

Remote teaching: Perception of nursing students about their training process

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https://doi.org/10.56238/globalhealthprespesc-072

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ABSTRACT

This article seeks to unveil the perceptions of nursing students regarding the suspension of classroom activities and the insertion of emergency remote learning during the COVID-19 pandemic. This is a qualitative study, carried out with nursing students who experienced remote teaching in their training process; the interviews were collected from March to August 2022. Data analysis was performed using the Collective Subject Discourse methodology. As a result, seven third year undergraduate nursing students from a university in the south of the country participated in the study, all female, aged 21 to 24 years, from the analysis of the collective subject discourse were divided into two categories, between potentialities and weaknesses pointed out in the DCS. The potentialities and weaknesses of the insertion of remote emergency teaching in the perception of the students were raised from this research.

Keywords: COVID-19, remote teaching, nursing.

1 INTRODUCTION

In 2020, the World Health Organization (WHO) decreed a pandemic caused by the *Severe Acute Respiratory Syndrome Coronavirus* 2 – SARS-COV-2 virus (PAN AMERICAN HEALTH ORGANIZATION, 2020), in view of this situation, it was recommended by health authorities the use of personal protective equipment and social distancing, as a way to minimize viral transmission, modifying the face-to-face work routines, education, transportation and health services (CRODA; GARCIA, 2020).

In teaching services, through Ordinance No. 343 of March 17, 2020, there was the replacement of face-to-face classes for *online teaching, as* well as the reorganization of the academic calendar and the possibility of non-face-to-face activities for the purpose of fulfilling the workload (MINISTRY OF EDUCATION, 2020).



The suspension of face-to-face teaching activities generated the obligation for teachers and students to migrate to the *online reality*, transferring and transposing methodologies and pedagogical practices typical of the face-to-face mode of learning to emergency remote teaching (MOREIRA; HENRIQUES; BARROS, 2020).

Emergency remote learning was the only option for educators to continue their students' academic training during the pandemic. In view of this, remote learning was composed of essential elements, such as the pedagogical proposal to be used, the media platforms, or technology, in addition to the preparation of the faculty, as well as the motivation, expectations and involvement of the students. It is known that these elements suffer difficulties throughout the process of remote teaching (MAGALHÃES, 2021).

In the context of nursing, educators transferred fundamental disciplines to remote teaching, but practical activities needed a face-to-face approach, which generated concern for nursing students for not being able to complete their undergraduate degree and achieve their learning objectives (BASTOS, 2020).

In this critical period of global public health, the Ministry of Education (MEC) authorized students of health courses to graduate earlier than foreseen in the academic calendar, in view of the emergence of human resources to act on the front line in the fight against the COVID-19 pandemic, so there was no possibility of delaying the training of nursing students until face-to-face teaching was reestablished (BRAZIL, 2020).

Because nursing is a profession of care practice, extremely important for the health team that works on the front line in the fight against the COVID-19 pandemic, being the largest category in quantity in health services. This challenged the possibilities of distance education, as well as the need for urgent training of new professionals, given the global shortage of nurses in the labor market due to the absences and dismissals linked to risk groups and professionals who decided to prevent themselves amid the uncertainties about the virus (WORLD HEALTH ORGANIZATION, 2020; SILVA, ORIYAM, CLARO, BORGHI, CASTRO, SALVADOR, 2021).

Based on the above, the problem addressed in the research was: What are the perceptions of nursing students about emergency remote teaching during the COVID-19 pandemic for their training process?

To respond to this problem, the objective of the study was to unveil the perceptions of nursing students about the insertion of emergency remote teaching in their health education process.

2 METHODOLOGIES

This is an exploratory study, with a qualitative approach, conducted with students of the 3rd year of undergraduate nursing at a State University in the South of the country.



25 students from the referred year were invited to participate in the study, of which seven students agreed to participate in the research. As for the inclusion criteria, we considered students in the aforementioned grade, who experienced face-to-face teaching before the pandemic and emergency remote teaching during the pandemic.

