

Boletim BiblioCovid

Boletim BiblioCovid v.3 n.6, junho 2022 | Covid e Meio ambiente

Boletim destinado a apresentação de estratégias e artigos científicos sobre temas relacionados à Covid-19. Gostaria de um boletim com sua temática? Sugira novos temas aqui: [BiblioCovid_sugestao_de_tema](#)

Covid e Meio ambiente



Vocabulário controlado

MeSH – Medical Subject Headings (NLM/NIH) DeCS

Bases utilizadas

PubMed - Portal Capes – BVS

Termos Utilizados (com base no Descritores em Ciências da Saúde - DeCS):



Descritores e/ou palavras-chave

Environment	Biodiversity
Ecosystem	Climate Change
Política Pública	Covid-19
Biosecurity	SARS-CoV-2

Filtros utilizados

Idioma: Inglês – Português
Ano: 2021 -2022
Texto completo

Estratégias de busca

((("COVID-19"[Mesh]) OR "SARS-CoV-2"[Mesh]) AND ((("Environment"[Mesh]) AND ("Ecosystem"[Mesh] OR "Biosecurity"[Mesh] OR "Biodiversity"[Mesh] OR "Climate Change"[Mesh])) AND (sars-cov-2) OR (covid) AND (environment) AND (year_cluster:[2021 TO 2022]))

Seleção dos dez artigos mais relevantes, segundo critérios da base de dados Portal regional BVS, incluindo os filtros “Idioma: Inglês - Português”, “Ano: 2021 - 2022” e “Texto completo”

1. Poor sanitation and transmission of COVID-19 in Brazil

[Doi:10.1590/1516-3180.2020.0442.R1.18112020](https://doi.org/10.1590/1516-3180.2020.0442.R1.18112020)

Resumo

Coronavirus is a family of viruses that cause respiratory infections. From cases first recorded in China at the end of 2019, a new type of virus in this family, named severe acute respiratory syndrome coronavirus 2 (SARS-CoV-2), was discovered. The disease caused by this virus, COVID-19, was brought into Brazil by people in social classes with greater purchasing power, but groups with larger demographic dimensions have tended to become more affected over time. Poor sanitation can generate risky situations and behavior among people who live in spaces with characteristics that limit their quality of life. Installation of piped water in homes and basic education for the population are fundamental measures for disease control, including in relation to COVID-19. In this updating article, the COVID-19 pandemic was analyzed in the context of inequities in Brazil (comparing these with the situation in other countries). A bibliographic search of texts relating to basic sanitation, socioeconomic development and transmission of COVID-19 in Brazil and worldwide was conducted.

Referência

ALVES, M. R.; SOUZA, R. A. G. de; CALÓ, R. S. Poor sanitation and transmission of COVID-19 in Brazil. **Sao Paulo Med J.**, v. 139, n. 1, p. 72-76, 2021. doi: 10.1590/1516-3180.2020.0442.R1.18112020. Acesso em 07/06/22

2. Right-Wing Populism, Social Identity Theory, and Resistance to Public Health Measures During the COVID-19 Pandemic

[Doi:10.3389/ijph.2022.1604812](https://doi.org/10.3389/ijph.2022.1604812)

Resumo

Many western democracies experienced significant resistance to public health measures designed to curb the spread of the COVID-19 virus. Although there were complex reasons for this resistance, right-wing populist forces seem to have played a significant role in fueling it. Studies show a strong correlation between right-wing populist support and resistance to COVID-19-mitigating measures including vaccination, and those who supported these populist movements were more likely to suffer and die from the virus. The question thus arises: why do people support these movements which openly undermine their own health interests? This paper addresses this question from a social-psychological perspective. Specifically, it draws on social identity theory to explain the considerable success of right-wing populism's radical anti-health agenda and to offer some suggestions about how this negative influence may be countered.

Referência

MAGNUS, Kathleen D. Right-Wing Populism, Social Identity Theory, and Resistance to Public Health Measures During the COVID-19 Pandemic. **Int J Public Health**, v. 67, 1604812, 2022. doi:10.3389/ijph.2022.1604812. Acesso em: 07/06/2022.

