Impacts of Covid-19 in an Oncology Treatment Unit: Nurses' Perception from the Perspective of the Theory of Social Representations

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Impactos da Covid-19 em uma Unidade de Tratamento Oncológico: Percepção dos Enfermeiros na Perspectiva da Teoria das Representações Sociais

Impactos del Covid-19 en una Unidad de Tratamiento Oncológico: la Percepción de los Enfermeros desde la Perspectiva de la Teoría de las Representaciones Sociales

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ABSTRACT

Introduction: The new coronavirus SARS-CoV-2 the main cause of the COVID-19, was identified in December 2019 in Wuhan, China. Since then the virus has spread around the world and infected millions of people. Healthcare services have become overwhelmed with the care of patients affected by the infection. Nursing is the health professional who stays longer with the patients. Given these facts, it is essential to know the opinions, experiences, knowledge and perception of nurses while providing care to patients during the pandemic. **Objective:** Identify, from the perspective of nurses, the impacts of COVID-19 on their daily work in caring for individuals diagnosed with cancer. **Method:** Descriptive, qualitative approach study based on the theory of social representation. The study scenario was a reference federal public institution in cancer care with 25 nurses. Data were collected through a semi-structured interview technique and a sociodemographic questionnaire. Data analysis was performed using the thematic content analysis technique. **Results:** The participants were 22 female nurses (88%), with 8 and 30 years of experience in oncology. The analysis resulted in 4 core categories: concepts attributed by nurses to COVID-19; impacts of the pandemic on the daily lives of professionals, impacts of the pandemic on the institution and impacts of the pandemic on oncology patients. **Conclusion**: Even in a pandemic scenario, the nurses were essential to deal with COVID-19. Changes of the institution routine, the use of personal protective equipment (PPE), reduction of beds and absenteeism affected the lives of professionals and patients.

Key words: nursing, team; social perception; coronavirus infections; medical oncology; social representation.

RESUMO

Introdução: O novo coronavírus SARS-CoV-2, causa principal da covid-19, foi identificado em dezembro de 2019 em Wuhan, na China. Desde então, espalhou-se pelo mundo e infectou milhares de pessoas. Serviços de saúde ficaram sobrecarregados com o atendimento de pacientes acometidos pela infecção. A enfermagem neste contexto é a categoria profissional que permanece mais tempo assistindo ao paciente. Diante desses fatos, é importante apresentar as opiniões, vivências e percepções dos enfermeiros atuantes na pandemia. Objetivo: Identificar, na perspectiva de enfermeiros, os impactos da covid-19 em seu cotidiano de trabalho no cuidado às pessoas diagnosticadas com câncer. Método: Estudo descritivo qualitativo baseado na teoria das representações sociais. O cenário do estudo ocorreu em uma instituição pública federal, referência no atendimento ao câncer, com 25 enfermeiros. Os dados foram coletados por meio da técnica de entrevista semiestruturada e de um questionário sociodemográfico. A análise dos dados foi realizada pela técnica de análise de conteúdo temática. Resultados: Participaram da pesquisa 22 enfermeiras (88%) com faixa etária entre 8 a 30 anos de atuação na área oncológica. A análise resultou em quatro categorias centrais: conceitos atribuídos pelos enfermeiros à covid-19; impactos da pandemia no cotidiano dos profissionais; impactos da pandemia na instituição; e impactos da pandemia em pessoas com câncer. Conclusão: Diante de um evento pandêmico, os enfermeiros foram essenciais para o enfrentamento da covid-19. Percebeu-se que as mudanças na rotina da instituição, o uso de equipamentos de proteção individual (EPI), a redução do número de leitos e o índice de absenteísmo afetaram tanto a vida do profissional quanto a do paciente.

Palavras-chave: equipe de enfermagem; percepção social; infecções por coronavírus; oncologia, representação social.

