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# Health workers and COVID-19: flailing working conditions?

Trabalhadores(as) da saúde e a COVID-19: condições de trabalho à deriva?

#### **Abstract**

Objectives: to analyze the working conditions of health professionals facing the COVID-19 pandemic in Brazil based on online media reports published in prominent news portals. Methods: qualitative analysis of 22 news stories selected from two of the main Brazilian news portals, published between April 20 and 30, 2020. Based on thematic content analysis, we defined five categories: Personal Protective Equipment (PPE) and COVID-19; health workers with comorbidities working on the front line; illness and death due to work; access to treatment and work leave due to COVID-19; resigning from work and professional updating. Results: the news stories reported inadequate working conditions due to lack of and/or inadequate PPE; health care workers with comorbidities remaining at work; sickness and death from COVID-19; strain and fear of being infected, and having to deal with co-workers' sickness and death; difficulties in getting tested for COVID-19 and obtaining sick leave for treatment; resigning from health care work; need for fast professional updating for COVID-19 health care. *Conclusion*: the pandemic clearly evidences the need for public investment in health care for workers in charge of caring for the population.

**Keywords:** working conditions; infection by coronavirus; personal protective equipment; mass media; occupational health.

#### Resumo

Objetivos: analisar as condições de trabalho dos profissionais de saúde que atuam na pandemia de COVID-19, no Brasil, com base em reportagens publicadas na internet por veículos de comunicação jornalística. Métodos: análise qualitativa de 22 reportagens selecionadas de dois dos principais portais de notícias brasileiros, publicadas entre 20 e 30 de abril de 2020. Por meio da análise temática de conteúdo, foram definidas cinco categorias: Equipamento de Proteção Individual (EPI); profissionais de saúde com comorbidade na linha de frente; adoecimento e morte pelo trabalho; acesso ao tratamento e afastamento do trabalho; desistência do trabalho e atualização profissional. Resultados: as reportagens evidenciaram condições de trabalho inadequadas por ausência e/ou precariedade dos EPI; continuidade do trabalho de profissionais de saúde com comorbidades; adoecimento e mortes pela COVID-19; tensão e medo de serem infectados(as) e de lidar com o adoecimento e morte de colegas; dificuldades no acesso aos testes de COVID-19 e para afastamento do trabalho para tratamento; desistências de trabalhar na atividade; necessidade de atualização rápida para o cuidado em saúde na COVID-19. Conclusão: o cenário pandêmico deixa evidente a necessidade primordial de investimento público no cuidado daqueles(as) que estão à frente dos atendimentos à população.

**Palavras-chave:** condições de trabalho; infecção por coronavírus; equipamentos de proteção; meios de comunicação de massa; saúde do trabalhador.

#### Introduction

In late January 2020, the World Health Organization (WHO) declared the Covid-19 outbreak, caused by the new coronavirus SARS-CoV-2, a public health emergency, characterizing it as a pandemic in March 2020<sup>1</sup>, which brought about changes in people's way of life and in daily health care practices worldwide. On that occasion, people were recommended to follow the protective measures published by WHO in order to prevent the large-scale spread of the virus and the collapse of health systems, whose resources were no longer sufficient to deal with the large number of infected people.

In addition, the COVID-19 pandemic raised global awareness of the health care work done by doctors, nurses and nursing technicians, physiotherapists, psychologists and social workers, who are at the forefront of disease prevention programs and care of the most serious cases. According to the Brazilian Federal Nursing Council (Cofen), on December 1, 2020, there were 43,788 infected people and 460 deaths among health professionals (63.9% women)<sup>2</sup>. These figures alone give an idea of the difficulties and violence related to the working conditions endured by these workers in Brazil.

The increase of COVID-19 cases and the intensification of health care work have created a worrying and health-threatening scenario for these professionals, who therefore need an adequate provision of Personal Protective Equipment (PPE) and training in how to use it<sup>3</sup>.

COVID-19 requires specialized care, especially for patients who need to be admitted to intensive care units (ICU), many of them on ventilators due to pulmonary impairment. In addition to providing such care for sick people, health workers, especially those on the front line, have to take difficult decisions regarding the treatment of their patients. And, at the same time, they witness co-workers being put on leave due to infection by COVID-19, which ends up by causing work overload. In this sense, offering adequate working conditions is a crucial factor for preserving these professionals' health during this pandemic<sup>4,5</sup>.

We understand working conditions as situations related to physical and material resources needed to carry out work, such as supplies and machinery. Thus, it is through working conditions that labor market aspects are analyzed (hiring, career stability, as well as safety and health risks during the work routine)<sup>6</sup>. And due to precarious working conditions, occupational illness is a reality in several areas. It is up to labor management to provide dignified and safe conditions to preserve the health of all workers, particularly in the context of a pandemic, in which the risk of contamination by the new coronavirus is one of the challenges for health care and labor management professionals.

Another issue concerns the health care workers' pay in Brazil, considering that precarious employment is a reality in this sector due to low wages, outsourcing, work overload, fear of job loss, as well as poor working conditions<sup>7</sup>. Therefore, low wages mean that workers need to have more than one job, accumulating shifts in different health institutions in an attempt to make ends meet. That said, the fact of having more than one job can lead to physical and mental strain.

Discussing work in the field of health care requires understanding that the work process, as well as its conditions, is closely related to health, for according to Thébaud-Mony<sup>8</sup>. it is "a process that marks the body, the person, with the signs of work, of living conditions, of pains, of pleasure and suffering, of everything that comprises an individual life story in its singularity, but also collective by the influence of multiple logics surrounding the it" (p. 220)<sup>8</sup>.

After the beginning of the pandemic in Brazil, numerous news stories were published on social networking sites and in news media describing the working conditions of Brazilian health care professionals on the front line against COVID-19.

Thus, the objective of this study is to analyze the working conditions of health workers who have provided health care during the COVID-19 pandemic in Brazil, based on online media reports published in prominent news portals.

#### Methods

This is a qualitative study that draws on news media to apprehend the narratives of workers providing care for people diagnosed with COVID-19. At the beginning of data collection, the *Correio Braziliense*, *Folha de São Paulo* and *O Estado de São Paulo* newspapers, and the *Terra*, *G1* and *Uol* portals were used as sources of online media. However, with the exception of the last two cited outlets, the news media consulted had a reduced number of stories and did not provide enough information to address the object of this study. On the other hand, the *G1* portal contained news stories (broadcast and text) on the working and health conditions of workers on the front line of care against COVID-19 in all Brazilian regions (capitals and countryside cities), with statements by health professionals, managers and representatives of trade unions and professional councils (especially of medicine and nursing).

