

CHAPTER 6: Consciousness



Definition of Consciousness

- ◉ State of awareness of ourselves and our world
- ◉ It includes our thoughts, feelings, sensations, and perceptions
- ◉ States of consciousness

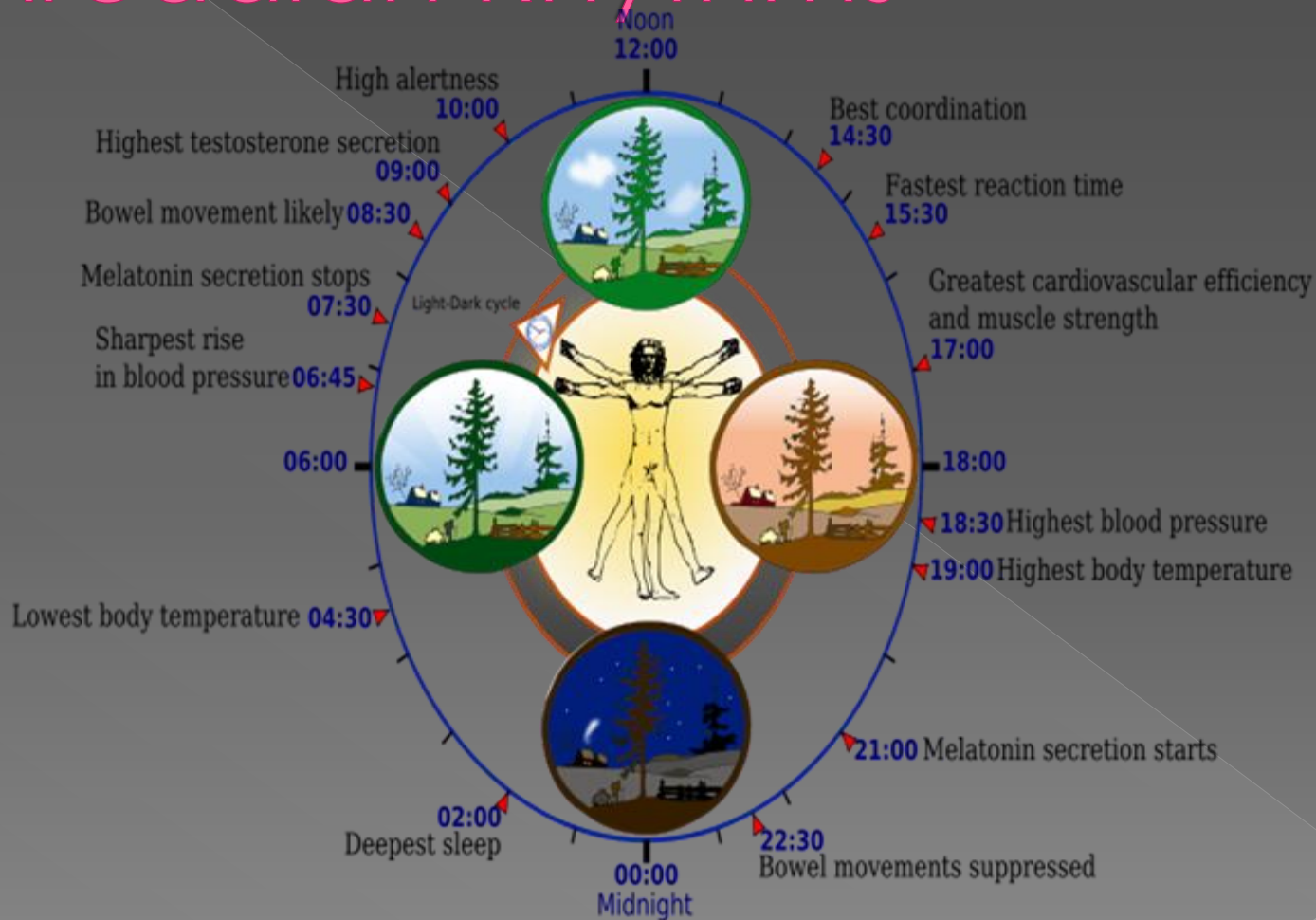
Levels of awareness



- ◉ Focused awareness
 - > Athletes in the “zone”
- ◉ Drifting awareness
 - > Day dreaming
- ◉ Divided consciousness
 - > Allows multi-tasking
 - > Dangers