3. Our Postpandemic World: What Will It Take to Build a Better Future for People and Planet

[Doi: 10.1111/1468-0009.12508](https://doi.org/10.1111/1468-0009.12508)

Resumo

Despite the pandemic's ongoing devastating impacts, it also offers the opportunity and lessons for building a better, fairer, and sustainable world. Transformational change will require new ways of working, challenging powerful individuals and industries who worsened the crisis, will act to exploit it for personal gain, and will work to ensure that the future aligns with their interests. A flourishing world needs strong and equitable structures and systems, including strengthened democratic, research, and educational institutions, supported by ideas and discourses that are free of opaque and conflicted influence and that challenge the status quo and inequitable distribution of power.

Referência

VAN SCHALKWYK, M. CI et al. Our Postpandemic World: What Will It Take to Build a Better Future for People and Planet?. **Milbank Q**, v. 99, n. 2, p. 467-502. doi:10.1111/1468-0009.12508. Acesso em: 2 maio 2022. Acesso em: 07/06/2022.

4. Sociodemographic Determinants of Poles' Attitudes towards the Forest during the COVID-19 Pandemic

[Doi: 10.3390/ijerph19031537](https://doi.org/10.3390/ijerph19031537)

Resumo

Attitudes towards forest ecosystems have been changing together with human needs, which is amplified with society's increasing need to spend recreation time in the forest. The phenomenon has been particularly visible during the COVID-19 pandemic. The aim of this study was to determine the attitude of Poles to forests during the COVID-19 pandemic. The research was based on (1) a sociodemographic background questionnaire that consisted of questions about the independent variables and (2) the LAS scale-an independently prepared tool for measuring attitudes towards the forest. In the survey, 1025 people participated (673 women). The age of the subjects was between 19 and 68. The attitude towards the forest was analysed in three dimensions: Benefits, Involvement, and Fears. The Mann-Whitney U test and Kruskal-Wallis one-way analysis of variance by ranks were used for statistical analysis. Women and people with primary education expressed the most fears connected with going to the forest. Men and people living in the countryside and in small towns, as well as respondents who were professionally active and performing work connected with forests were the most involved in exploring the forest and working for its benefit. Concerning the forest, concerned women, people from the highest age group, respondents with university education, and white-collar workers notice the most benefits from recreational activities in the forest.

Referência

KOPROWICZ, Anna et al. Sociodemographic Determinants of Poles' Attitudes towards the Forest during the COVID-19 Pandemic. **Int J Environ Res Public Health**. 19, n. 3, 1537, 2022. doi: 10.3390/ijerph19031537. Acesso em: 07/06/2022.

5. LAWLER, Odette K et al. The COVID-19 pandemic is intricately linked to biodiversity loss and ecosystem health

Doi: [10.1016/S2542-5196\(21\)00258-8](https://doi.org/10.1016/S2542-5196(21)00258-8)

Resumo

The ongoing COVID-19 pandemic, caused by zoonotic SARS-CoV-2, has important links to biodiversity loss and ecosystem health. These links range from anthropogenic activities driving zoonotic disease emergence and extend to the pandemic affecting biodiversity conservation, environmental policy, ecosystem services, and multiple conservation facets. Crucially, such effects can exacerbate the initial drivers, resulting in feedback loops that are likely to promote future zoonotic disease outbreaks. We explore these feedback loops and relationships, highlighting known and potential zoonotic disease emergence drivers (eg, land-use change, intensive livestock production, wildlife trade, and climate change), and discuss direct and indirect effects of the ongoing pandemic on biodiversity loss and ecosystem health. We stress that responses to COVID-19 must include actions aimed at safeguarding biodiversity and ecosystems, in order to avoid future emergence of zoonoses and prevent their wide-ranging effects on human health, economies, and society. Such responses would benefit from adopting a One Health approach, enhancing cross-sector, transboundary communication, as well as from collaboration among multiple actors, promoting planetary and human health.