Thus, we used news stories (text and broadcast) from  $G1^g$  and  $Uol^h$  on the working and health conditions of such professionals, selected by using the keywords, in Portuguese, "COVID-19" and "profissiona\*.", both in singular and plural form.

The selected reports were published between April 20 and 30, 2020. The time frame was necessary in view of the number of reports on the topic during that period. We selected 41 from *G1* and 7 from *Uol*, totaling 48, 22 of which used in the analyses of this study.

It is noteworthy that news media have already been used in a study on pandemic. In that case, the authors indicated the possibility of shedding light on "the subject's inner self, his feelings, reports of actions and so on" (p. 62)<sup>9</sup>. When choosing texts for analysis, we used indirect and direct speech in order to grasp the purposes of experiences, to understand specific topics and to address our theme through the narratives, i.e., to make the experiences of health workers and their context visible. News stories make it possible to apprehend the feelings, experiences, fear of illness and death and family routines in the face of a pandemic<sup>9</sup>.

Content Analysis (AC) was used to investigate the workers' narratives<sup>10</sup>. As recommended by Minayo<sup>11</sup>, the first stage of CA consisted of preanalysis by skimming the collected material and building the text corpus, with the research team paying special attention to the initial goals. Then we explored this material, actively searching for main expressions, their meanings and the narratives main actors selecting theoretical/analytical categories, among other activities. In the last stage we decided how to treat the results and their interpretations<sup>11</sup>.

For this last stage we defined five analytical categories related to the reality of the health workers' working conditions due to their care against COVID-19: PPE and COVID-19; health workers with comorbidities on the front line; illness and death due to work; access to treatment and work leave due to COVID-19; resigning from work and professional updating for COVID-19.

This research is part of the project entitled "Work, health and emotions: health workers faced with COVID-19," which was analyzed by the Research Ethics Committee (CEP) of the National School of Public Health of the Oswaldo Cruz Foundation and received approval n. 06/2020, issued on May 5, 2020, as it concerns the analysis of public and open data.

## Results and discussion

**Chart 1** features an overview of the COVID-19 pandemic in Brazil: decrees, federal government decisions, number of cases and deaths, professional associations, among others.

**Chart 2** features the main news stories used in this research. From the 48 news stories, 22 were selected for this article.

g Available from: www.g1.globo.com.

h Available from: www.uol.com.br.

Chart 1 Summary of events related to the COVID-19 pandemic in the period of data collection in news media

Date	Event	Developments
March 11, 2020	WHO declares COVID-19 a pandemic <sup>1</sup> .	Global obligation to adopt measures to prevent and control the disease <sup>1</sup> .
March 16, 2020	Rio de Janeiro and São Paulo (capitals) already had cases of community transmission <sup>12</sup> .	Changes in protocols to identify suspected cases and reorganization of services due to increase in cases <sup>12</sup> .
March 30, 2020	Cofen creates a form to notify suspected and/or confirmed cases of COVID-19 among health workers. Creation of the "Nursing Observatory" to monitor cases among workers <sup>2</sup> .	Illness of workers on the front line is afforded visibility, showing the importance of discussions related to their work. Other councils did not follow suit, making it difficult to analyze the situation of multidisciplinary health teams <sup>2</sup> .
April 8, 2020	President Jair Bolsonaro diverges on the issue of social distancing from recommendations and decisions taken by governors and mayors <sup>13</sup> .	The Federal Supreme Court (STF) grants an injunction requested by the Brazilian Bar Association (OAB) ensuring the power of states, municipalities and the Federal District to make decisions to face COVID-19, such as restrictions on movement of people, closing of schools, shops and other activities <sup>13</sup> .
April 9, 2020	The Oswaldo Cruz Foundation, a public health institution, creates the "COVID-19 Observatory." <sup>14</sup>	The observatory was created as a channel for the disclosure of data and studies and integration with other projects <sup>14</sup> .
April 16, 2020	Political disagreements between President Bolsonaro and Health Minister Luiz Henrique Mandetta over actions and guidelines for coping with COVID-19 <sup>15</sup> .	The health minister is dismissed in the midst of the pandemic <sup>15</sup> .
April 17, 2020	The new health minister, Nelson Teich, takes office.	Following disagreements with the president regarding the use of chloroquine, Nelson Teich resigns 29 days after his being appointed. No new health minister is appointed for 17 days <sup>16</sup> .  Eduardo Pazuello assumes as interim minister and is officially appointed in September <sup>17</sup> .
April 30, 2020	85,380 confirmed cases <sup>18</sup> .	5,901 deaths from COVID-19 <sup>18</sup> .

Chart 2 Selected news stories and information related to the working conditions analytical categories

Title, source and date	PPE and COVID-19	Workers with comorbidities on the front line	Illness and death due to work	Access to treatment and work leave due to COVID-19	Resigning from work and professional updating for COVID-19
Death of technicians from COVID-19 at the Osid hospital causes apprehension among workers: Worker is resigning <sup>19</sup> . <i>G1</i> , on April 30, 2020.	Scarce or inadequate PPE, according to workers.	No information.	Death of two nursing technicians and workers get ill from COVID-19.	Health professionals put on leave due to COVID-19. Psychological support, according to labor management.	Reports about fear of contagion and resignation.
Almost 50% of health care workers heard by Public Labor Prosecutors in Minas Gerais report that workers with symptoms of COVID-19 are not granted leave <sup>20</sup> . <i>G1</i> , on April 30, 2020.	Lack of adequate gowns and N95 masks.	No information.	No information.	Doctors and nurses with COVID-19 are not granted leave.	No information.

(Continued)