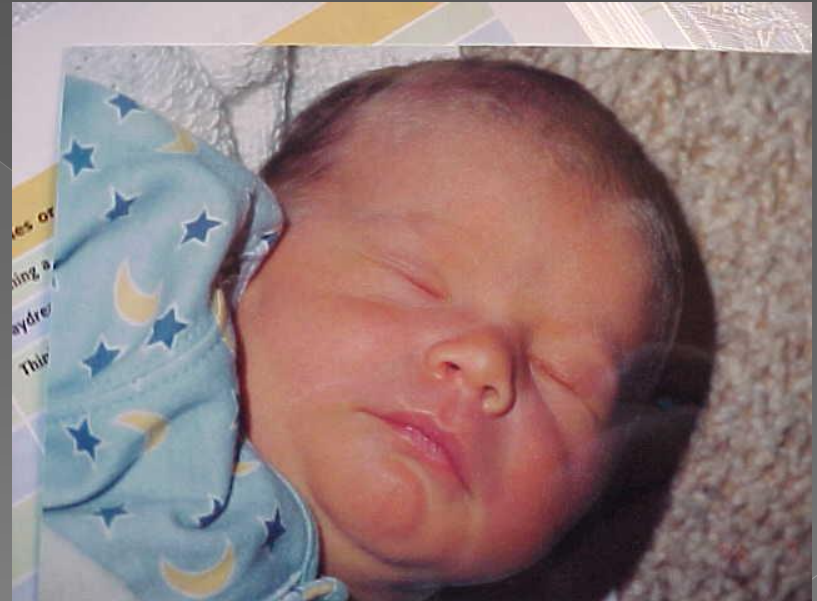


Biological Clock and Circadian Rhythms



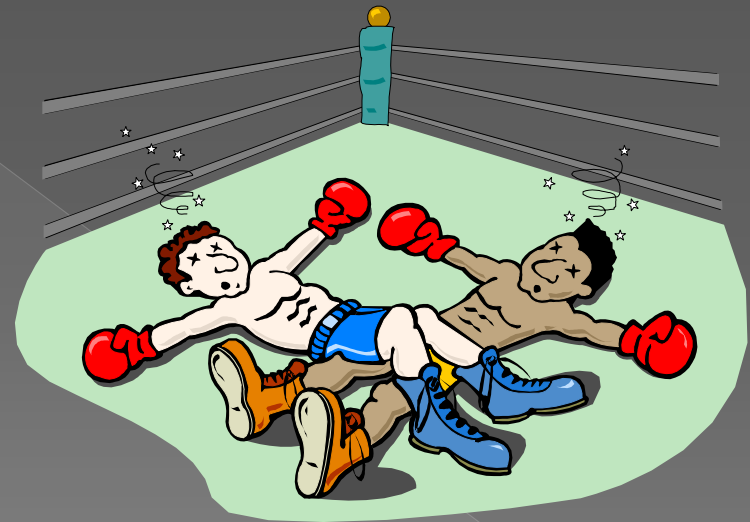
Unconsciousness

- ◉ Both sleep and dreaming are examples of unconsciousness
- ◉ Definition: lack of awareness of one's surroundings or loss of consciousness



Loss of Consciousness

- Head trauma
- Surgical anesthesia
- Coma



Altered States of Consciousness



- Daydreaming
- Meditation
- Hypnosis
- Drug use

State of Consciousness	Level of Alertness	Examples or Features
Focused awareness	High; fully awake and alert	Learning a skill, watching an exciting movie
Drifting consciousness	Variable or shifting	Day dreaming; mind wanders
Divided consciousness	Medium; attention divided between activities; multi-tasking	Talking on the phone while driving; doing homework & watching tv
Sleeping or dreaming	low	Person unaware of surroundings but may respond to some stimuli
Deep unconsciousness	None	Complete loss of consciousness due to head blow, surgery, coma
Altered state of consciousness	Variable	Change in consciousness due to drug use, medication or hypnosis

