















" PORTABLE NECK PILLOW WITH ASMR STIMULATION AS A SOLUTION FOR PEOPLE WITH SLEEP DISORDER AND ATTENTION DEFICIT DISORDER

# SIBALERA

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# INTRODUCTION

These sleep disorders have even led to an increase in market demand for an effective sleeping aid device, which according to variant market research, the global sleeping aids market size is estimated to reach \$96 Billion by 2024. Every year around 20% - 50% of adults are reported to have sleep disorders which can cause obesity, hypertension and attention disorders. The Autonomous Sensory Meridian Response (ASMR) has been proven to increase the functional connectivity of some parts of the brain that has a role in sleep quality and attention. Based on these problems, we designed SIBALERA; a portable neck pillow with ASMR stimulation as a solution for people with sleep disorders and attention deficit disorder.

#### **PROCEDURE**







d ANT

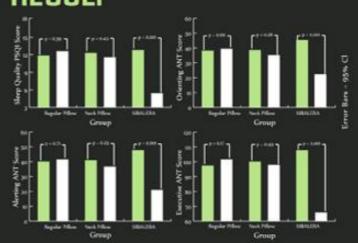


(Control group: Regular pillow; Intervention group t: Neck pillow; Intervention group 2: SIBALERA)



Pretest used PSQI and ANT

## RESULT



The PSQI questionnaire was used to measure sleep quality. In the group using SIBALERA there was a significant reduction in PSQI score (p<0.001) with a mean score of 5. These result indicates an excellent improvement of sleep quality.

ANT was the software used to measure attention function. ANT score showed a significant reduction (p<0.001) in the group using SIBALERA. This indicates a great improvement in attention function, both alerting, orienting, and executive.

#### PRODUCT



### PRODUCT EXCELLENCE

Choose Your Favorite AMSR Stimulation with Ease Access the internet easily through your Bluetooth-connected smartphone to get the best ASMR stimulation

Heavy Mode The internal speaker produces a soft, nice and clear sounds

> Silent Mode Specially designed for you who are accustomed to using earphones

Practically Is In Your Hand The powerbank feature will make you able to charge it anywhere and anytime



Low Budget, High Quality

#### FUTURE DEVELOPMENT

- Development of a neck pilow massage feature
- Development of design and cushion material that it easily folded and be more flexible
- The availability of a type C USB charging system
- Bigger battery capacity

# REFERENCES