RESUMEN

Introducción: El nuevo coronavirus SARS-CoV-2, causa principal del COVID-19, fue identificado en diciembre de 2019 en Wuhan, China. Desde entonces, el virus se ha propagado por todo el mundo y ha infectado a millones de personas. Los servicios sanitarios fueron desbordados por la atención a los pacientes afectados por la infección. La enfermería es la clase profesional sanitaria que permanece más tiempo con los pacientes. Ante estos hechos, es fundamental presentar las opiniones, experiencias, conocimientos y percepción de los enfermeros durante la asistencia a los pacientes durante la pandemia. Objetivo: Identificar, desde la perspectiva de los enfermeros, los impactos del COVID-19 en su trabajo diario en el cuidado de personas diagnosticadas con cáncer. Método: Estudio descriptivo con enfoque cualitativo basado en la teoría de la representación social. El escenario de estudio fue en una institución pública federal de referencia en atención al cáncer, con 25 enfermeros. Los datos fueron recolectados a través de la técnica de entrevista semiestructurada y un cuestionario sociodemográfico. El análisis de los datos se realizó mediante la técnica de análisis de contenido temático. Resultados: Participaron del estudio 22 enfermeras (88%), con experiencia en el campo de la oncología entre 8 y 30 años. El análisis resultó en cuatro categorías centrales: conceptos atribuidos por los enfermeros al COVID-19; impactos de la pandemia en la vida diaria de los profesionales, impactos de la pandemia en la institución e impactos de la pandemia en los pacientes de oncología. Conclusión: Con este estudio se pudo comprobar que incluso ante un evento pandémico, los enfermeros fueron profesionales esenciales para enfrentar el COVID-19. Se percibió que los cambios en la rutina de la institución, el uso de equipos de protección personal (EPP), la reducción del número de camas y el índice de ausentismo, afectaron tanto la vida del profesional como la del paciente. Palabras clave: grupo de enfermería; percepción social; infecciones por coronavirus; oncología médica, representación social.

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INTRODUCTION

In December 2019, the province of Wuhan, China was the epicenter of a new coronavirus called SARS-Co-V-2, the main cause of the COVID-19 which spread rapidly to many cities and countries and was declared a global health threat¹.

The virus spreads by close person-to-person contact by respiratory droplets produced when an infected person coughs or sneezes and indirect contact when droplets fall on surfaces and close objects². The most common symptoms are fever (83%), cough (82%), dyspnea (31%), myalgia (11%), mental confusion (9%), headache (8%), sore throat (5%), rhinorrhea (4%)³. The severe manifestations of COVID-19 are respiratory failure, septic shock, dysfunction or multiple organs failure⁴.

The worst COVID-19 related prognosis is associated with advanced age, tobacco use and comorbidities as cancer, a modifying and/or aggravating factor of the natural course of the disease because cancer patients have more odds of developing the severe form than noncancer patients. In addition, immunosuppression caused by cancer drugs and hospital follow-up of patients in treatment increases their possibility of being infected⁶.

According to data from Brazil's professional associations in 2020, 2,478,566 nurses – 611,133 nurses and 1,867,433 licensed nurse practitioners were the workforce assigned to the pandemic. Of the more than 3.5 million health professionals of the National Health System (SUS), more than two million were at the front line assisting infected individuals within a context of thousands uncontrolled deaths⁷.

The nurse is the only health professional at the front line to fight COVID-19 who assists the patient at the bed on a 24-hour shift⁸.

Oncology nurse assists the patient throughout the whole course of the treatment and should help within a broader perspective, understanding the sociocultural and psychological aspects of the disease⁹. Therefore it is important to identify the COVID-19 impacts during the nurses' routine who provide care to patients with cancer.

The study scenario was COVID-19 and its social representations for oncology nurses who were at the front line of the pandemic.

The research question based in the scientifictechnological knowledge of the health professionals and the society's common sense on that theme was: "How COVID-19 impacted the life and working routine of oncology nurses?"

The objective of the study is to identify the COVID-19 impacts perceived by nurses while caring for individuals with cancer.

METHOD

Qualitative study based on the Theory of Social Representations (TSR) which attempts to reveal how individuals of a certain group think and the meanings and perspectives they attribute to the theme. Several theoretical and methodological approaches are characteristic of nursing. This Theory allows the researcher to capture the participants' interpretation about the reality it attempts to investigate and what the attitudes of a certain group are¹⁰.

The study was conducted in November and December of 2022 at a public high complexity oncology reference hospital in Rio de Janeiro. 25 oncology nurses were approached according to the following inclusion criteria: government employee working at the institution, oncology nurse for more than three years and experience in assisting COVID-19 infected individuals with cancer. The exclusion criteria were: professionals on any type of leave of absence, those who were not in direct contact with the patients hospitalized or were in remote mode.

Data were collected based on a semistructured script questionnaire applied during an interview about the sociodemographic profile of the study sample with closed questions. The nurse was briefed about the theme and objective of the study and a consent to record the interview for further transcription and analysis of the material was obtained.

