**Abstrakt (AJ):**

The thesis focuses on the topic of treatment of sleep apnea with noninvasive ventilation.

The research deals with problems of sleep apnea and its role in the pathogenesis of many diseases. This work describes sleep laboratory methodology from baseline until completion of treatment which is ensured by two methods, with the help of sustained pressure. The goal of the research is to highlight the importance of sleep laboratory methodology in the treatment of sleep apnea. The research results confirm that the factors previously known, such as age weight and sex of the patient are responsible for the emergence of apnea.

To improve the outcome of the treatment and its tolerance it is important to set the correct pressure. The results do not clearly point to the factor which results in insufficient use of noninvasive ventilation during sleep.