Sleeping and Dreaming

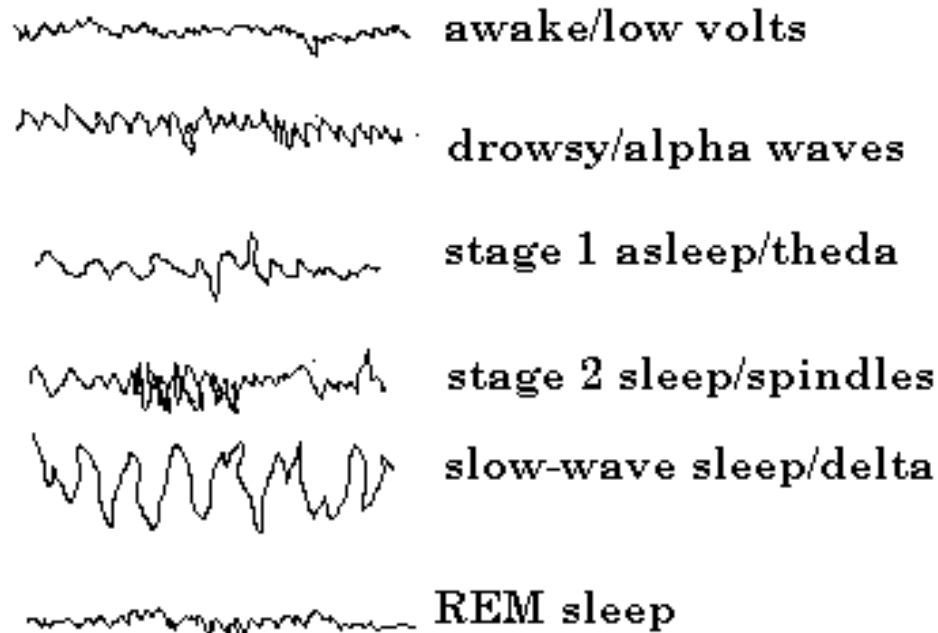


- One-third of our lives we are asleep; hypothalamus
- Circadian rhythms; melatonin
- Jet lag

