*Abstract 4:*

**Sleep patterns and their association with lifestyle factors among patients with ischemic heart disease attending the Cardiology Clinic at Teaching Hospital Jaffna**

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**Background and objective:** Ischemic heart disease (IHD) is a leading cause of morbidity worldwide, with several modifiable risk factors, including sleep pattern. Sleep patterns are influenced by various lifestyle factors such as stress, diet, physical activity, and substance use. While the association between IHD and sleep pattern is well established in many parts of the world, no related studies have been conducted in Sri Lanka, including in Jaffna. This study aims to describe sleep patterns and their association with lifestyle factors among patients with IHD attending the Cardiology Clinic at Teaching Hospital Jaffna.

**Methods:** This hospital-based descriptive cross-sectional study was conducted among 427 patients attending the Cardiology Clinic at Teaching Hospital Jaffna from October 2023 to February 2024. Participants were selected using a systematic sampling technique. Data were collected through interviewer-administered questionnaires covering sleep pattern and lifestyle factors such as diet, physical activity, alcohol consumption, tobacco use (both inhaled and smokeless), and screen time. Sleep pattern was classified as healthy and poor based on the healthy sleep score developed by Song et al. (2022). Data were analysed using SPSS version 26. The association of lifestyle factors with sleep patterns was assessed using the Chi-square test.

**Results:** Among the 427 participants, 40.5% were female and 59.5% were male. The study showed that 39.8% of participants had a healthy sleep pattern (sleep score $\geq 4$), while 60.2% had a poor sleep pattern (sleep score $\leq 3$). The use of smokeless tobacco products (p value=0.031) and using screens within one hour before sleep (p value=0.044) were found to have a statistically significant association with poor sleep patterns. No significant associations were observed between alcohol consumption, dietary patterns (including oil consumption), or physical activity and sleep patterns in this study.

**Conclusions and recommendations:** A significant proportion of patients with IHD exhibited poor sleep patterns. The use of smokeless tobacco and screen time before sleep were found to adversely affect sleep patterns. This research suggests that modifying lifestyle factors may help to promote healthy sleep patterns among IHD patients and reduce further exacerbation of the disease.

**Keywords:** Sleep pattern, Lifestyle factors, Ischemic heart disease, Teaching Hospital Jaffna.