**Chart 2** Continuation...

Title, source and date	PPE and COVID-19	Workers with comorbidities on the front line	Illness and death due to work	Access to treatment and work leave due to COVID-19	Resigning from work and professional updating for COVID-19
More than 2,200 health workers in RJ were put on leave with suspected COVID-19 contagion or for belonging to risk groups <sup>21</sup> . <i>G1</i> , on April 30, 2020.	No information.	2,200 at-risk health workers with suspected contagion were put on leave.	Death of health workers (11 doctors and 18 nurses) from COVID-19.	Workers with COVID-19 put on leave.	No information.
Nurses protest against lack of PPE to care for patients with COVID-19 <sup>22</sup> . <i>G1</i> , on April 25, 2020.	Lack of and inadequate PPE (face masks and gowns), according to the workers. Labor management reports purchase of PPE.	No information.	No information.	Availability of COVID-19 tests for health care workers is reported.	Training courses were offered to about 60 workers.
More than 250 health care workers tested positive for COVID-19 in Maranhão <sup>23</sup> .	No information.	Death of a 61-year-old nursing assistant with diabetes and obesity.	250 workers tested positive for the disease, 127 recovered and 6 died.	The nursing assistant who died from the disease was on leave.	No information.
Health workers face fear and pressure in the fight against coronavirus <sup>24</sup> . <i>G</i> 1, on April 26, 2020.	Lack of and inadequate PPE (face masks and gowns), according to the workers.	No information.	Workers report psychological stress, fear, panic syndrome, psychic distress, use of anxiolytics and/or anti- depressants and insomnia. Death of 53 nurses.	More than 7 thousand health workers put on leave. Psychological support for health workers.	Workers are resigning, according to a doctor.
Every 11 minutes, a nurse working in care against COVID-19 seeks psychological assistance <sup>25</sup> . <i>G1</i> , on April 24, 2020.	Shortage of PPE.	Reports that health workers over 60 are denied leave for COVID-19 or psychological problems.	Reports of cases of depression, panic syndrome, anxiety, stress, insomnia, exhaustion and fear of contagion.	Difficulty to obtain sick leave for COVID-19 treatment and/or mental health problems.	Workers report lack of training to care for patients with the new coronavirus.
Paraná has 63 staff of state hospitals on leave due to COVID-19 <sup>26</sup> . <i>G1</i> , on April 24, 2020.	Shortage of PPE and hospital equipment.	No information.	Psychological symptoms such as fear of contamination. Underreporting of illness cases.	63 health workers on leave due to the disease. All staff with symptoms are placed on leave.	No information.
In two days, the number of health workers with COVID-19 increases 66% in ES <sup>27</sup> . <i>G1</i> , on April 22, 2020.	Shortage of PPE.	No information.	284 health workers contaminated by COVID-19.	One worker reported to be on leave.	Report that no training for COVID-19 care was offered at the outbreak of the pandemic.

(Continued)

**Chart 2** Continuation...

Title, source and date	PPE and COVID-19	Workers with comorbidities on the front line	Illness and death due to work	Access to treatment and work leave due to COVID-19	Resigning from work and professional updating for COVID-19
Staff of the Miguel Couto Hospital at risk for COVID-19 say they have not been given leave <sup>28</sup> . <i>G1</i> , on April 23, 2020.	Shortage of or inadequate PPE, according to workers. The hospital management says PPE is sufficient.	At-risk health workers are not given leave.	Reports of death of workers, including those at risk (diabetes) for COVID-19.	No information.	No information.
Coronavirus: nurses in Rio claim lack of support and equipment in ICU <sup>29</sup> . <i>G1</i> , on April 23, 2020.	Shortage of and inadequate use of PPE.	Report that health services management ignores which workers are at risk.	11 nurses dead and 548 on leave. Emotional symptoms like fear and depression.	Lack of tests for workers suspected of COVID-19 contagion. Difficulties to obtain psychiatric care.	No information.
President of the medical association talks about contamination of workers by COVID-19 <sup>30</sup> . <i>G1</i> , on April 23, 2020.	Shortage of PPE and hospital supplies.	No information.	Death of health workers from COVID-19 and fear of contagion.	No information.	Recently graduated health workers called to assist in the pandemic.
Number of health workers with COVID-19 in Paraíba increases 66% in one week <sup>31</sup> . <i>G1</i> , on April 22, 2020.	Importance of having adequate PPE for workers.	No information.	45 workers infected by the disease. Death of health workers from COVID-19.	Purchase of COVID-19 tests for health care workers.	Courses on donning and removing PPE to avoid contamination of workers.
58-year-old nurse is the first health worker to die from COVID-19 in Amapá <sup>32</sup> . <i>G1</i> , on April 22, 2020.	Report of purchase of PPE and hospital sanitization and cleaning products.  Shortage of PPE.  Complaints of water shortage in the hospital environment, denied by hospital management.	No information.	Death of a nurse who was on leave due to contagion; according to family members, she was not contaminated in the workplace.	52 nurses placed on leave due to contagion.	No information.
ES records 101 new cases and totals 1,313 people infected by COVID-19; 206 are health workers <sup>33</sup> . <i>G1</i> , on April 21, 2020.	No information.	No information.	206 health workers infected by coronavirus.	No information.	No information.
RJ has 6 deaths and more than 1,800 health workers on leave due to COVID-19: "It took a piece of us," says the victim's daughter <sup>34</sup> .  G1, on April 21, 2020.	No information.	No information.	Six deaths and around 1,800 health workers on leave due to COVID-19. Symptoms related to COVID-19 and feelings of sadness.	No information.	No information.

(Continued)

Chart 2 Continuation...

Title, source and date	PPE and COVID-19	Workers with comorbidities on the front line	Illness and death due to work	Access to treatment and work leave due to COVID-19	Resigning from work and professional updating for COVID-19
12 health workers in São Paulo have died from COVID-19, says city official <sup>35</sup> . <i>G1</i> , on April 21, 2020.	Need to purchase PPE to provide care for the disease.	No information.	There have been 12 deaths from COVID-19 in the capital city of São Paulo. 3,336 workers are on leave due to the disease.	No information.	No information.
More than 4,000 nurses have been contaminated with COVID-19 <sup>36</sup> . <i>G1</i> , on April 20, 2020.	Shortage and inadequate use of PPE.	Workers in atrisk groups must be removed from contact with people with COVID-19.	About 4,600 nurses contaminated with the new coronavirus.	Approximately 500 workers placed on leave per day.	No information.
68-year-old hospital cleaner is entitled to Covid testing but cannot get a test <sup>37</sup> . <i>Uol</i> , on April 28, 2020.	Shortage and inadequate use of PPE	Hospital cleaning worker member in at-risk group is denied leave from work.	One worker fallen ill with COVID-19.	Testing for the disease is required, especially for workers in direct contact with COVID-19.	No information.
In Pará, 42% of confirmed coronavirus cases are in the health care field <sup>38</sup> . <i>Uol</i> , on April 28, 2020.	Shortage of PPE.	Permanence of at-risk workers in COVID-19 care.	Almost half of COVID-19 cases are health workers, seven of them died.	No information.	No training to provide health care for people with COVID-19.
Technician resigns from hospital in RJ: "I've never experienced anything like this." 39  Uol, on April 29, 2020.	Shortage of PPE.	No information.	No information.	No information.	A nursing technician quits her job due to poor working conditions.
PE has waiting list for ICU; workers already have to choose who to admit <sup>40</sup> . <i>Uol</i> , on April 29, 2020.	No information.	No information.	Work overload due to increase in cases of the disease, which can lead to occupational illness.	No information.	Need to hire health care staff.

#### **PPE and COVID-19**

From the outset of the pandemic, international organizations have argued that health care workers are people who are in close contact with the new coronavirus and therefore considered a group at high risk of contagion by the disease. They are the ones who, by providing health care, carry out invasive procedures such as intubation, collection of lung secretions, bronchoscopies, among others<sup>41,42</sup>, which evidences the need to protect these workers' safety and health .