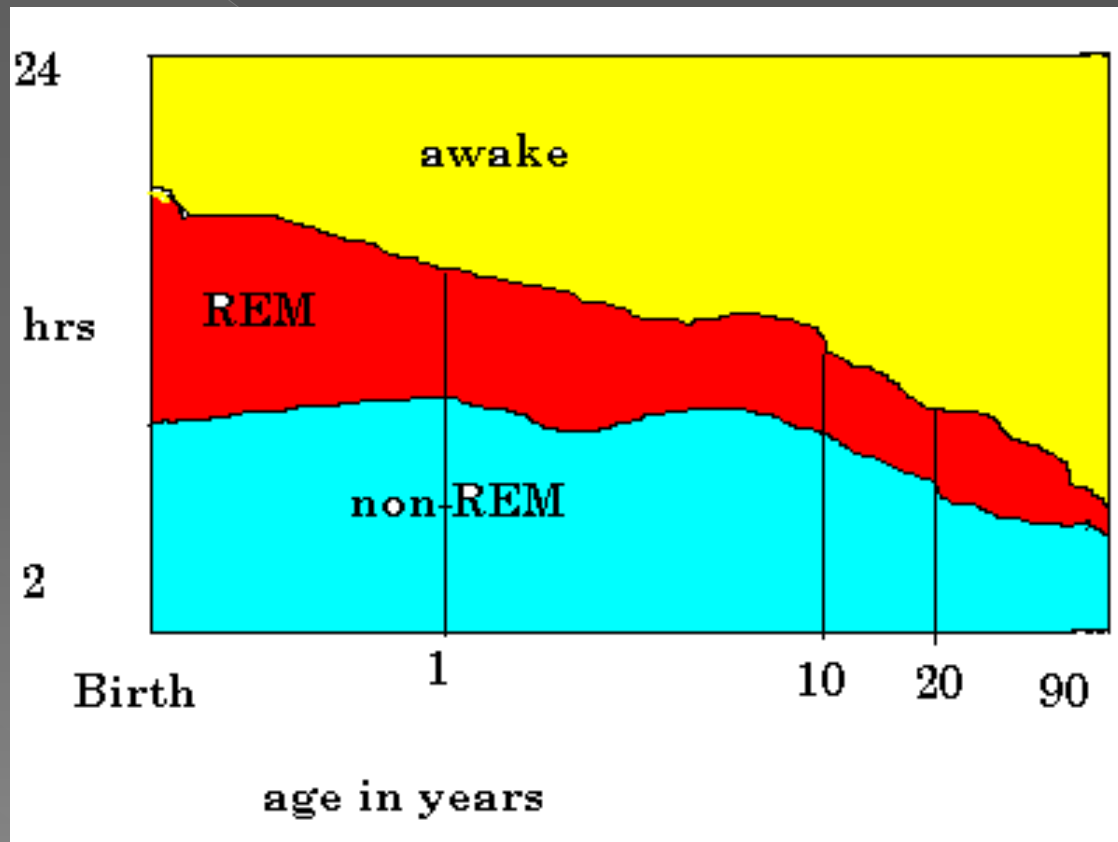
Wakefulness and Sleep

Stage of Wakefulness/ Stage of Sleep	Characteristic Brain Wave Pattern	Key Features
Alert Wakefulness	Fast, low-amplitude beta waves	State of focused attention or active thought
Relaxed Wakefulness	Slower, rhythmic alpha waves	State of resting quietly with eyes closed
Stage 1 sleep	Small, irregular brain waves with varying frequencies	Light sleep from which the person can be easily awakened
Stage 2 sleep	Sleep Spindles	Deeper sleep, but the sleeper is still readily awakened.
Stage 3 sleep	Large, slow delta waves	Deep sleep (delta sleep or slow-wave sleep); difficult to arouse the sleeper
Stage 4 sleep	Dominance of delta waves	Deepest level of sleep
REM sleep	Rapid, active pattern, similar to that in alert wakefulness	Sleep where the brain is more active but muscle activity is blocked; dreams

Brainwave Patterns During Wakefulness and Sleep



Changes in Sleep Patterns



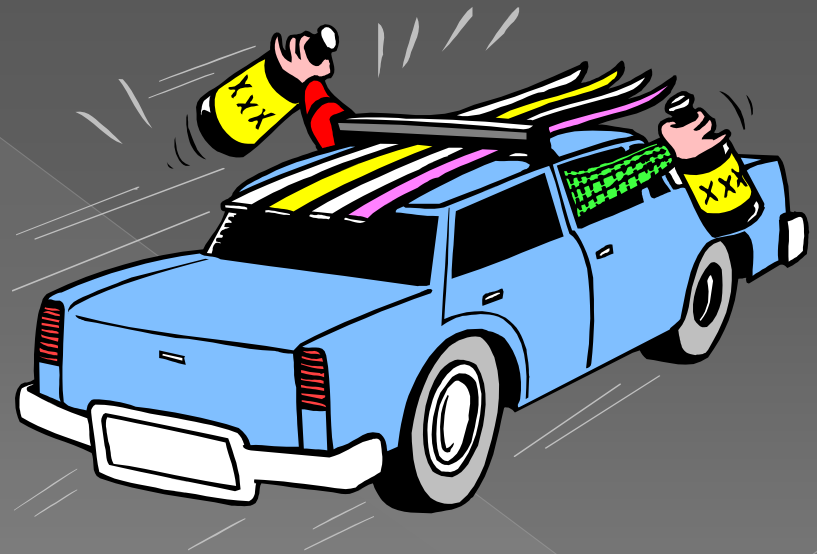
Freud and Dreams

- ◉ Dreams = wish fulfillment
- ◉ The royal road to the unconscious
- ◉ Manifest versus latent
- ◉ Symbols



Sleep Deprivation

- Need for sleep varies
- The life cycle
- Accidents



Sleep Disorders

- Insomnia
- Narcolepsy
- Apnea
- Sudden infant death syndrome
- Sleepwalking
- Night terrors