The interviews were previously scheduled to avoid interference with their routine and conducted where the nurse performed its activities.

The content of the narratives was analyzed after the transcription, based in the theory of content analysis by Bardin¹¹ systematized by Oliveira¹². The analysis was divided in three phases: preliminary, review of the material and processing of the data. The preliminary phase – float reading, which is the first contact with the material collected – consists in the organization expressed in three tasks: select documents for analysis, hypothesis and development of indicators that substantiate the interpretation.

The second phase is the review of the material through the conversion and consolidation of original data into registration units (RU) i.e. since the codification of the material to the transmutation of raw data by editing, aggregation and enumeration and ultimately, the presentation of the content. The coding encompasses the editing (choice of the RU or context), enumeration (selection of the rules of counting), classification and aggregation (choice of the categories)^{11,12}.

The categories should be homogeneous, exclusive, objective and relevant. The categorization followed two

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phases: the inventory, when the elements are sorted out and the classification, which divides these elements and organize the messages for further treatment of the results – the inference and interpretation that highlight the information after the analysis^{11,12}.

On that phase, it was attempted to find out what was behind each word, going beyond the concrete under a subjective perspective without waiving the scientific rigor. The data were organized in simple tables with fixed frequencies to allow the visualization and distribution of RU in categories and subcategories of analysis to facilitate the presentation and analysis of the information taken from the narratives^{11,12}.

The TSR is widely utilized because the investigators capture the interpretations from the participants themselves about the reality to be studied. As outcomes of social events and facts, they originate from collective and not individual consciousness⁹.

The Institutional Review Board (IRB) of the National Cancer Institute (INCA) approved the study, report number 4687263 (CAAE (submission for ethical review): 45556821.1.0000.5274) in compliance with Directives 466/12¹³ and 510/2016¹⁴ on ethical guidelines for studies with human beings.

RESULTS AND DISCUSSION

The study sample consisted in 25 nurses, 22 women (88%) and three men (12%) at the age range of 37-60 years old, who worked from eight to 30 years in nursing. Each interview lasted from eight to 40 minutes.

24 nurses (96%) claimed they have been infected and progressed to the disease, three of them with confirmed diagnosis (12%) who were admitted at the infirmary and all of them were vaccinated. The analysis resulted in 528 RU grouped in 20 themes divided in four major categories: concepts nurses attributed to COVID-19, impacts of the pandemic on the daily activities of the professionals, impacts of the pandemic on the institution and impacts of the pandemic on individuals with cancer (Table 1).

CATEGORY 1 - CONCEPTS ATTRIBUTED BY NURSES TO COVID-19

This category was organized in two themes and 34 RU, accounting for 6.44% of the total of RU (Table 2).

Most of the nurses attributed COVID-19 the concept of a viral disease as the analysis revealed.

The following narrative portrays how the professionals elaborated the virus.

A disease of the century, a viral disease affecting lungs mainly, isn't it? A fast progression disease, right? Where the patient's lungs heals, but you can lose him in 12 hours if a quick intervention fails (Interview 17).

Coronavirus belongs to the betacoronavirus genus of the family *Coronaviridae*¹⁵. As an acute respiratory infection, COVID-19 is spread by droplets, respiratory secretions and direct contact with the patient infected¹⁶. Health professionals are at great risk of contracting the disease due to direct contact with infected patients and exposure to high viral load (thousands of viral droplets)¹⁷.

The pandemic caused by the novel coronavirus changed the job of these professionals, mainly nurses who are the front line with direct and continuous contact with the infected patients. Within this context, new insights and practices based in wisdom and behavior individually and collectively emerged¹⁸.

It became of the uttermost importance to improve their formation and prepare them to tackle with this infectious disease. Therefore, nurses should be aware of the novel coronavirus, how it spreads and improve their practice within this new setting and perform their roles in an educative perspective, providing the population clarifications and reliable information⁵.

CATEGORY 2 – IMPACTS OF THE PANDEMIC ON THE DAILY ACTIVITIES OF PROFESSIONALS

This category was organized in seven themes and 193 RU, accounting for 36.55% of the total of RU (Table 3).

Data collected for 2020 concluded that Brazil was the country with most deaths of nurses by COVID-19 in the

 Table 1. Categories of social representations of COVID-19 for nurses, Brazil, 2023

Number of the category	Category	Number of RU	% RU
1	Concepts nurses attributed to COVID-19	34	6.44
2	Impacts of the pandemic on daily activities of the professionals	193	36.55
3	Impacts of the pandemic on the institution	236	44.70
4	Impacts of the pandemic on individuals with cancer	65	12.31
	Total	528	100

Caption: RU – registration unit.

