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# Burnout and Vices among Serbian Surgeons and Anesthesiologist, during COVID-19

Dragan Nikolić<sup>1</sup>, Marijana Basta Nikolić<sup>2</sup>, Ljiljana Gvozdenović<sup>3</sup>, Vladimir Manojlović<sup>4</sup>, Đorđe Milošević<sup>5</sup>, Nebojsa Budakov<sup>6</sup>

Medical School, University of Medicine, Novi Sad, Serbia, Clinical Center Vojvodina, Novi Sad, Serbia

Abstract: Burnout is a syndrome of emotional exhaustion and depersonalization that leads to inefficacy at work (1). An observational prospective study included 120surgeons and anesthesiologists who work 24 hours on-call. Participation was voluntary and anonymous. All physicians involved in the study completed an anonymous questionnaire. All the information was strictly used for research purposes and available only to specialized medical personnel (2-8).

Keywords: Burnout, emotional exhaustion, occupational stress levels, surgeons and anesthesiologist, COVID-19

Among the doctors on call, 33.3% were smokers and 27.6% were non-smokers, showing a statistically significant difference (p = 0.884). When it comes to tobacco use, 80% of doctor's on-call reported they smoke during breaks while 77.8% of doctors do not smoke during their on-call shifts but smoke only at home. Among the doctors on call, 33.3% of them reported daily alcohol consumption. Percentage of oncall doctors who do not consume alcohol daily was lower, however statistically insignificant 0,424). Doctors who consumed alcohol daily mostly drank wine (50%) and beer (40%), while other types of alcoholic beverages were not frequently consumed(10%). Percentage of surgeons who consumed two or more cups of alcohol per day was 60%. Only 16.7% of on-call surgeons did not drink more than two glasses of alcohol per day. Substance abuse was reported by only one on-call doctor. 26.7% of doctors on-call and only 10% of doctors not on-call actually used drugs. Occasional drug use was reported in 36.7% of doctors on-call and 66.7% of doctors not on-call. The difference with respect to the use of drugs between doctors not on-call and doctors on-call is statistically significant (p = 0.056). Only 6.6% of doctors reported that they consumed sedatives while on vacation. While on vacation, 76.5 % of male physicians and 55.8% of female physicians consumed cigarettes, alcohol and/or drugs. This difference is not statistically significant (p = 0.235). Out of entire number of physicians involved in this study, 70.0% of doctors on-call and 53.3% of doctors not on-call actually used cigarettes, alcohol, and/or drugs, but this not a statistically significant difference (p = 0.288). 70.6% of male physicians and 34.9% of female physicians used cigarettes and/or alcohol. This difference is statistically significant (p = 0.027). 46.7% of the doctors who were on-call actually smoked cigarettes and/or drank alcohol, compared to 43.3% of doctors who were not on-call. However, the difference is not statistically significant (p = 0.288).

According to the Association of Anesthetists of Great Britain at the end of the last century, Lai J found that lifetime prevalence of clinically significant depression was19.3%. 33% of them suffered from serious stress and 6.8% suffered from severe stress (1). Additionally, research shows that incidence of suicide is more prevalent among anesthesiologists and surgeons compared with those who

practice some other specialty and general population, especially during this pandemia (1-10).

Occupational stress levels in our hospital are higher than reported for anesthesiologists and surgeons in other countries.

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#### **Transparency Declarations**

Conflict of interest: none to declare.

#### References

- [1] Lai J, Ma S, Wang Y. Factors associated with mental health outcomes among health care workers exposed to Coronavirus Disease 2019. JAMA Netw Open. 2020;3:e203976.
- [2] Adams JG, Walls RM. Supporting the health care workforce during the COVID-19 global epidemic. JAMA. 2020 March 12 [Epub ahead of print].
- [3] About Us: Facts and Statistics | Houston Methodist. Available at: https://www.houstonmethodist.org/newsroom/facts-statistics/. Accessed March 29, 2020.
- [4] Best in Texas | Houston Methodist. Available at: https://www.houstonmethodist.org/for-patients/why-choose-houston-methodist/national-recognition/. Accessed March 29, 2020.
- [5] Napoli DS-D. Houston company ranks No. 1 in Forbes list of best employers in Texas. KPRC. Published June 11, 2019. Available at https://www.click2houston.com/news/2019/06/11/hous ton-company-ranks-no-1-in-forbes-list-of-best-employers-in-texas/.Accessed March 29, 2020.
- 6] Centers for Disease Control and Prevention. Coronavirus Disease 2019 (COVID-19) Situation Summary. CDC.gov. Published March 27, 2020. Available at: https://www.cdc.gov/coronavirus/2019-ncov/cases-updates/summary.html. Accessed April 2, 2020.

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- [7] Centers for Disease Control and Prevention. Interim Pre-Pandemic Planning Guidance: Community Strategy for Pandemic Influenza Mitigation in the United States: Early, Targeted, Layered Use of Nonpharmaceutical Interventions. 2007. CDC; Available at: https://stacks.cdc.gov/view/cdc/11425. Accessed April 2, 2020.
- [8] Qualls N, Levitt A, Kanade N. CDC Community Mitigation Guidelines Work Group. Community mitigation guidelines to prevent pandemic influenza -United States, 2017. MMWR Recomm Rep. 2017:66:1–34.
- [9] Wilson M. The story behind "flatten the curve," the defining chart of the coronavirus. Fast Company. Published March 13, 2020. Available at: https://www.fastcompany.com/90476143/the-storybehind-flatten-the-curve-the-defining-chart-of-thecoronavirus. Accessed April 2, 2020.
- [10] Prairie C. State roundup: with a lack of compliance to social-distancing, Gov. Hogan orders all non-essential businesses shut. MarylandReporter.com. Published March 24, 2020. Available at: https://marylandreporter.com/2020/03/24/state-roundup-with-a-lack-of-compliance-to-social-distancing-gov-hogan-orders-all-non-essential-businesses-shut/. Accessed April 2, 2020.

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