Thus, to face COVID-19, health care workers must wear PPE, which should be provided by health institutions to all workers for free<sup>43</sup>. It consists of surgical and breathing protection face masks (N95, N99, N100, PFF2 or PFF3 respirators), eye and face protectors, gown or apron and hood<sup>44</sup>.

After reading the 22 reports in full, we observed that in 15 of them, health workers from different parts of Brazil mentioned the main problems they were facing at the time regarding the adequate PPE provision: We sign a receipt for the N95 mask and googles. And then, from the moment you sign it, you can't get another mask. So you have to keep that one, I don't know how long, which is already wrong, because the N95 has an expiry date<sup>29</sup>:

We noted the issue reported by these workers in having to submit to this condition which does not ensure adequate protection. The National Health Surveillance Agency (Anvisa), which regulates the equipment, materials and drugs used in Brazil, published Technical Note no. 04/2020<sup>45</sup>. This note contains guidelines for Brazilian health services regarding preventive and control measures to be adopted when providing care for suspected and confirmed cases of infection by the new coronavirus (SARS-CoV-2), including on the extended use of the N95 mask: "The use, handling and storage must follow the manufacturer's recommendations and it must never be shared among workers" (p. 30)<sup>45</sup>.

However, there are constant complaints from workers about the shortage of PPE<sup>20,35</sup> in health care facilities in general, due to the greater demand and poor supply available for health services, as noted below:

Many still complain about the lack of working equipment, the shortage of PPE and supplies is a global problem everywhere $^{30}$ .

In view of this situation experienced in Brazilian health institutions due to the COVID-19 national public health emergency, Anvisa updated the Technical Note no. 04/2020 on May 8, 2020, extending some PPE lifetime, such as N95 masks or equivalent. These face masks could then be used for a longer period than provided by the manufacturer. However, this could not be used as a strategy by health services to justify the faulty distribution of PPE to workers. The Hospital Infection Control Committees (CCIH) must take charge of regulating health services together with the technical staff of each health care facility<sup>45</sup>.

There are some professional councils, such as Cofen and the Regional Nursing Council (Coren), which, due to constant complaints (over 8 thousand) from their members, intensified their inspection efforts (more than 7 thousand inspections). In one of the news stories, a Coren representative reported: "We come across facilities that are not providing adequate face masks, that are reusing waterproof aprons, and we also noted the distribution of raincoats to workers instead of waterproof aprons, which is not appropriate either."<sup>24</sup> Thus, due to the complaints received since

the beginning of the pandemic, Cofen has purchased 86 thousand face masks that are being distributed by Coren according to the needs of each Brazilian state, mainly to public institutions<sup>46</sup>.

Another aspect reported by health workers that increases COVID-19 contagion relates to removing PPE:

When it comes to removing the equipment, people are careless and become contaminated. So right now we are gathering staff from all facilities for a huge training session on how to put on and remove the equipment, so that it can be done safely<sup>31</sup>.

As for the curtailment of hospital medical products, besides PPE, shortage of supplies such as paper towels and alcohol was also reported. As a result, Coren intervened to force state and municipal administrations to make decisions that would preserve the workers' health. It was mentioned that Coren filed a lawsuit to ensure PPE for workers on the front line against COVID-19 in one of the Brazilian states, after receiving complaints that workers were not being provided with equipment in that state health centers<sup>32</sup>.

According to Anvisa, prevention and control measures, including the correct use of PPE, must be adopted in care provided to suspected or confirmed cases of infection by the new coronavirus (SARS-CoV-2)<sup>45</sup>. Therefore, we enquired how health systems were handling the distribution, maintenance and use of PPE to ensure the safety of staff working on care against COVID-19.

#### Health workers with comorbidities on the front line

According to the analyzed news stories, health workers with comorbidities were on the front line.

The severity of COVID-19 has been linked to diabetes, heart conditions, respiratory and immunosuppression problems<sup>47</sup>. Some issues and complaints were highlighted by the media, and also by workers who had one or more of these diseases and continued their care activities, despite the greater risk of becoming seriously ill by the coronavirus.

We noted the risks to which the workers are subject during the pandemic. The feeling that they were risking their lives to care for "others" was observed among the 572 complaints from health workers (doctors and nurses) sent to the Public Prosecutor's Office of Rio de Janeiro: 48% of them were related to the obligation to continue working despite having symptoms of COVID-19<sup>20</sup>.

There was also the case of a pregnant health worker (although it is not considered a comorbidity) who was afraid of catching the virus and passing it on to the baby, but even so was unable to obtain leave or reallocation. Although there is no scientific evidence of vertical transmission, from the mother to the fetus or newborn, pregnant women's mental, emotional and physical health must be taken into consideration due to their altered body condition<sup>48</sup>.

Anxiety, fear, stress and worry are experienced by exposed workers who were not granted leave, as they are aware not only of the risks they run – and of infecting family members, especially children and elderly parents – but also of the risks to which their colleagues are exposed, especially those suffering from comorbidities and older adults. As one nurse stated: "People leave their shifts and cry in the car, some of them can't even make it home. It's really sad." <sup>25</sup>

Besides poor working conditions, some workers also mention living in fear that they and their colleagues might fall ill, as well as coping with the large number of deaths they witness working on the front line:

I am very concerned because, like my colleague, I am in a risk group, but I cannot stop working. And I'm not receiving any care, right? The only people being put on leave are those over 60. But those with a comorbidity, pregnant women, none of them are being given leave. Today we are numbers, our registration numbers are being replaced by headstone numbers<sup>29</sup>.

Therefore, workers on the front line with a history of other illnesses experience feelings of fear and concern in face of a disease that is considered relatively new and, that at the same time can causes health workers' illness and death. Such a context favors solidarity among health workers, as their professional responsibility to fight COVID-19 gives them a sense of community, and they also share their experiences on the limits of their bodies and feelings at work.

#### Illness and death due to work

Poor working conditions result in complications in workers' health. This statement is corroborated by the news stories found in our research, which report a high number of health workers falling ill and dying of COVID-19.

Therefore, we agree with Maeno and Carmo<sup>49</sup> who analyze COVID-19 as an occupational disease, regardless of whether the occupation relates to

essential services, as it can be transmitted in daily commuting on public transport and in contact with people at the workplace. To summarize: "COVID-19 in workers is presumably related to work" (p. 3), and health workers in particular must be duly protected to prevent the disease<sup>49</sup>. It is also essential to report all suspected or confirmed cases of the disease<sup>49</sup>.