Regarding the exclusion criteria, students who were on vacation or certified at the time of data collection were also those who experienced only a face-to-face or remote teaching format.

Data collection took place in the months of March to August 2022 at a place and date previously agreed, following the current sanitary requirements of the university due to the pandemic period The collection began through the questionnaire of characterization of the students as the following variables age, income and forms of access to the internet, followed by semi-structured interviews with the following guiding question:

• What was your perception of remote learning in your training process during the pandemic?

And the ancillary issues:

- What facilities have you found during remote learning in your training process?
- What difficulties have you encountered during remote learning in your training process?

The interviews were audio-recorded via smartphone and lasted approximately 15 minutes. Then they were transcribed in full by the researchers and to ensure the anonymity of the participants, the names were replaced by the letter DE (Nursing Students), according to the order of accomplishment, DE1, DE2, so on.

Data analysis occurred through the methodological framework Discourse of the Collective Subject (CSD), which consists of a process of grouping discourses into discourses-syntheses through Key Expressions (KE), with fragments of speeches that have similar meanings translated into Central Ideas (CI) which are used to unite the fragments of the same meaning and transcribe as a single discourse (LEFEVRE; LEFEVRE, 2006).

In some cases, Anchors (AC) are used that express ideologies, generic beliefs, or theories. The final CSD represents the speech of all subjects. Aiming to reveal how people think, attribute meanings and manifest positions on a given subject (LEFEVRE; LEFEVRE, 2006).

In addition, the CSD, as a technique for the analysis of the data obtained, generates social representations with possibilities and dimensions in the understandings of the perceptions of the subjects participating in the study focused on the meanings, which allows to make the representations clearer, exemplified, detailed and justified (LEFEVRE; LEFEVRE, 2012, P. 1194).

The transcriptions of the speeches were analyzed in full in the first Discourse Analysis Instrument (IAD 1) in this data collection mechanism, it is necessary to identify the following



components of each discourse: Key Expressions (KE); Central Ideas (CIs) and the Discourses of the Collective Subject.

The development of this research complied with ethical standards and obeyed the provisions contained in Resolution No. 466/2012 of the National Health Council (BRASIL, 2013; BRASIL 2016), approved by the Research Ethics Committee (CEP) involving human beings with CAAE: 53932321.0.0000.5231.

All participants were invited to participate in the research voluntarily and, those who agreed, signed the Free and Informed Consent Form (ICF).

3 RESULTS AND DISCUSSION

Seven nursing students from the third year of graduation were interviewed, all of them female, single, without children and aged between 21 and 24 years.

Regarding the internet *connection* for remote teaching, five reported that they have access at home and two that do not. Regarding the type of connection, six reported that they connect via *Wi-fi*, one uses via cable and via cell phone. Regarding the quality of the *internet* to watch and perform the activities in the remote mode, on a *Likert scale* (0 very bad to 5 excellent) five students consider the connection good, one as great and one as bad. All students reported having an adequate environment for their studies at home, as well as having their own computer/*notebook*, five did not share this resource.

To present the results of this study, the ECH from the interviews were selected, the CIs were apprehended and the DCS were constructed, which were then discussed in: "Theme 01 - Facilities of the insertion of remote teaching" and "Theme 02 - Difficulties of the insertion of remote teaching".

The following discourses were constructed from the central ideas that relate to internet access, adaptations in the environment, routine, technologies, teaching methodology and singular perceptions. Thus, through the discourses, they reveal the perceptions of potentialities and difficulties of the study group, about the insertion of remote teaching in their nursing education process.

3.1 FACILITY FOR THE INSERTION OF REMOTE LEARNING

The COVID-19 pandemic has brought numerous changes in our daily lives, due to sanitary measures and social distancing. One of the sectors affected was higher education, related to the training of human resources, so that face-to-face pedagogical activities were suspended and national regulatory bodies indicated the continuity of the school period through remote activities.

The following discourse refers to the question about the perception of the insertion of remote teaching in the process of training third-year students, still representing how it was for the student the beginning, organization and execution of remote activities, in terms of difficulties and facilities.



