

Safety-sensitive professionals, such as physicians, nurses, emergency personnel, police officers and firefighters, are often engaged in shift work and night duties. This work system may lead to them experiencing more sleep disturbances than fixed daytime workers. Insufficient sleep increases sensitivity to chronic stress, which are often experienced by these professions. The project focuses on identifying potentially modifiable risk factors which contribute to incidence of sleep disorders in these professions.

In the proposed project, we try to describe the reactivity of sleep to stress, chronotype and overcommitment to work as factors influencing the relationship between shift work, occupational stress and sleep among employees who perform tasks related to caring for the health and safety of others.

Our goal is to conduct a research project in two parts - an online questionnaire survey and one including objective sleep and subjective sleep and stress measurements. As part of the preparations for the second study, we will also adapt a questionnaire measuring the aspect of chronotype stability and the ability to overcome drowsiness. It has been shown that these two traits are associated with shift work tolerance. The questionnaire does not have a Polish version, while it is increasingly more often used internationally in research on biology of circadian rhythms.

The proposed project integrates subjective psychological and objective physiological aspects of the relationship between occupational stress, shift work and sleep. Further research is necessary to fill in gaps of knowledge on the aspects of this relationship. They will be targets of interventions about ways to cope with stress and sleep disturbances, together with preventing their negative consequences in shift work.