Many news stories addressed the experiences of health workers with illness and death. One of the findings concerns the need for health labor management authorities to ensure workers' safety and health, not least to ensure continued care<sup>36</sup>. Some statements reveal the workers' concern that illness among health staff may decrease the number of people providing care, as shown in the following excerpt:

Health workers are on the front line and need all the support from health facilities to care well for patients and not be contaminated. The more doctors are infected, the fewer professionals we will have to face this battle<sup>36</sup>.

Many reports by workers and different trade union representatives stressed the number of workers on leave. In some Brazilian regions they accounted for half of the cases in cities and towns. We emphasize that the health care sector has been experiencing precarious working conditions, with limited hiring of staff and restricted material resources<sup>8,49</sup>, causing difficulties to those who are on the front line against COVID-19<sup>49</sup>.

Concern with their own contamination, their co-workers' and workplace was also found in the news stories investigated by this study, increasing the tension, stress and stigma of being health workers and possible "transmitters of the virus," which was also reported in another study<sup>50</sup>.

Deaths among workers were also highlighted:

A lot of people are dying, a lot of nursing staff, a lot of young people, regardless of their age. People who gave their lives to care for others are now dying, every day. The situation gets worse and worse<sup>34</sup>.

Although it is important to identify the occurrence of COVID-19 cases among nursing staff to support the organization and development of measures to prevent and control the spread of the virus, a Coren representative confirms in a news story that there is underreporting<sup>26</sup>.

Inadequate resting areas were also reported by health workers. In one state field hospital there was nowhere for nurses to rest other than on the wet floor: "You're sleepy, right? And you don't even have the right to rest, it's all wet, right? My God!"<sup>24</sup>

Therefore, as observed by Thébaud-Mony<sup>8</sup>, we emphasize that working conditions can both help preserve the health and cause and intensify the workers' illness.

### Access to treatment and work leave due to COVID-19

According to the news media, several workers in health centers were placed on leave with suspected COVID-19 infection, and even so they encountered difficulties to be tested and/or receive treatment, as shown in the statement below:

This is a very worrying fact. There is a huge number of professionals with suspected coronavirus infection and fewer than 30% of them are being tested for COVID-19. In just one month the regional medicine and nursing councils of one state received more than 360 complaints from health professionals<sup>21</sup>.

In April 2020, the Brazilian Ministry of Health (MS) issued a document on the distribution and availability of COVID-19 rapid tests in states and municipalities, as well as on criteria regarding their use, with priority to health care and public safety workers and people in at-risk groups<sup>51</sup>.

To ensure the equitable distribution of tests to states and municipalities, an estimate was made of the number of health workers in the health care system as a whole, based on data available from the Unified Health System Information Department (Datasus)<sup>51</sup>.

Although the MS<sup>51</sup> document explains the measures to provide health workers with COVID-19 testing, many news stories reported difficulties in having access to tests:

A big problem here is that we haven't been tested yet. Testing of patients and especially of those on the front line, caring for hospital patients, is not happening fast enough $^{30}$ .

When a health worker tests positive for COVID-19, he or she must stay home for 14 days after the onset of symptoms; the same procedure occurs in case of a positive result for someone in the worker's household<sup>51</sup>. However, without testing, only the presence of symptoms can indicate another possible illness, which may lead to workers staying away for fewer days.

Again, they did not test for coronavirus, but the doctor prescribed Tamiflu (an antiviral indicated for severe cases of H1N1) and told her to stay home for seven days. I found it odd, because even without test results, with this pandemic it should be 15 [days]<sup>37</sup>.

Other news stories mentioned workers with symptoms being put on leave, but without testing<sup>32,33</sup>. In addition to difficult access to COVID-19 testing, some news stories mentioned limited access of infected health workers to treatment, even at the very health facility where they work. "She didn't resist infection. She died in a hospital in the south of the state, because she was unable to get a hospital bed in the capital."<sup>34</sup>

Another MS document features "recommendations regarding the organization and structuring of work in health care services to protect health professionals and preserve the workforce" (p. 37)<sup>52</sup>. However, there is no mention about ensuring access to treatment in case of infection. According to a health care professional relative: "We searched for the medication for five days. There was none in the public health system or in drugstores. After a lot of searching, we managed to get a packet for R\$ 320."<sup>37</sup>

# Resigning from work and professional updating for COVID-19

In view of the poor working conditions, resigning from the job was one of the experiences reported by health workers. After only four shifts, a nursing technician revealed that she quitted due to the precarious working conditions. She mentions cases of at least five other professionals who made the same decision, emphasizing the high number of people being cared for by few staff<sup>39</sup>. In another news story in a hospital, it was reported that, following the death of two nurses, many workers were quitting their jobs for fear of contagion<sup>19</sup>.

Quitting the job is not a new issue, since, according to Codo and Vasques-Menezes<sup>53</sup>, burnout is associated with care activities, especially among workers in the fields of education and health, and relates to emotional exhaustion (depletion of energy and breakdown of affective and emotional bonds); depersonalization (blunting of affective relationships, negative feelings and expressions); and absence of emotional involvement in work activities<sup>53</sup>.

International studies show an increase in work demands in the treatment of COVID-19 cases, which can lead to physical and mental exhaustion<sup>54</sup>. This has an impact on the health of workers, who feel overwhelmed, especially when witnessing their co-workers' death, which generates fear and concern<sup>54</sup>.

If there is an increase in the demand of COVID-19 care, there is also a need for training and/or updating of professional knowledge in both health care services (care procedures, request for tests, control of virus spread) and self-care, as in the use of personal and collective protection equipment to prevent the disease. Some health facilities are offering on-site training, trying to identify when contamination happens and seeking to reduce it, as well as updating workers on matters pertaining to COVID-19<sup>22,26</sup>. Other news stories show the implications of not knowing how to deal with PPE: "We were not given adequate training and were incorrectly removing the PPE"<sup>27</sup>.

Another aspect examined was the allocation of workers from other health care areas to direct care for patients with coronavirus, the hiring of medical residents<sup>40</sup>. We also found reports of cases of intensive care training taking place directly through work, as the disease spreads. However, this urgent need for hiring staff causes certain situations: "The problem is the staff being hired for the pandemic, without much training, without PPE... These people are terrified."<sup>25</sup>

It should be considered that, if on the one hand there is the possibility of procuring funds to provide hospitals with the necessary medical supplies, on the other it is important to highlight that health workers are not machines and, therefore, need time for their training, above all on how to provide health care and look out for their own professional safety in the face of COVID-19, which must be a priority and ensured with the provision and guaranteed use of PPE<sup>55</sup>.

#### Conclusions

Health care is an essential activity for the production of health and well-being in a society as a whole. Specific professional knowledge and from different fields, when combined, is capable of providing health prevention, promotion and cure. However, health work is not dissociated from the contradictions of capitalist society, which, in certain

sectors, exploits workers, putting their lives at risk. Therefore, what the pandemic situation has shown is the paramount need for care and protection of those who are in charge of health promotion.