Table 2. Concepts nurses attributed to COVID-19

Themes/units of meaning	Total UR	Interviews	Category	Total RU	% RU
COVID-19 as viral disease	33	24	Concepts nurses		6.44
COVID-19 as infectious-parasitic	1	1	attributed to	34	
diseases		1	COVID-19		

Caption: RU - registration unit.

world. Nurses and licensed practitioners nurses were the protagonists while the pandemic was in course for their constant and assiduous action with infected patients¹⁹.

The incorrect use of equipment, lack of personal protective equipment (PPE), work overload and contact with infected patients are risk factors for these professionals to become ill. The protection of their health is paramount to avoid the spread of the disease on health units and households, being necessary to adopt protocols for airborne protection control²⁰.

Due to the high rate of the population sickening worldwide, health units and institutions discontinued the visits and the presence of companions for safety reasons, avoid the circulation of the virus and reduce the contamination²¹.

The following narrative mirrors the professional thoughts about the absence of companions and visitors to hospitalized patients.

Somewhat, family helped and provided comfort to the patient. Anxiety is very common here (Interview 19).

Family anguish associated with lack of information, in addition to concerns with "loved ones" hospitalized were negative aspects the pandemic caused¹⁷.

Communication exchange among health teams and families of hospitalized patients had to be coordinated

to reduce the risk of coronavirus infection⁵. The nurse is the professional who is assigned the role of educator offering guidelines of self-care to help the patient and its family²².

Technological means to keep the communication among professionals and family was an alternative to humanized care. For instance, videoconferences that favor the communications and the access of distant relatives who ensure emotional support to the patients. The technological resources to the benefit of the patient helped the nursing team to improve the development of communication strategies and promote humanized care²³.

Pandemic brought psychological consequences, negative feelings as fears and uncertainties. The professionals who continued working on their origin work sites expressed fear at every step of the way²⁴.

Well, I felt fear, despair, anxiety. Fear of death, persons near you and because of you. This was a heavy toll we were compelled to bear. Someone from your family had COVID because you brought it home and he died, this is a heavy burden, like a sentence, you know? (Imterview 24).

The increase of the workload, fear of infecting family and/or persons near you in addition to the nurse itself and misinformation are the main factors possibly creating emotional stress for the professionals⁸.

Themes/units of meaning	Total RU	Interviews	Category	Total RU	% RU
High contamination of the team	41	19			
Relationship of the team with family members	32	20			36.59
Increase of workload	4	3	Impacts of the	· .	
Multiprofessional relationship	1	1	pandemic on the	193	
Fear to infect the family	34	18	 daily activities of professionals 		
COVID-19 sequelae	8	7			
Impact on the mental health of the health professionals	73	21			

Table 3. Impacts of the pandemic on the daily activities of professionals

Health professionals at the front line felt physically and psychologically the effects of the rise of cases caused by the pandemic and COVID-19 related tensions can cause mental symptoms difficult to manage²⁵. The risk of contamination of the professionals and family by COVID-19 and lack of PPE bring mental and psychic suffering²⁶.

Due to the high viral spread, and high rate of mortality, health professionals working in this scenario created bonds with the patients while caring for them and felt fear, anxiety, depression and anguish²⁷.

Measures to reduce work stressors during the pandemic can help to protect the mental health in addition to changes in the organization, reduction of the work shift, evaluation of professionals, improvement of the working conditions and psychological support among others²⁵.

CATEGORY 3 - IMPACTS OF THE PANDEMIC ON THE INSTITUTION

This category was divided in eight themes and 236 RU corresponding to 44.70% of the total RU (Table 4).

Understaffing of the nursing team was already the reality of the country and one of the main challenges was high absenteeism the institutions had to deal with. Front line health professionals are more exposed to the virus, increasing the risk of contamination and possible leave of absence¹⁷.

Great part of the staff were on leave of absence, some of them were ill but continued to work, left and came back once again still not recovered, tested negative but with sequelae. Understaffing, complex tasks daily without COVID, insufficient team for a cancer hospital, it is a different level of complexity (Interview 2).

The adoption of institutional measures to promote the worker's health and professional value, in addition to prevention of work-related accidents were important strategies to reduce the absenteeism²⁸, in addition to training and courses²⁹.

