

Good! Please proceed.

Biomedical Sleep Inducer

THE I-V LEAGUERS



2023

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Problem

Insomnia is a common sleep disorder that affects many of all ages. It is identified as an inability to fall asleep or stay asleep. It can lead to numerous problems, including fatigue, mood swings, and decreased productivity. Insomnia can be caused by various factors, such as sleep apnea (temporary cessation of breathing, especially during sleep) or major depression. Current treatment options, such as drugs and yoga, are not much effective. Furthermore, pills can lead to side effects and addiction, making it difficult to find a safe and effective solution for this condition.

Expected Goal

Our goal from this project is to develop an affordable and safe solution that can help insomnia patients to fall asleep faster and stay asleep longer without causing any side effects or addictions. This solution should be easily accessible to all individuals and provide long-term benefits to improve sleep quality and overall health.

Solution

As a solution for the issue of insomnia, we propose developing a small, affordable product that uses low-frequency magnetic fields to stimulate the brain's alpha waves and promote relaxation and deep sleep without the need of drugs or invasive procedures. The product is designed to be compact and easy to use, allowing patients to keep it near their bed without taking up much space. If possible, we aim to integrate smartphone technology, allowing users to control the device remotely and monitor their sleep patterns. The product will be developed using safe and effective technology, ensuring that it is suitable for all individuals. With this solution, we hope to provide an affordable, safe, and long-term solution for insomnia patients, improving their overall health and well-being.

Working principle

The working principle of the device involves creating a low-frequency magnetic field that interacts with the brain's electrical activity and stimulates the alpha waves, which are associated with relaxation and deep sleep. When the device is turned on, the magnetic field will create an electromagnetic environment around the user, inducing a sense of relaxation and sleepiness. This will help the user to fall asleep faster and stay asleep longer, without the side effects associated with sleeping pills. The device's low-frequency magnetic field will be safe and non-invasive and will not interfere with other electronic devices or medical implants.