The results presented here, based on news stories published in April 2020, at the beginning of the pandemic in Brazil, present situations in which the deficient provision of PPE was reported by workers in the news media. They evidence the tensions between health labor management and the working class, especially when many workers claimed that personal protective equipment was lacking, inadequate or insufficient. On the one hand, health management is ensuring protection for society, on the other, health workers are experiencing poor working conditions. Therefore, what needs to be ensured is the health of these workers. It is unacceptable that there are deaths related to professional activity!

Regarding the use of news stories to grasp the reality experienced by health workers, we ascertained that, at the beginning of the pandemic in Brazil, they emphatically reported health workers' illness and death, as well as their precarious working conditions. Some of them also revealed the possibility of mental health care for workers, such as initiatives by trade organizations and even hospital labor management, when offering health workers psychological and/or psychiatric counseling.

We realized during this study that the news stories addressed mainly the public health work. Therefore, is it also important in our view that media stress the fact that the Brazilian Unified Health System is public and universal, and that, therefore, it is up to all sectors, including the news media, to demand improvements in working conditions and investment in public health.

At a time when the COVID-19 pandemic evidenced the need to afford visibility to these professionals, who care for the population's health, it is an ethical, moral and political duty of society, the State and health institutions to provide these workers with health care, in addition to their social recognition, not merely by clapping hands, but by implementing public policies that provide better working conditions and that are continued even after the coronavirus pandemic.

#### **Authors' contributions**

Vedovato TG, Santos DL, Bitencourt SM contributed to the study design, data analysis, writing, text review and approval of the final version. Andrade CB contributed to the study design, data collection and analysis, writing, text review and approval of its final version. Almeida LP and Sampaio JFS contributed to data analysis, writing, text review and approval of the final version. All authors assume full responsibility for the study and the content herein published.

#### References

- Organização Pan-Americana de Saúde. Folha informativa COVID-19 – Escritório da OPAS e da OMS no Brasil [Internet]. 2020 [cited 2020 May 3]. Available from: https://www.paho.org/bra/index. php?option=com\_content&view=article&id=6101: covid19&Itemid=875.
- Conselho Federal de Enfermagem (BR).
   Observatório da Enfermagem [Internet]. 2020.
   [cited 2020 Aug. 10]. Available from: http://
   observatoriodaenfermagem.cofen.gov.br/.
- 3. Catton H. Global challenges in health and health care for nurses and midwives everywhere. Int Nurs Rev. 2020;67(1):4-6.
- Theorell T. COVID-19 and Working Conditions in Health Care. Psychother Psychosom. 2020;89(4):193-4.
- Wang J, Okoli CTC, He H, Feng F, Li J, Zhuang L, et al. Factors associated with compassion satisfaction, burnout, and secondary traumatic stress among Chinese nurses in tertiary hospitals: A cross-sectional study. Int J Nurs Stud. 2020;102:103472.
- Leão RF, Oliveira DA, Aparecida N. Entrevista La salud del profesional y las condiciones de trabajo. Retratos da Escola. 2012;6(11):301-13.
- Damascena DM, Vale PRLF. Typologies of precarious work in primary healthcare: a netnographic study. Trab Educ Saude [Internet]. 2020 [cited 2020 Aug. 8];18(3):e00273104. Available from: http://www.scielo.br/scielo. php?script=sci\_abstract&pid=S1981-77462020000300503&lng=en&nrm=iso&tlng=pt.
- 8. Thébaud-Mony A. Saúde no Trabalho. In: Hirata H, Laborie F, Senotier D, organizadores. Dicionário crítico do feminismo. São Paulo: Editora Unesp; 2009. p. 217-21.
- Sacramento I, Lerner K. Pandemia e biografia no jornalismo: uma análise dos relatos pessoais da experiência com a Influenza H1N1 em O Dia. Rev Famecos (Online). 2015;22(4):55-70.
- Bardin L. Análise de conteúdo. 3a. São Paulo: Edições 70; 2016.
- Minayo MCS. O desafio do conhecimento. 12a ed. São Paulo: Hucitec; Rio de Janeiro: Abrasco; 2010. 269 p. (Saúde em debate).

- 12. Amorim F. Brasil confirma transmissão comunitária de coronavírus; entenda o que é. Uol Notícias [Internet]. 13 mar 2020 [cited 2020 Nov. 2]. Available from: https://noticias.uol.com.br/saude/ultimas-noticias/redacao/2020/03/13/brasil-confirma-transmissao-comunitaria-de-coronavirus-entenda-o-que-e.htm.
- 13. Supremo Tribunal Federal (BR). Arguição de Descumprimento de Preceito Fundamental 672 [Internet]. 2020 [cited 2020 Oct. 25]. Available from: http://www.stf.jus.br/arquivo/cms/ noticiaNoticiaStf/anexo/ADPF672liminar.pdf
- 14. Fundação Oswaldo Cruz. Observatório COVID-19: Informação para Ação [Internet]. 2020 [cited 2020 Oct. 25]. Available from: https://portal.fiocruz.br/observatorio-covid-19.
- Benites A, Jucá B, Borges R. Mandetta é demitido por Bolsonaro. El País [Internet]. 16 2020 [cited 2020 Nov. 2]. Available from: https://brasil.elpais. com/sociedade/2020-04-16/mandetta-e-demitidopor-bolsonaro.html.
- 16. Junqueira C, Machida K. Após 29 dias no cargo, Nelson Teich pede demissão do Ministério da Saúde. CNN Brasil [Internet]. 15 maio 2020 [cited 2020 Nov. 02]. Available from: https://www. cnnbrasil.com.br/politica/2020/05/15/nelson-teichpede-demissao-do-ministerio-da-saude.
- 17. Agência Brasil. Eduardo Pazuello toma posse como ministro da Saúde. Agência Brasil [Internet]. 16 set 2020 [cited 2020 Nov. 02]. Available from: https:// agenciabrasil.ebc.com.br/saude/noticia/2020-09/aovivo-eduardo-pazuello-toma-posse-como-ministroda-saude.
- 18. Brasil. Ministério da Saúde. COVID-19 Boletim Epidemiológico Diário, Brasília, 30 de abril de 2020 [Internet]. 2020 [cited 2020 Oct. 24]. Available from: https://portalarquivos.saude.gov.br/ images/pdf/2020/April/30/2020-04-30-COVID-19-COLETIVA.pdf.
- 19. Tv Bahia. Morte de técnicos do hospital da Osid por Covid-19 gera apreensão entre profissionais: "Funcionário está pedindo demissão". G1 Bahia [Internet]. 30 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/ba/bahia/noticia/2020/04/30/morte-de-tecnicos-do-hospital-da-osid-por-covid-19-gera-apreensao-