3.1.1 Theme 1 - Perceptions of the facilities of the insertion of remote teaching

CI 1 - Perceptions of the facilities in the insertion of remote teaching.

DSC 1: At the beginning of the pandemic, I was very afraid, I didn't want to be around other people due to the virus (DE01), the insertion of remote learning was a solution found for the moment, and mainly because we needed to finish college. Thinking on this side, it was a good solution (DE02). The remote teaching was very practical, comfortable, by the fact of being at home, it ended up being comfortable, because when a class was over, I was already at home (DE03), you do not need to wake up so early to have to get around, take the bus, be at risk of contamination (DE02). I think it was great to make the tutorials online in small groups work very well, what often happened in the face-to-face tutorial was that it lasted an hour, there were people who spent more time on the bus than in class (DE05). Unlike the face-to-face, the online had the Google drive and class and had to review some classes, if it was recorded, post the activities and proximity to the teachers (DE01). Even with some specific content there were teachers who took some classes with dynamics in kahoot and other applications that helped in the interaction of the groups and made the classes lighter (DE03). We used WhatsApp, Classroom a lot and through the meet we made a call to study everyone together and ask questions (DE02).

In the discourse above, statements are found that emphasize the facilities experienced in this remote context, such as, for example, adaptation to a new teaching methodology; stimulation of autonomous and group learning online; and a sense of security in preventing the COVID-19 pandemic.

With regard to the use of technological resources, it is important to reflect critically on the reality of students, their previous knowledge and the relationship between technologies as a teaching tool and learning objectives. For, only incorporating technological resources does not transform educational processes, however, it substantially modifies the context in which these processes occur and the relationships between their actors and the tasks and content of learning, thus opening the way for an eventual profound transformation of these processes (BORTOLAI, 2023).

However, it is worth highlighting how much teachers reinvent themselves in the pandemic period, even without adequate preparation (BARRETO, 2020), there is a tireless search to offer the best to their students, a fact observed, for example, in the DSC of students, how much teachers sought digital tools for greater interaction in *online* classrooms and in the process of producing classes in this format, to improve the teaching-learning process.

As a potential of the *online learning modality* stand out the synchronous moments when using inverted classroom strategies, interspersing small learning activities and making available the recording of classes in the Classroom, *allows activities in small virtual groups, with clear objectives and support to the demands of the students; asynchronous moments, aligning the activities with the*



learning objectives; video lessons (recorded or in real time) that promote personal study, individual reflection, group discussion; use of social media, given its long reach, prioritizing the development of interpersonal relationships, to comment, offer *feedback* and the sense of belonging and sense of community; and *individual or group* online reflection (AVELINO AND MENDES, 2020).

It is noteworthy that technological tools are great allies in distance teaching-learning, however, it does not replace face-to-face activities (OLIVEIRA, et al, 2020).

The sense of safety among students who have been subjected to remote learning during the COVID-19 pandemic is notorious, as social isolation measures are aimed at preventing and slowing the spread of the virus. However, even feeling "safe", there are studies that report the consequence of social isolation on mental health among students who experienced remote learning during this period. Among them, the uncertainties about learning, anxiety, insecurity about the professional future, fear of the risks of contamination and infection for themselves and family members, loss of close people, among other psychological aspects that affect life in society (CAMPOS, et al, 2022).

3.2 WEAKNESSES ABOUT THE INSERTION OF REMOTE LEARNING

Theme 2 highlights the categories of anchoring of the fragilities and/or difficulties of the students in the insertion and adaptation in the period of social isolation for the development of undergraduate activities. It was identified by the students as weaknesses in learning in the remote context, the considerable increase in the day of classes, the difficulties of connection, the inequality in the quality of the connection, the adaptations in the domestic environment and the use of technological equipment to accompany the classes.

3.2.1 Theme 2 - Perception of the weaknesses of the insertion of remote teaching

CI 1 - Weaknesses of remote teaching.