The novel virus brought uncertainties on how to manage infected patients and protect itself and the other; basic knowledge about routes of transmission are not enough to stop the spread of the disease³⁰.

Educative practices play a key role in the development of the work, preparing and qualifying the nursing team to face healthcare³¹ related challenges.

It is believed that hospitals are at great risk of viral contamination. Because of understaffing due to infected professionals³², training is an important tool to fight COVID-19 as well as donning and doffing of PPE safely.

The work scale was negatively 28 impacted because health professionals were infected and had to take a leave

of absence. During the pandemic the working conditions of the nurses deteriorated leading to collapses, routine changes, lack of material, poor adaptation, work overload and unhealthy conditions affecting the psychosocial wellbeing³³.

The use of PPE changed during the pandemic because the objective was to block and/or reduce the infection of the professionals at the front line but due to the world health crisis, the supply of these protective equipment failed to meet the demand. Fear and insecurity while managing infected individuals predominated among professionals at the front line. It was necessary to ensure the qualitative use of PPE to reduce virus spread, sickening and absence of health professionals³⁴.

Lack of PPE, increase of the demand for health training and absenteeism were stressors that health professionals and managers lived³⁵.

These professionals had to define strategies to ensure the quality of the management such as restructuring of physical spaces, assistance flows, cancellation of procedures and elective surgeries, in addition to reducing the number of beds due to the required distancing and urgent enrollment of new staff, assignment of resources, supply and equipment management, adjustment of the nurse team and attention to their mental health³⁶.

The nurse interviewed expressed its opinion about how the managers performed during the pandemic.

I believe the managers had a tough task just like us. What was left went to buy supplies, we know it was a moment that everything was depleted. World supply scarcity. Everyone had to step in and help us (Interview 19).

During the COVID-19 pandemic, the manager had to be strategic using meetings and treatment to meet the group's demands to make the situation less problematic. This professional should know and respect protocols and institutional guidelines to balance administrative and healthcare activities³⁵.

CATEGORY 4 – IMPACTS OF THE PANDEMIC ON INDIVIDUALS WITH CANCER

This category was organized in three themes and 65 RU, corresponding to 12.31% of the total of RU (Table 5).

The literature reports that the worst prognosis of the disease is associated with advanced age, male sex, tobacco use history and comorbidities like cancer. Patients with cancer are more susceptible to severe complications caused by the severe acute respiratory syndrome, SARS CoV-2 as a result of the treatment and myelosuppression that compromise the immune system³⁷.

Table 4. Impacts of the pandemic on the institution

Themes/units of meaning	Total RU	Interviews	Category	Total RU	% RU
High absenteeism	35	18	Impacts of the pandemic on the daily activities of the professionals	235	44.56
Lack of material to screen COVID-19	1	1			
Training	44	22			
Change of the institutional routine	61	23			
Lack of routine to provide care to COVID-19 patients	36	16			
Poor hospital physical structure	9	5			
Lack of PPE	23	14			
Managers' actions	27	21	1		

Caption: PPE = Protective Personal Equipment.

The "Sociedade Brasileira de Cirurgia Oncológica" (SBCO) and the "Sociedade Brasileira de Patologia (SBP)" reported that there was a decline of 70% of the oncologic surgeries in 2020. Further to a drop of 50% to 90% of biopsies sent to pathology for cancer diagnosis, SBCO estimates that nearly 50 thousand Brazilians failed to receive the diagnosis of cancer³⁸.

The narrative below portrays the professional view about the impact of COVID-19 on oncologic patients.

Surgeries and chemotherapy were put on hold but for us at UPO, what was worst was the discontinuation of surgeries (Interview 14).

It is evident that COVID-19 impacted the scientific community associated with researches on cancer, closing laboratories and delaying the conduction of cancer-related clinical trials³⁹.

As the pandemic evolved, the incidence rates of patients with cancer suggest higher rates of severe and critical diseases⁴⁰. For each year of the triennium 2023-2025, it was estimated the occurrence of 704 thousand new cases of cancer (483 thousand, except non-melanoma skin cancer)⁴¹.

For being more propense to the severity of COVID-19, cancer patients were admitted not to treat the disease but to receive care for the infection caused by the novel coronavirus. Given the high probability of infection, health institutions and services suspended visits and the presence of companions to control viral spread⁵.

