



Received: 07-12-2025

Accepted: 17-12-2025

International Journal of Advanced Multidisciplinary Research and Studies

ISSN: 2583-049X

Letter to the Editor

Burnout may not be the only Factor Determining the Sleep Quality of Healthcare Professionals

Josef Finsterer

Neurology & Neurophysiology Censer, Vienna, Austria

Corresponding Author: **Josef Finsterer**

Letter to the Editor

We were interested to read the article by Picagewicz *et al.* on a cross-sectional study of the relationship between burnout syndrome and sleep quality in 47 nurses working three shifts ^[1]. Only 6% of nurses met the burnout criteria, but 60% reported emotional exhaustion in the Maslach Burnout Inventory (MBI) for medical personnel and only 17% reported good sleep quality based on the Pittsburgh Sleep Quality Index (PSQI) ^[1]. The poorer the quality of sleep, the more intense the burnout syndrome was in terms of emotional exhaustion ^[1]. The study is noteworthy, but some points require further discussion.

The first point is that self-assessment of sleep duration and quality may be inadequate, as a person may be mistaken when determining the time they fall asleep and wake up ^[2]. The subjective assessment of sleep can differ greatly from the results obtained in a sleep laboratory. An accurate determination of sleep duration and quality can often only be achieved by recording the electroencephalogram, oxygen saturation, muscle activity, respiratory rate, heart function, and limb movements during sleep.

A second issue is that sleep duration and quality may depend not only on chronic workload, but also on various other endogenous or exogenous determinants. Endogenous determinants include personality type, acute and chronic stress levels, sympathetic tone, ability to cope with exogenous or endogenous stressors, genetic background, comorbidities, comedication, and the lifestyle (e.g., bedtime habits such as self-control to go to bed at a fixed time, turning off lights, TV, headphones, radio, cell phone, i-pad and lights in the bedroom and removing and turning off all devices that generate electrosmog). Exogenous determinants include noise, light, vibrations, draughts, insects, pets, children, partners, the relationship with the neighbour, the time of the last meal or fluid intake, and the quantity of alcohol intake, adrenergic stimulants or illicit drugs ^[3].

Another problem is that burnout and exhaustion often lead to depression and anxiety ^[4]. Depression and anxiety, in turn, can further worsen sleep duration and quality ^[5]. Therefore, it may be useful to additionally assess the degree of depression and anxiety using one of the scales for depression and anxiety. We also should know how many of the nurses involved regularly took antidepressants, anxiolytics, sedatives, or hypnotics to cope with their workload.

In summary, it can be said that the relationship between burnout and sleep behaviour may depend not only on these two variables, but also on several other influencing factors that should be taken into account in a study evaluating the relationship between work overload, burnout, sleep quality, and recovery through sleep.

Declarations

Ethical Approval: Not applicable.

Consent to Participation: Not applicable.

Consent for Publication: Not applicable.

Funding: None received.

Availability of Data and Material: All data are available from the corresponding author.

Completing Interests: The authors declare that the research was conducted in the absence of any commercial or financial relationships that could be construed as a potential conflict of interest.

Author Contribution: JF was responsible for the design and conception, discussed available data with coauthors, wrote the first draft, and gave final approval. SM: contributed to literature search, discussion, correction, and final approval.

Acknowledgements: None.

Keywords: Burnout, Sleep Quality, Nurses, Working Overload, Exhaustion

References

1. Picagevicz MG, Da Silva J, Dos Santos Soares F, Buzanello Donin C, Flor Bertolini GR, Buzanello Azevedo MR. Burnout syndrome and sleep quality in nurses. *Rev Bras Med Trab* 2025; 23(1):e2021690. Doi: <http://doi.org/10.47626/1679-4435-2021-690>
2. Lauderdale DS, Knutson KL, Yan LL, Liu K, Rathouz PJ. Self-reported and measured sleep duration: How similar are they? *Epidemiology*, Nov 2008; 19(6):838-845. Doi: 10.1097/EDE.0b013e318187a7b0
3. Wang Y, Dai X, Zhu J, Xu Z, Lou J, Chen K. What complex factors influence sleep quality in college students? PLS-SEM vs. fsQCA. *Front Psychol*, Aug 25, 2023; 14:1185896. Doi: 10.3389/fpsyg.2023.1185896
4. Fischer R, Mattos P, Teixeira C, Ganzerla DS, Rosa RG, Bozza FA. Association of Burnout with Depression and Anxiety in Critical Care Clinicians in Brazil. *JAMA Netw Open*, Dec 1, 2020; 3(12):e2030898. Doi: 10.1001/jamanetworkopen.2020.30898
5. Jiang Y, Jiang T, Xu LT, Ding L. Relationship of depression and sleep quality, diseases and general characteristics. *World J Psychiatry*, May 19, 2022; 12(5):722-738. Doi: 10.5498/wjp.v12.i5.722