Insomnia

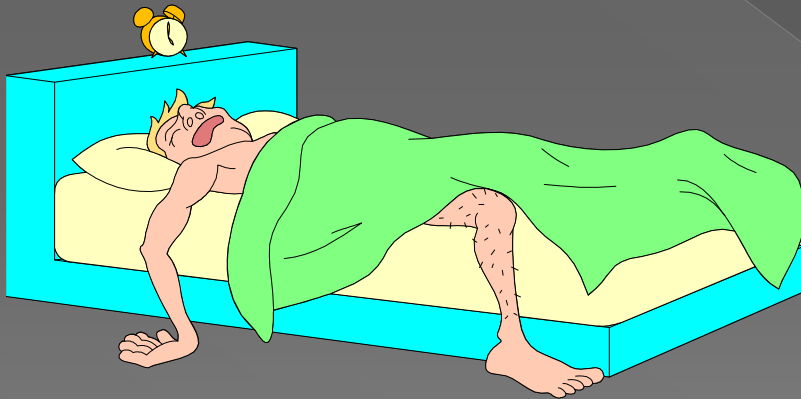
- Insomnia affects 15% of the adult population
- 3 types:
 1. Trouble getting to sleep
 2. Trouble staying asleep
 3. Trouble returning to sleep after awakening

Characteristics of Insomnia Sufferers

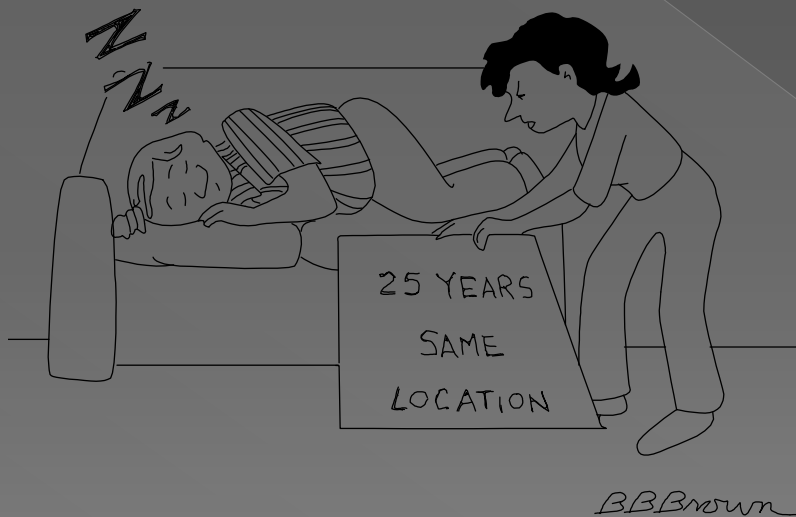
- Higher levels of autonomic nervous system activity
- Higher anxiety levels
- More tension in the forehead
- More concerned about physical complaints

Using Drugs to Induce Sleep

- Sleeping pills and arousal
- Habituation and tolerance



Things You Can Do to Sleep Better



- Practice relaxation techniques
- Avoid ruminating (worrying)
- Establish a regular routine

Narcolepsy

- A mirror image of insomnia
- Rapid onset of REM sleep
- May last up to 15 minutes
- Dangers

Sleep Apnea



- Stop breathing as many as 500 times a night
- An anatomical deformity
- Risks: hypertension, high blood pressure

Nightmare Disorder



- Disturbing nightmares that are very vivid and intense
- Common themes: falling, fleeing
- REM sleep

Night Terrors



- ◉ More intense than nightmares
- ◉ They occur in deep sleep, not REM sleep
- ◉ Affects boys and men more
- ◉ Delayed stress connection

Sleepwalking



- More common among children than adults
- Persistent sleepwalking is an indication of a sleep disorder
- Occurs in deep sleep

Sudden Infant Death Syndrome (SIDS)

- Crib death or SIDS kills up to 7,000 children each year in the U.S.
- Causes
- Monitoring infants

What is Considered Abuse?

- 3 criteria listed by the American Psychiatric Association

1. Pathological use

2. Impairment of occupational or social functioning

3. Lasts one month or more



Drug Dependence

- Physiological dependence
- Withdrawal/abstinence syndrome
- Tolerance



Physical Dependence vs. Psychological Dependence

- Physical dependence = caused by repeated usage that changes body chemistry
- Psychological dependence = a pattern of habitual or compulsive use of a drug in order to satisfy a psychological need

Depressants



- Alcohol
- Opiates/opioids
- Barbiturates
- Slow the activity or the central nervous system

Alcohol



- Alcohol is associated with lower productivity, loss of employment, and downward social mobility

The Effects of Alcohol

- ◉ Alcohol is a CNS depressant
- ◉ It deadens minor aches and pains
- ◉ It impairs cognitive functioning
- ◉ It reduces coordination and impairs information processing

Consequences of Chronic Drinking



- Heart disease
- High blood pressure
- Brain damage
- Cirrhosis of the liver
- Fetal Alcohol Syndrome

Treatment of Alcoholism

- Detoxification/abstinence syndrome
- Disulfuram/Anabuse
- Alcoholics Anonymous
- Behavior therapy, aversion therapy, instruction in social skills

What Is Hypnosis?



