the construction of the institutional capacity to govern as a process that involves multiple social actors. The participation of different actors and management spaces in the state response to the COVID-19 pandemic demonstrated the need for the dialogue between the actors at the state, regional and municipal levels.

The construction of the government's capacity requires the expansion of institutional competence for the implementation of a project[17]. In the studied scenario, the accumulated expertise of the state of Bahia in the management of Telehealth allowed this strategy to be appropriately incorporated into management actions to increase the institutional capillarity of the DAB in cooperation with municipalities, reconfiguring the scope of ICTs beyond the professional training of PHC teams and the matrix support from specialized care to primary care. This finding differs from national[32] and international[33] experiences of ICT use, commonly associated to user care in the context of COVID-19.

Finally, the act of governing involves a diversity of projects under dispute and may reflect divergent interests among the social actors[17]. In this study, an incipient state-federal articulation was verified, which can be explained by national evidence on the dispute of different political projects regarding measures to face COVID-19, which disclosed the competition and judicialization of federative relations[10,30]. This scenario differs from international experiences that attained better responses to the pandemic, evidenced by the greater capacity for intergovernmental articulation[7].

When considering the situation of community transmission of COVID-19, it is necessary to prioritize the role of primary health care in actions aimed to prevent and control health crises of this nature. Projects centered on territorially-based, community-oriented, comprehensive and effective PHC require technical-operational, financial and political viability for their implementation. However, the response to the pandemic took place in a scenario of the Family Health Strategy (FHS) failing as a priority model for organizing PHC in Brazil.

The findings of this study reinforce the role of the SES in coordinating PHC management and the relevance of institutional support and permanent education initiatives to mediate inter-federal cooperation between states and municipalities, aiming to increase the local capacity to face health crises. It is worth emphasizing the need to reduce SES management asymmetries between

health regions, aiming to produce synergistic actions in unequal but interdependent territories.

In short, the state management of PHC actions during the course of a pandemic such as COVID-19 requires the confluence of projects and coordinated actions between the three spheres of the government; the creation of emergency decision-making spaces with the inclusion of state boards of primary care as effective members; cooperation between states and municipalities in regional intermanager spaces; the sufficiency of regional technical references in PHC to support the actions implemented at the municipal level; the expansion of communication technologies for inter-federative articulation in social distancing and greater support for municipalities with low technical and administrative capacity.

Among the limitations of the study, the non-inclusion of key informants at the federal, regional levels and from different-sized municipalities stand out, which did not allow comparing information according to the perception of other actors who also comprise the scenario for implementing the response to the pandemic. Future studies must be carried out to elucidate what conditions are necessary to make PHC the care coordinator and order the care network, in a scenario of "war" brought on by health crises with the magnitude and complexity of the COVID-19 pandemic.

Collaborations

All authors equally participated in all stages of the study.

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