Referência

LAWLER, Odette K et al. The COVID-19 pandemic is intricately linked to biodiversity loss and ecosystem health. **Lancet Planet Health**, v. 5, n. 11, :e840-e850, 2021. doi: 10.1016/S2542-5196(21)00258-8. Acesso em: 07/06/2022.

6. Relationship Between the COVID-19 Pandemic and Ecological, Economic, and Social Conditions

[Doi: 10.3389/fpubh.2021.694191](https://doi.org/10.3389/fpubh.2021.694191)

Resumo

The COVID-19 pandemic had huge impacts on the global world, with both a negative impact on society and economy but a positive one on nature. But this universal effect resulted in different infection rates from country to country. We analyzed the relationship between the pandemic and ecological, economic, and social conditions. All of these data were collected in 140 countries at six time points. Correlations were studied using univariate and multivariate regression models. The world was interpreted as a single global ecosystem consisting of ecosystem units representing countries. We first studied 140 countries around the world together, and infection rates were related to per capita GDP, Ecological Footprint, median age, urban population, and Biological Capacity, globally. We then ranked the 140 countries according to infection rates. We created four groups with 35 countries each. In the first group of countries, the infection rate was very high and correlated with the Ecological Footprint (consumption) and GDP per capita (production). This group is dominated by developed countries, and their ecological conditions have proved to be particularly significant. In country groups 2, 3, and 4, infection rates were high, medium, and low, respectively, and were mainly related to median age and urban population. In the scientific discussion, we have interpreted why infection rates are very high in developed countries. Sustainable ecosystems are balanced, unlike the ecosystems of developed countries. The resilience and the health of both natural ecosystems and humans are closely linked to the world of microbial communities, the microbiomes of the biosphere. It is clear that both the economy and society need to be in harmony with nature, creating sustainable ecosystems in developed countries as well.

Referência

MURÁNYI, Attila; VARGA, Bálint. Relationship Between the COVID-19 Pandemic and Ecological, Economic, and Social Conditions. *Front Public Health*, v. 9, 694191, 2021. doi: 10.3389/fpubh.2021.694191. Acesso em: 07/06/2022.

7. The SARS-COV-2 outbreak around the Amazon rainforest: The relevance of the airborne transmission

[Doi: 10.1016/j.scitotenv.2020.144312](https://doi.org/10.1016/j.scitotenv.2020.144312)

Resumo

At the beginning of the SARS-COV-2 outbreak in Brazil, there was a striking difference between the contamination rate in the Amazonian States and the South and the Southeast States. The regions near the Amazon rainforest presented much higher and faster contaminations. This paper attempts to explain this phenomenon through a global analysis of the COVID-19 epidemic in Brazil. It also investigates the relationship between climate conditions and airborne transmission with the evolution of contagion in the Amazonian states. The method of investigation of the spread of SARS-COV-2 in these different macro-environments was based on the analysis of three extensive daily official databases on the number of deaths, the percentage of adherence of the populations to the restriction policies, and the local climatic conditions. Besides, the social conditions in those States were also taken into account. Then, it was compared the epidemiologic results for States with very different climatic characteristics and that had adopted, almost simultaneously, similar social isolation measures. However, all these analyses were not able to explain the remarkable difference in the evolution of the pandemic among Brazilian regions. So, it was necessary to invoke airborne transmission, facilitated by the very high air humidity, as a decisive factor to explain the faster evolution of contagion in the rainforest region. Air humidity seems to be the most important climatic factor in viral spreading, while usual ambient temperatures do not have a strong influence. Another very important result of this analysis was the observation that the onset of collective immunity may have been achieved with a contamination rate of about 15% of the Amazonian population.

Referência

CREMA, Edilson. The SARS-COV-2 outbreak around the Amazon rainforest: The relevance of the airborne transmission. **Sci Total Environ**, v. 759, 144312, 2021. doi: 10.1016/j.scitotenv.2020.144312. Acesso em: 07/06/2022.