- entre-profissionais-funcionario-esta-ped in dodemissa o.ghtml.
- 20. Pimentel T. Quase 50% dos profissionais de saúde ouvidos pelo MPT em MG denunciam que trabalhadores com sintomas de COVID-19 não são dispensados. G1 Minas Gerais [Internet]. 30 abr 2020 [cited 2020 Dec. 14]. Available from: https:// g1.globo.com/mg/minas-gerais/noticia/2020/04/30/ quase-50percent-dos-profissionais-de-saudeouvidos-pelo-mpt-em-mg-denunciam-quetrabalhadores-com-sintomas-de-covid-19-nao-saodispensados.ghtml.
- 21. Rouvenat F. Mais de 2,2 mil profissionais de saúde do RJ foram afastados com suspeita de COVID-19 ou por serem parte de grupos de risco. G1 Rio de Janeiro [Internet]. 30 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/rj/rio-dejaneiro/noticia/2020/04/30/profissionais-de-saudedo-rj-foram-afastados-por-suspeita-de-covid-19-oupor-fazerem-parte-de-grupos-de-risco.ghtml.
- 22. G1 Piauí. Profissionais da enfermagem fazem protesto denunciando falta de EPI para atendimento de pacientes com COVID-19 [Internet]. 25 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/pi/piaui/noticia/2020/04/25/profissionais-da-enfermagem-fazem-protesto-denunciando-falta-de-epis-para-atendimento-de-pacientes-com-covid-19.ghtml.
- 23. G1 Maranhão. Mais de 250 profissionais da saúde testaram positivo para COVID-19 no Maranhão [Internet]. 25 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/ ma/maranhao/noticia/2020/04/25/mais-de-250profissionais-da-saude-testaram-positivo-paracovid-19-no-maranhao.ghtml.
- 24. Profissionais de saúde lidam com medo e pressão no combate ao coronavírus. G1 Fantástico [Internet]. 26 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/fantastico/ noticia/2020/04/26/profissionais-de-saude-lidamcom-medo-e-pressao-no-combate-ao-coronavirus. ghtml.
- 25. Teixeira P. A cada 11 minutos, um profissional de enfermagem que trabalha no tratamento contra a COVID-19 busca atendimento psicológico. G1 Rio de Janeiro [Internet]. 24 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/ rj/rio-de-janeiro/noticia/2020/04/24/a-cada-11minutos-um-profissional-de-enfermagem-quetrabalha-no-tratamento-contra-a-covid-19-buscaatendimento-psicologico.ghtml.
- 26. Bischoff W. Paraná tem 63 funcionários de hospitais geridos pelo estado afastados por causa da COVID-19. G1 Paraná [Internet]. 24 abr 2020 [cited 2020 Dec. 14]. Available from: https:// g1.globo.com/pr/parana/noticia/2020/04/24/parana-

- tem-63-funcionarios-de-hospitais-geridos-peloestado-afastados-por-causa-da-covid-19.ghtml.
- 27. Arpini N. Em dois dias, número de profissionais da saúde com COVID-19 sobe 66% no ES. G1 Espírito Santo [Internet]. 22 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/es/espiritosanto/noticia/2020/04/22/em-dois-dias-numerode-profissionais-da-saude-com-covid-19-sobe-66percent-no-es.ghtml.
- 28. Rouvenat F, Queiroz M. Profissionais do Hospital Miguel Couto que fazem parte de grupos de risco da COVID-19 dizem que não foram afastados. G1 Rio de Janeiro [Internet]. 23 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/rj/ rio-de-janeiro/noticia/2020/04/23/profissionaisdo-hospital-miguel-couto-que-fazem-parte-degrupos-de-risco-da-covid-19-dizem-que-nao-foramafastados.ghtml.
- 29. Globonews. Coronavírus: enfermeiros do Rio alegam falta de amparo e equipamentos em UTIs [Internet]. Rio de Janeiro; 23 abr 2020 [cited 2020 Dec. 14]. Vídeo: 8 min. Available from: https://g1.globo.com/globonews/globonews-emponto/video/coronavirus-enfermeiros-do-rio-alegam-falta-de-amparo-e-equipamentos-emutis-8503345.ghtml.
- 30. Bom dia Espírito Santo. Presidente da Associação Médica fala sobre contaminação de profissionais por COVID-19 [Internet]. Vitória; 23 abr 2020 [cited 2020 Dec. 14]. Vídeo: 4 min. Available from: https://globoplay.globo.com/v/8503276/.
- 31. G1 Paraíba. Número de profissionais de saúde com COVID-19 na Paraíba sobe 66% em uma semana [Internet]. 22 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/pb/paraiba/noticia/2020/04/22/numero-de-profissionais-de-saude-com-covid-19-na-paraiba-sobe-66percent-em-uma-semana.ghtml.
- 32. G1 Amapá. Enfermeira de 58 anos é a primeira profissional de saúde vítima da COVID-19 no Amapá [Internet]. 22 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/ap/amapa/noticia/2020/04/22/enfermeira-de-57-anos-e-a-1a-profissional-da-saude-a-morrer-de-covid-19-no-amapa.ghtml.
- 33. G1 Espírito Santo. ES registra 101 novos casos e chega a 1.313 infectados por COVID-19; 206 são profissionais da saúde [Internet]. 21 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/es/espirito-santo/noticia/2020/04/21/es-registra-101-novos-casos-e-chega-a-1313-infectados-por-covid-19-206-sao-profissionais-da-saude.ghtml.
- 34. Freire F, Grael F. RJ tem 6 mortes e mais de 1,8 mil profissionais da saúde afastados pela COVID-19: 'Levou um pedaço nosso', diz filha de vítima. G1 Rio de Janeiro [Internet]. 21 abr 2020 [cited 2020]