- A form of altered consciousness in which a person becomes highly suggestible
- A subject does not exercise critical-thinking skills

What Hypnosis Is Not

- It is not the same as sleep
- It is not the same as a drug-induced state
- It is not like any other altered state of consciousness

What Hypnosis Can Accomplish

- ◉ Unusual feats of attention control
- ◉ Psychosomatic regulation
- ◉ Risk = Cognitive dissociation

Components of the Unconscious Mind

- ◉ Immoral urges
- ◉ Shameful experiences
- ◉ Selfishness
- ◉ Fears, violent motives
- ◉ Unacceptable urges

How Does It Work ?

- ◉ Subject allows the hypnotist to guide and direct
- ◉ A person may be made aware or unaware of certain things
- ◉ A subject becomes highly receptive and responsive to suggestions

Inducing a Trance



- Braid method
- Eye method
- Machine method

Can You Be Made to Do Something Against Your Will?



Hypnosis, Part 2

Posthypnotic suggestions

How Do Posthypnotic Suggestions Work?

- Suggestions to remember when the trance has ended
- Helps change unwanted behaviors (smoking, overeating)

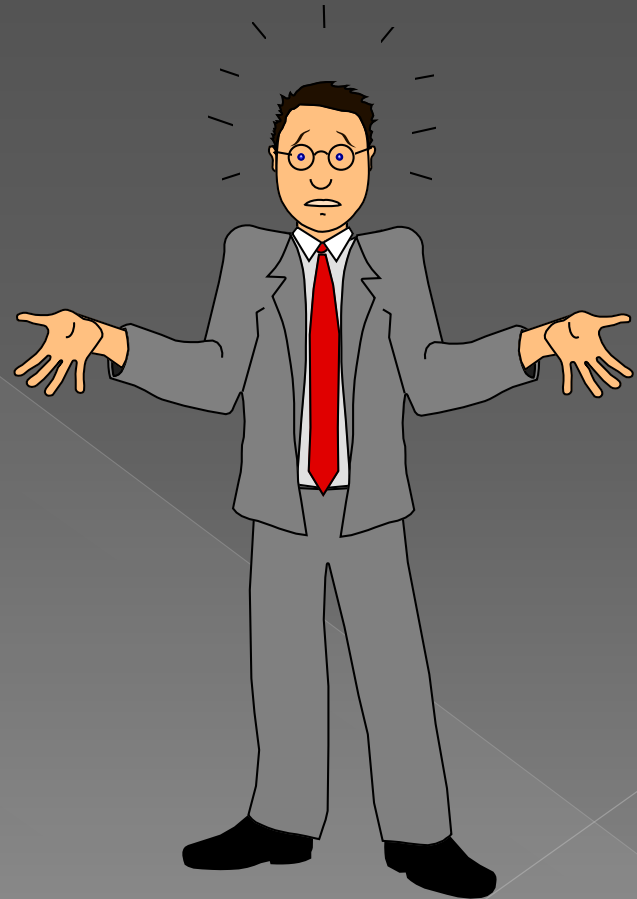


Value of Hypnosis

- ◉ Anesthesia
- ◉ Sensory manipulation
- ◉ Extraordinary strength?
- ◉ Age regression
- ◉ Hyperamnesia

Dangers of Hypnosis

- Dissociation
- Conversion symptoms and psychosomatic illnesses



Best Subjects

- ◉ Teens or those in their early 20s
- ◉ Above average IQ
- ◉ 85% of this group can be hypnotized

Poor Subjects

- ◉ Introverted
- ◉ Hysterical
- ◉ Insane
- ◉ Stubborn

Meditation

- A set of techniques intended to create an altered state of consciousness
- Helps reduce anxiety and tension
- Focus is provided by a word, sound, or object/mantra
- Alpha waves