8. The ecology of COVID-19 and related environmental and sustainability issues

Doi: [10.1007/s13280-021-01603-0](https://doi.org/10.1007/s13280-021-01603-0)

Resumo

Around the globe, human behavior and ecosystem health have been extensively and sometimes severely affected by the unprecedented COVID-19 pandemic. Most efforts to study these complex and heterogenous effects to date have focused on public health and economics. Some studies have evaluated the pandemic's influences on the environment, but often on a single aspect such as air or water pollution. The related research opportunities are relatively rare, and the approaches are unique in multiple aspects and mostly retrospective. Here, we focus on the diverse research opportunities in disease ecology and ecosystem sustainability related to the (intermittent) lockdowns that drastically reduced human activities. We discuss several key knowledge gaps and questions to address amid the ongoing pandemic. In principle, the common knowledge accumulated from invasion biology could also be effectively applied to COVID-19, and the findings could offer much-needed information for future pandemic prevention and management.

Referência

QINFENG, Guo; LEE, Danny C. The ecology of COVID-19 and related environmental and sustainability issues. **Ambio**, v. 51, 4, p. 1014-1021, 2022. doi: 10.1007/s13280-021-01603-0. Acesso em: 07/06/2022.

9. The Exposome and Immune Health in Times of the COVID-19 Pandemic

[Doi: 10.3390/nu14010024](https://doi.org/10.3390/nu14010024)

Resumo

Growing evidence supports the importance of lifestyle and environmental exposures—collectively referred to as the 'exposome'—for ensuring immune health. In this narrative review, we summarize and discuss the effects of the different exposome components (physical activity, body weight management, diet, sun exposure, stress, sleep and circadian rhythms, pollution, smoking, and gut microbiome) on immune function and inflammation, particularly in the context of the current coronavirus disease 2019 (COVID-19) pandemic. We highlight the potential role of 'exposome improvements' in the prevention-or amelioration, once established-of this disease as well as their effect on the response to vaccination. In light of the existing evidence, the promotion of a healthy exposome should be a cornerstone in the prevention and management of the COVID-19 pandemic and other eventual pandemics.

Referência

MORALES, Javier S et al. The Exposome and Immune Health in Times of the COVID-19 Pandemic. **Nutrients**, v. 14, n. 1, 24, 2021. doi: 10.3390/nu14010024. Acesso em: 07/06/2022.

10. Confronting the Upstream Causes of COVID-19 and Other Epidemics to Follow

[Doi: 10.1177/0020731420946612](https://doi.org/10.1177/0020731420946612)

Resumo

The upstream causes of the COVID-19 pandemic have received little attention so far in public health and clinical medicine, as opposed to the downstream effects of mass morbidity and mortality. To resolve this pandemic and to prevent even more severe future pandemics, a focus on upstream causation is essential. Convincing evidence shows that this and every other important viral epidemic emerging in the recent past and predictably into the future comes from the same upstream causes: capitalist agriculture, its destruction of natural habitat, and the industrial production of meat. International and national health organizations have obscured the upstream causes of emerging viral epidemics. These organizations have suffered cutbacks in public funding but have received increased support from international financial institutions and private philanthropies that emphasize the downstream effects rather than upstream causes of infectious diseases. Conflicts of interest also have impacted public health policies. A worldwide shift has begun toward peasant agricultural practices: Research so far has shown that peasant agriculture is safer and more efficient than capitalist industrial agricultural practices. Without such a transformation of agriculture, even more devastating pandemics will result from the same upstream causes.

Referência

WAITZKIN, Howard. Confronting the Upstream Causes of COVID-19 and Other Epidemics to Follow. **Int J Health Serv.**, v. 51, n. 1, p. 55-58, 2021. doi: 10.1177/0020731420946612. Acesso em: 07/06/2022.



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Expediente

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Imagens: Pixabay

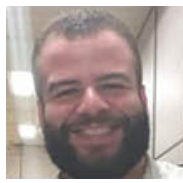
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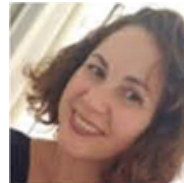
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