Rev Bras Saude Ocup 2021;46:e1

- Dec. 14]. Available from: https://g1.globo.com/rj/rio-de-janeiro/noticia/2020/04/21/rj-tem-ao-menos-4-mortes-e-mais-de-18-mil-profissionais-da-saude-afastados-pela-covid-19-levou-um-pedaco-nosso-diz-filha-de-vitima.ghtml.
- 35. Globonews, G1 São Paulo. 12 profissionais de saúde de São Paulo já morreram com COVID-19, diz secretário municipal. G1 São Paulo [Internet]. 21 abr 2020 [cited 2020 Dec. 14]. Available from: https://g1.globo.com/sp/sao-paulo/ noticia/2020/04/21/12-profissionais-de-saude-desp-ja-morreram-com-covid-19-diz-secretario.ghtml.
- 36. Bom Dia Brasil. Mais de 4 mil profissionais de enfermagem foram contaminados pela COVID-19 [Internet]. Rio de Janeiro; 20 abr 2020 [cited 2020 Dec. 14]. Vídeo: 3 min. Available from: https:// globoplay.globo.com/v/8494354/.
- 37. Souto L. Aos 68, faxineira de hospital tem direito, mas não consegue teste para Covid. Uol Universa [Internet]. 29 abr 2020 [cited 2020 Dec. 14]. Available from: https://www.uol.com.br/universa/noticias/redacao/2020/04/29/faxineira-em-hospital-teste-para-covid.htm.
- 38. Ribeiro F. No Pará, 42% dos casos confirmados de coronavírus são da área da saúde. Uol [Internet]. 29 abr 2020 [cited 2020 Dec. 14]. Available from: https://noticias.uol.com.br/ ultimas-noticias/agencia-estado/2020/04/29/nopara-42-dos-casos-confirmados-de-covid-19-saoda-area-da-saude.htm.
- 39. Barreto H Filho. Técnica pede demissão de hospital no RJ: 'Nunca vivenciei nada parecido'. Uol [Internet]. 29 abr 2020 [cited 2020 Dec. 14]. Available from: https://noticias.uol.com.br/saude/ ultimas-noticias/redacao/2020/04/29/vi-muitasmortes-tecnica-de-enfermagem-pede-demissao-dehospital-no-rj.htm.
- 40. Resk F. PE registra fila por UTI; profissional já tem de optar por quem levar, diz secretário. Uol [Internet]. 29 abr 2020 [cited 2020 Dec. 14]. Available from: https://noticias.uol.com.br/ultimasnoticias/agencia-estado/2020/04/29/pe-registra-filapor-uti-profissional-ja-tem-de-optar-quem-levardiz-secretario.htm.
- 41. World Health Organization. Health workers exposure risk assessment and management in the context of COVID-19 virus [Internet]. 2020 [cited 2020 May 24]. Available from: https://apps.who.int/iris/bitstream/handle/10665/331340/WHO-2019-nCov-HCW\_risk\_assessment-2020.1-eng.pdf?sequence=1&isAllowed=y.
- 42. Occupational Safety and Health Administration (USA). Healthcare Workers and Employers [Internet]. 2020 [cited 2020 May 25]. Available from: https://www.osha.gov/SLTC/covid-19/healthcare-workers.html.
- 43. 43. Brasil. Ministério do Trabalho. Norma Regulamentadora 6 [Internet]. 1978 [cited 2020 Aug.

- 01]. Available from: https://enit.trabalho.gov.br/portal/images/Arquivos SST/SST NR/NR-06.pdf.
- 44. Organização Pan-Americana de Saúde.
  Orientações sobre o uso de máscaras no
  contexto da COVID-19 [Internet]. 2020. [cited
  2020 Aug. 08]. Available from: https://iris.
  paho.org/bitstream/handle/10665.2/52254/
  OPASWBRACOVID-1920071\_por.
  pdf?sequence=1&isAllowed=v.
- 45. Agência Nacional de Vigilância Sanitária (BR). Nota Técnica GVIMS/GGTES/ANVISA Nº 04/2020 [Internet]. 2020 [cited 2020 Aug. 07]. Available from: https://www20.anvisa.gov.br/ segurancadopaciente/index.php/alertas/item/ covid-19.
- 46. Conselho Federal de Enfermagem (BR). Mais 86 mil máscaras compradas pelo Cofen serão entregues aos profissionais [Internet]. 2020 [cited 2020 Aug. 07]. Available from: http://www.cofen.gov.br/mais-86-mil-mascaras-compradas-pelo-cofen-serao-entregues-aos-profissionais 80318.html.
- 47. Brasil. Ministério da Saúde. Secretaria de Vigilância em Saúde. Recomendações de proteção aos trabalhadores dos serviços de saúde no atendimento de COVID-19 e outras síndromes gripais [Internet]. 2020 [cited 2020 Aug. 11]. Available from: https://portalarquivos.saude.gov. br/images/pdf/2020/April/16/01-recomendacoes-deprotecao.pdf.
- 48. Brasil. Ministério da Mulher, da Família e dos Direitos Humanos. Ministério divulga orientações sobre coronavírus a gestantes e lactantes [Internet]. Notícias; 2020 [cited 2020 Jun. 29]. Available from: https://www.gov.br/mdh/pt-br/ assuntos/noticias/2020-2/abril/ministerio-divulgaorientacoes-sobre-coronavirus-a-gestantes-elactantes.
- 49. Maeno M, Carmo JC. A COVID-19 é uma doença relacionada ao trabalho [Internet]. 2020 [cited May 17]. Available from: http://observatoriodamedicina. ensp.fiocruz.br/a-covid-19-e-uma-doencarelacionada-ao-trabalho-por-maria-maeno-e-josecarlos-do-carmo/.
- 50. Lotta G, Fernandez M, Corrêa MG, Magri G, Mello CAC, Beck AL. Nota Técnica: A pandemia de COVID-19 e os profissionais de Saúde Pública no Brasil 2a. fase [Internet]. São Paulo: FGV; NEB; 2020 [cited 2020 Dec. 11]. Available from: https://abori.com.br/wp-content/uploads/2020/07/rel05-saude-covid-19-fase2-v4.pdf.
- 51. Brasil. Ministério da Saúde. Secretaria de Atenção Primária à Saúde. Departamento de Saúde da Família. Nota Técnica Nº 11/2020-DESF/SAPS/MS [Internet]. 2020 [cited 2020 Aug. 05]. Available from: http://www.saude.ba.gov.br/wp-content/uploads/2020/04/Nota\_Tecnica\_\_Informativa\_Disponibilizacao de Testes.pdf.
- 52. Brasil. Ministério da Saúde. Orientações para manejo de pacientes com COVID-19 [Internet].

- 2020 [cited 2020 Aug. 11]. Available from: https://portalarquivos.saude.gov.br/images/pdf/2020/June/18/Covid19-Orientac--o--esManejoPacientes.pdf
- 53. Codo W, Vasques-Menezes I. O que é burnout? In: Codo W, organizador. Educação: carinho e trabalho. Brasília: UNB, CNTE; Petrópolis: Vozes; 1999. p. 237-54.
- 54. Ripp J, Peccoralo L, Charney D. Attending to the Emotional Well-Being of the Health Care Workforce in a New York City Health System During the COVID-19 Pandemic. Acad Med. 2020;95(8):1136-9.
- 55. The Lancet. COVID-19: protecting health-care workers. Lancet. 2020;395(10228):922.

Rev Bras Saude Ocup 2021;46:e1