The narrative below exposes the nurse's perception about the suspension of visits and companions.

The family could not be there, visits and companions were not allowed, this wasn't good because the patient became anxious, we tried to somewhat minimize the absence, some nurses made a video call, very stressful (Interview 3). INCA informed that the impacts of COVID-19 on cancer cases⁴¹ is still unclear. It is known that the suspension of surgeries, postponement of chemotherapics and radiotherapy favor the progression of the disease, increasing the odds of metastases and dismal oncologic prognosis⁴².

CONCLUSION

COVID-19 pandemic changed the life of the population and health teams as described in this article. Changes of the institution routine, further to the scarcity of health products and PPE have negatively impacted global health services. The reduction of available beds and mass absenteeism affected the lives of patients, health professionals and health services due to increased demand for health care.

It was possible to find how nurses working with COVID-19 thought, the interviewees described it as a highly lethal viral disease, mainly for cancer patients who are immunosuppressed with worst prognosis. Another common conclusion was the reduction of the number of surgeries and chemotherapy and worse oncologic prognosis. In addition, the initial effect of the virus on their personal and professional lives was clear, with fear of contamination for themselves and family, insecurity and increase of the work load as the most prevalent aspects of their professional lives.

Within this context, the nurses were essential to cope with COVID -19. Professionals and patients' lives changed as a result of institutional adjustments, use of PPE, less beds and absenteeism.

CONTRIBUTIONS

All the authors contributed equally and approved the final version to be published.

Tabela 5. Impacts of the pandemic on individuals with cancer

Themes/units of meaning	Total RU	Interviews	Category	Total RU	% RU
High contamination of the patients	1	1	Impacts of the		
Impact on oncologic treatment	44	22	pandemic on	65	12.38
Patients without support network (visits and companions)	20	12	individuals with cancer	00	12.00

DECLARATION OF CONFLICT OF INTERESTS

There is no conflict of interests to declare.

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REFERENCES

- Umakanthan S, Sahu P, Ranade AV, et al. Origem, transmissão, diagnóstico e gerenciamento da doença de coronavírus 2019 (COVID-19). Postgrad Med J. 2020;96(1142):753-8.
- Costa CN, Santos Pinto PB, Costa RDS, et al. Paradigmas da gestão de imunizantes: o uso de métodos quantitativos como suporte à decisão em tempos de Covid-19 no estado do Rio de Janeiro. R. G. Secr. 2022;13(4):2197-225. doi: https://doi.org/10.7769/gesec.v13i4.1469
- Lima CMAO. Informações sobre a doença do novo coronavírus (COVID-19). Radiol Bras. 2020;53:V–I. doi: https://doi.org/10.1590/0100-3984.2020.53.2e1
- Iser BPM, Silva I, Raymundo VT, et al. Definição de caso suspeito da COVID-19: uma revisão narrativa dos sinais e sintomas mais frequentes entre os casos confirmados. Epidemiol Serv Saúde. 2020;29:e2020233. doi: https://doi.org/10.5123/ S1679-49742020000300018
- Silva FC, Zamprogna KM, Souza SS, et al. Isolamento social e a velocidade dos casos de covid-19: medidas para prevenir a transmissão. Rev Gaúcha Enferm. 2021;42(spe):e20200238. doi: https://doi. org/10.1590/1983-1447.2021.20200238
- Alcântara RC, Silva Junior LCF, Arnozo GM, et al. Covid-19 em Pacientes oncológicos: uma revisão do perfil clínico-epidemiológico. Rev. Bras. Cancerol. 2020;66(TemaAtual):e-1046. doi: https://doi.org/10.32635/2176-9745. RBC.2020v66nTemaAtual.1046
- Portela MC, Reis LGC, Lima S M L. Os profissionais da saúde e a pandemia de covid-19. In: Covid-19: desafios para a organização e repercussões nos sistemas e serviços de saúde. Rio de Janeiro: Observatório Covid-19 Fiocruz; Editora Fiocruz; 2022. p. 282-371.