DSC 2: In the beginning of online it was a little troubled, because it really was out of nowhere that they said it would be remote learning, and then basically from one day to the next it already started, so it was a somewhat difficult adaptation process (DE04). Thinking about nursing online was almost impossible (DE01), especially in the third year, a period with a lot of technique and practical classes (DE2). There are some points that cause insecurity (DE01), as in this process we had many contents in classes of many hours in a row with few intervals (DE03), there was a moment that I could not focus and absorb the content and follow the activities, I had difficulty because I am a distracted person, and after many theoretical classes had the practical part with the internships and it was very tiring, and when we went to the internship I no longer remembered the classes (DE06), such as, for example, the mechanical ventilation class with the ventilatory parameters that was online, and I do not remember anything, the class was very tiring, I reviewed in the internship field on the way back to the classroom



(DE04). The bad side was the internet connection that was sometimes unstable, sometimes it was not enough to support the applications, it had a fall, but came back with many periods of instability, and there were times that depended on the computer, the weather, even more that when it rained the internet was terrible. (DE07), at home we use the notebook more, but there is the computer with the cable, and it is all shared as everyone was at home had to take turns to follow the classes (DE04). And there were cases that the connection of the teachers was also bad, it happened to crash, fall and not come back, and it took time to start the class, which overloads some modules (DE02). There was the part of keeping the camera on and many teachers demanded it, and there were days when the connection was bad, or I didn't want to call, it was uncomfortable because I had the movement of the house, the routine of my family, the demands of the children and with everyone at home there was sound interference, and the privacy of the family (DE05).

It is observed from these discourses how the insertion of remote teaching in the students' view took place, relevant points in the sense of fragilities. In this process of adaptation to the recurrent fragilities were related to the connection to the *internet*, technological devices and domestic spaces to accompany the classes, and the new routine of the house with social isolation.

In relation to home studies, research shows the difficulty of family adaptation during the COVID-19 pandemic, in which many companies have adopted the home *office*, and schools the modality of remote or distance learning, being necessary that the family composition adapted, bringing offices and classrooms into the homes, dividing the spaces that would be of rest, for studies and work, facing the difficulty of connection and the availability of technological resources (GROSSI, et al, 2020).

Counterpoint to the moment before social isolation, there was the difficulty of technological resources reaching schools; in this pandemic context, students faced the challenge of not having enough resources to follow the virtual classes and carry out the activities online (AVELINO AND MENDES, 2020).

Among the academic regulations modified to mitigate the losses to the students in question, measures of agreements and evaluations were adopted during the period of suspension of face-to-face activities and the insertion of remote teaching.

The evaluation criteria were modified, allowing *individual* or small group online assessments, seminar presentations, participation and interaction in collective activities, which can be in the *chat* of the platform used to transmit the classes, and even the permanence of the camera on. Another evaluation strategy included the migration to online classrooms such as *Classroom*, which is a platform that allows the posting of files with activities, in which the teacher makes the post with the guidelines



and the deadline for posting, allowing interaction between the student, teacher and the collective, in addition to allowing file shares with greater extension (DOMINGUES, 2020).

It is worth mentioning that with the suspension of face-to-face activities, the professors of the nursing course organized themselves in order to reformulate the classes, evaluation methods, class schedule, and survey of the needs of the students such as access *to the internet*, and the equipment to follow the classes. In some cases, a *notebook and* internet payment *were provided* at home, as well as support and welcoming as a coping measure (RONDINI, et al, 2020).

4 CONCLUSIONS

It is understood that the experience of remote teaching went through the training and monitoring of teachers and students regarding the use of virtual tools, as well as the need to readjust teaching strategies, domestic and routine adaptations of the student, constant doubt in relation to a new disease, concern with the training of students, points that supported this research.

It is understood that emergency remote teaching was the best solution for the moment, despite the difficulties reported in the discourses, the students reveal the opportunity to return to the classroom and review the past contents, having the security to remain in isolation without total prejudice in the graduation.

However, it cannot be fully stated that the learning process in this period occurred without presenting gaps, requiring further research on this topic.



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