

AB013. Impact of coronavirus disease (COVID-19) pandemic on sleep of undergraduate students: a systematic literature review

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Background: The coronavirus disease has infected over 187 million globally and continually disrupting society. Global universities and colleges have closed and have shifted to distance learning. This sudden change in the living environment aggravates pre-pandemic mental and physical vulnerabilities of undergraduate students, including sleep. This systematic literature review aims to describe the prevalence of sleep problems, circadian rhythm disruption, sleep duration, sleep quality, insomnia symptoms, and psychological factors affecting the sleep of undergraduate students from various countries.

Methods: A systematic search on March 2, 2020 for articles published from January 1 to December 31, 2020 using the words “COVID-19,” “Coronavirus,” “Pandemic,” “Sleep,” “Mental Health,” and “Students” from PubMed, Scopus, and Cochrane yielded 757 articles. After removing duplicates, and excluding articles not meeting the selection criteria, 26 articles were included. Criteria for selection were: article is originally open-access and in English, participants are undergraduate students and not in the postgraduate level, sleep outcomes were assessed via objective or subjective tools, and participants did not belong to allied health courses.

Results: Included works came from the USA (5), Italy (5), Spain (1), China (8), Bangladesh (2), UAE (1), Jordan (1), India (2), and Indonesia (1). All included studies recorded data on sleep after stay-at-home orders. Point prevalence

of self-reported sleep problems varied across regions, while longitudinal studies showed that prevalence increased during stay-at-home orders. Most studies showed a significantly increased sleep duration, and circadian rhythm disruption. Increased stress, depression, anxiety, discrimination, shame, stigma, negative affect, increased cases, increased digital media use, and living in rural residence, being unemployed, inaccurate knowledge of pandemic, and being a college student negatively influenced sleep.

Conclusions: Results highlight the impact of stay-at-home orders on the sleep of undergraduates and reveal opportunities for local and global institutions to intervene with policies and programs to promote the well-being of this group.

Keywords: Severe Acute Respiratory Syndrome Coronavirus-2; lockdown; insomnia; Pittsburgh Sleep Quality Index

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Footnote

Conflicts of Interest: The authors have no conflicts of interest to declare.

Ethical Statement: The authors are accountable for all aspects of the work in ensuring that questions related to the accuracy or integrity of any part of the work are appropriately investigated and resolved.

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