(Informação para ação na Covid-19 series). doi: https://doi.org/10.7476/9786557081587

- 8. Barbosa DJ, Gomes MP, Souza FBA, et al. Fatores de estresse nos profissionais de enfermagem no combate à pandemia da COVID-19: síntese de evidências. Comun ciênc saúde. 2020;31:31-47.
- 9. Silva SÉDD, Camargo BV, Padilha MI. A teoria das representações sociais nas pesquisas da enfermagem brasileira. Rev Bras Enferm. 2011;64(5):947-51.
- 10. Jodelet D. Folies et representations sociales. Paris: PUF; 1989.
- 11. Bardin L. Análise de conteúdo. Lisboa: Edições 70; 2000.
- 12. Oliveira DC. Análise de conteúdo temática: uma proposta de operacionalização. Rev. enferm. 2008;16(4):569-76.
- 13. Conselho Nacional de Saúde (BR). Resolução nº 466, de 12 de dezembro de 2012. Aprova as diretrizes e normas regulamentadoras de pesquisas envolvendo seres humanos. Diário Oficial da União, Brasília, DF. 2013 jun 13; Seção I:59.
- 14. Conselho Nacional de Saúde (BR). Resolução nº 510, de 7 de abril de 2016. Dispõe sobre as normas aplicáveis a pesquisas em Ciências Humanas e Sociais cujos procedimentos metodológicos envolvam a utilização de dados diretamente obtidos com os participantes ou de informações identificáveis ou que possam acarretar riscos maiores do que os existentes na vida cotidiana, na forma definida nesta Resolução [Internet]. Diário Oficial da União, Brasília, DF. 2016 maio 24; Seção I:44.
- 15. Curcio JS, Benvindo-Souza M, Folador DS, et al. Descrição de vírus pertencentes à Família Coronaviridae em morcegos no Cerrado Central-Brasileiro. Braz J. Infect. Diseas. 2022;26(1):101791. doi: https://doi. org/10.1016/j.bjid.2021.101791
- 16. Brito SBP, Braga IO, Cunha CC, et al. Pandemia da COVID-19: o maior desafio do século XXI. Vigil Sanit Debate. 2020;8(2):54-63. doi: https://doi. org/10.22239/2317-269x.01531
- Teixeira CFS, Soares CM, Souza EA, et al. A saúde dos profissionais de saúde no enfrentamento da pandemia de Covid-19. Ciênc. saúde coletiva. 2020;25(9):3465-74. https://doi.org/10.1590/1413-81232020259.19562020
- 18. Oliveira W S, Migueis GS, Silva MS, et al. Conhecimento sobre covid-19 dos profissionais de enfermagem

atuantes no enfrentamento da doença. RSD. 2021;10(11):e244101119676.

- 19. Silva LS, Machado EL, Oliveira HND, et al. Condições de trabalho e falta de informações sobre o impacto da covid-19 entre trabalhadores da saúde. Rev. bras. saúde ocup. 2020;45:e24.
- 20. Neto JC, Leite GMSD, Araruna VHC, et al. Uso de equipamentos de proteção individual no enfrentamento à covid-19. Rev. Enferm. Atual In Derme. 2022;96(38):e-021238.
- 21. Oliveira ES, Gomes NP, Oliveira LMS, et al. Atuação da equipe de saúde no atendimento ao idoso na unidade de emergência durante a pandemia do Covid-19. São Paulo: Editora Científica Digita; 2022. doi: https://doi. org/10.37885/220910043
- Carvalho ACSD, Lacerda ACDL. A enfermagem atuando na educação de pacientes e familiares: uma visão ampliada. Rev. pesqui. cuid. fundam. 2010;2(Supl.):445-8. doi: https://doi.org/10.9789/2175-5361.2010. v0i0.%25p
- 23. Godoi HPD. Tecnologia virtual como ferramenta de visita familiar a pacientes com COVID-19 internados em Unidade de Terapia Intensiva Coronariana: construção e validação de um procedimento operacional padrão [dissertação]. Florianópolis: Universidade Federal de Santa Catarina; 2021.
- 24. Moretti SA, Guedes-Neta ML, Batista EC. Nossas Vidas em Meio à Pandemia da covid-19: Incertezas e Medos Sociais. Rev Enfermagem e Saúde Coletiva. 2020;4(2):32-41.
- 25. Lóss JDCS, Boechat LBG, Silva LPD, Dias VE. A saúde mental dos profissionais de saúde na linha de frente contra a covid-19. Rev Transformar. 2020;14(2):54-75.
- 26. Souza NVDO, Carvalho EC, Soares SSS, et al. Trabalho de enfermagem na pandemia da covid-19 e repercussões para a saúde mental dos trabalhadores. Rev Gaúcha Enferm. 2021;42(spe):e20200225. doi: https://doi. org/10.1590/1983-1447.2021.20200225
- 27. Prado AD, Peixoto BC, Silva AMB, et al. A saúde mental dos profissionais de saúde frente à pandemia do covid-19: uma revisão integrativa. Rev Eletr Acerv Saúde. 2020;46:e4128.
- 28. Alves ABSL, Matos FGOA, Carvalho ARS, et al. absenteísmo na enfermagem frente à pandemia da covid-19: um estudo comparativo em um Hospital do Sul do Brasil. Texto contexto - enferm. 2022;31:e20210254. doi: https://doi.org/10.1590/1980-265X-TCE-2021-0254
- 29. Borges, EA. Principais impactos do retorno ao trabalho presencial em cenário de pandemia–a experiência da EBSERH sede [monografia]. Brasília (DF): Escola Nacional de Administração Pública; 2021.
- 30. Ribeiro AP, Oliveira GL, Silva LS, et al. Saúde e segurança de profissionais de saúde no atendimento a pacientes no

contexto da pandemia de Covid-19: revisão de literatura. Rev bras saúde ocup. 2020;45:e25. doi: https://doi. org/10.1590/2317-6369000013920

- 31. Santos DBC, Assunção GF, Baptista VG, et al.Covid-19 e prona: prevenção de lesão por pressão pela enfermagem. Rev Recien. 2021;11(36):112-8.
- 32. Soares AKT, Arruda FR, Novais GMDML, et al. A importância da paramentação e desparamentação seguras em infecções por aerossol, com foco à covid-19: uma revisão da literatura. Rev eletr Acerv saúde. 2021;13(6):e7786.
- 33. Queiroz AM, Sousa AR, Moreira WC, et al. O 'novo' da covid-19: impactos na saúde mental de profissionais de enfermagem? Acta Paul Enferm. 2021;34:eAPE02523.
- 34. Silva F. O uso do equipamento de proteção individual em tempos de covid19: uma revisão da literatura. RSD. 2021;10(2)1-14. doi: https://doi.org/10.33448/rsdv10i2.12772
- 35. Rigotti AR, Zamarioli CM, Prado PR, et al. Resilience of Healthcare Systems in the face of COVID-19: an experience report. Rev Esc Enferm USP. 2022;56:e20210210. doi: https://doi.org/10.1590/1980-220X-REEUSP-2021-0210pt
- 36. Craveiro KL, Rocha DS, Rocha GS, et al. Desafios do Enfermeiro na gestão do cuidado da covid-19 em uma Unidade de Terapia Intensiva Adulto. RSD. 2022;11(6):e58211629438. http://dx.doi.org/10.33448/ rsd-v11i6.29438
- 37. Ferreira JD, Lima FCDS, Oliveira JFP, et al. Covid-19 e Câncer: Atualização de aspectos epidemiológicos. Rev. Bras. Cancerol. 2020;66(TemaAtual):e-1013. doi: https://doi.org/10.32635/2176-9745. RBC.2020v66nTemaAtual.1013
- 38. Sociedade Brasileira de Cirurgia Oncológica. Sociedades médicas apontam redução de 70% das cirurgias e que 50 mil brasileiros não receberam diagnóstico de câncer. SBCO. 2020 maio 14. [acesso 2023 fev 20]. Disponível em: https://sbco.org.br/atualizacoescientificas/sociedades-medicas-apontam-reducao-de-70das-cirurgias-e-que-50-mil-brasileiros-nao-receberamdiagnostico-de-cancer/
- 39. Silva TTM, Araújo NM, Sarmento SDG, et al. Impacto da covid-19 em pacientes com câncer: uma revisão de escopo. Texto contexto - enferm. 2021;30:e20200415. doi: https://doi.org/10.1590/1980-265X-TCE-2020-0415
- 40. Yeoh CB, Lee KJ, Rieth EF, et al. Covid-19 no paciente com câncer. Anesth Analg. 2020;131(1):16-23.
- 41. Instituto Nacional de Câncer. Estimativa 2023: incidência de câncer no Brasil. Rio de Janeiro: Instituto Nacional de Câncer; 2022. [acesso 2023 dez 12]. Disponível em: https://www.inca.gov.br/sites/ufu.sti.inca.local/files// media/document//estimativa-2023.pdf

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42. Soerjomataram I, Bardot A, Aitken J, et al. Impact of the covid-19 pandemic on population-based cancer registry. Int J Cancer. 2022;150(2):273-8. doi: https:// doi.org/10.1002/ijc.33792

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