

#AddictionAware

Understand the signs. Reduce the stigma.

Pine Richland School District | 2023

Ellen O'Brien
Gaiser
CENTER

Leading
Recovery
Since 1971

A Question We Will Revisit



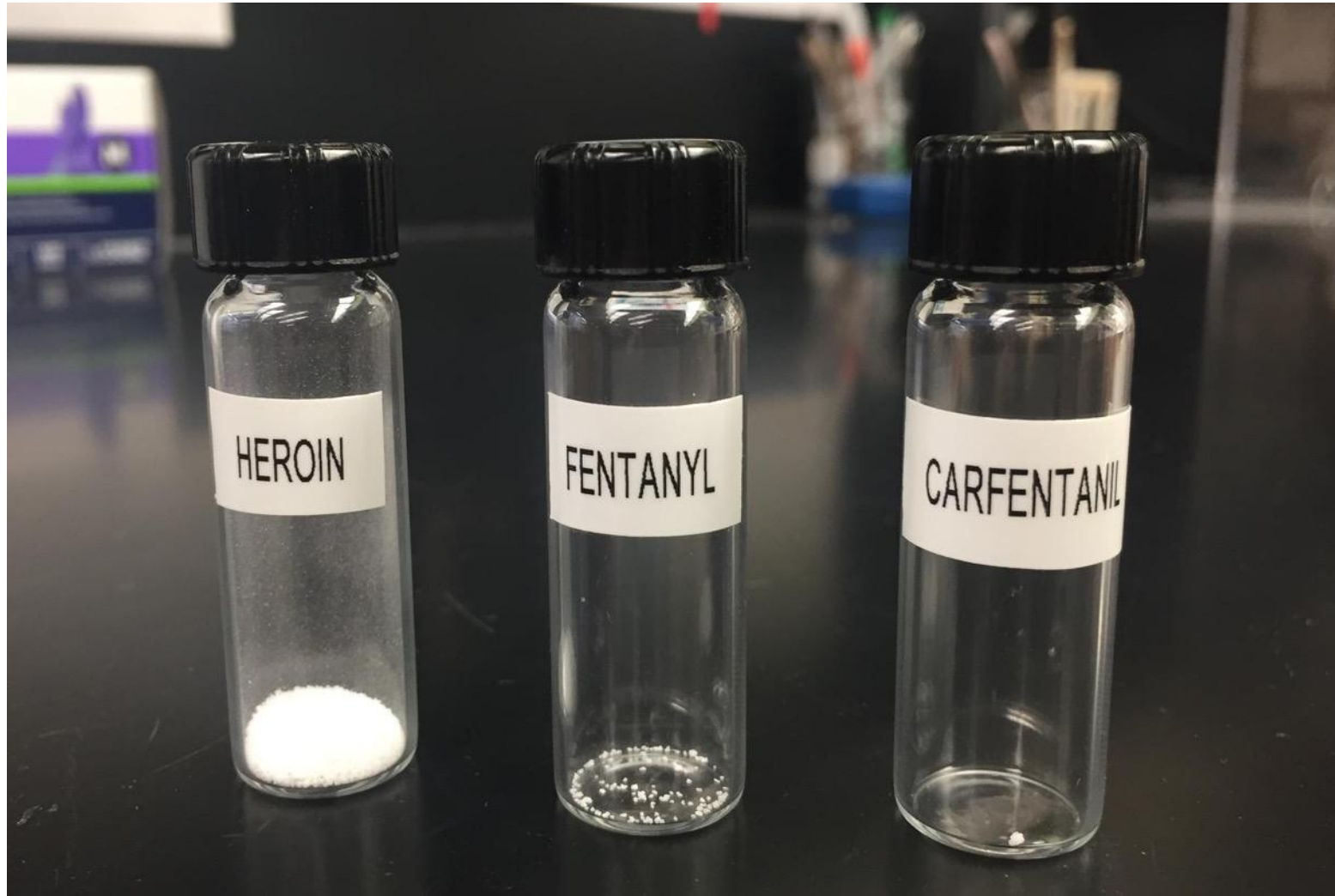
Addiction... Is it a **DISEASE** or is it a **CHOICE**?

- Codeine
- Hydrocodone
- Oxycodone
- Nubain
- Buprenorphine
- Methadone

- Morphine
- Demerol
- Dilaudid
- Heroin
- Fentanyl
- Carfentanil

Papaver Somniferum





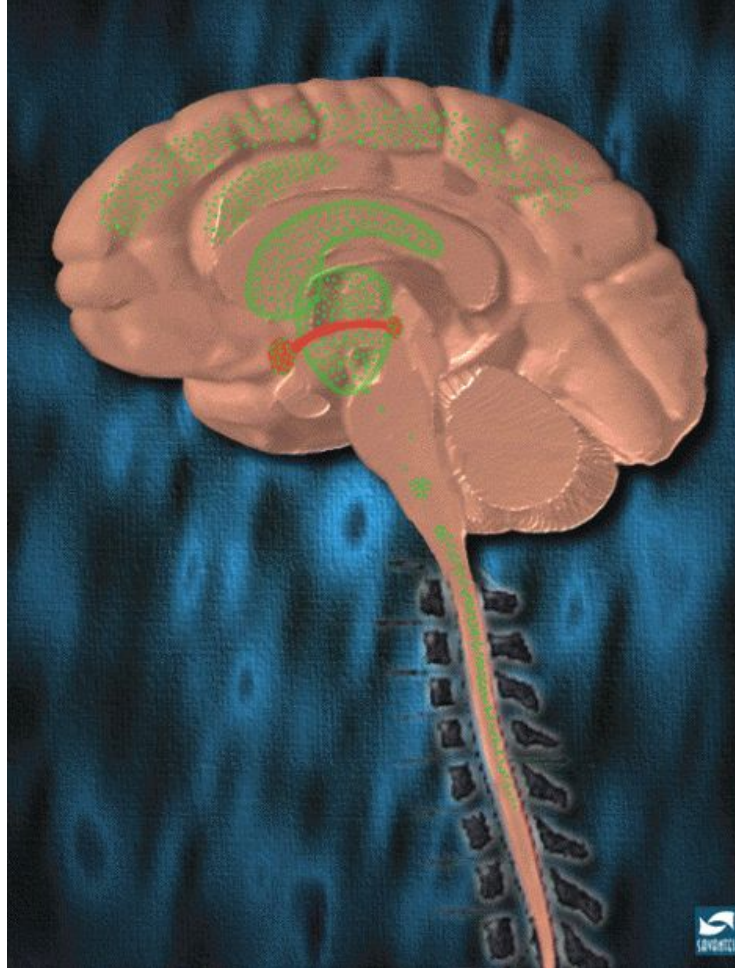
Classic Opiate Toxidrome

1. Pinpoint pupils
2. Decreased responsiveness
3. Depressed respirations*



Opiate use or overdose is one of the most common causes of **pinpoint pupils**.

Substances of abuse effect...



Limbic System = The Caveman Brain

- Food
- Water
- Procreation (having children)
- Safety / Shelter



Pleasure, Reward, Happiness

Prefrontal cortex vs limbic system

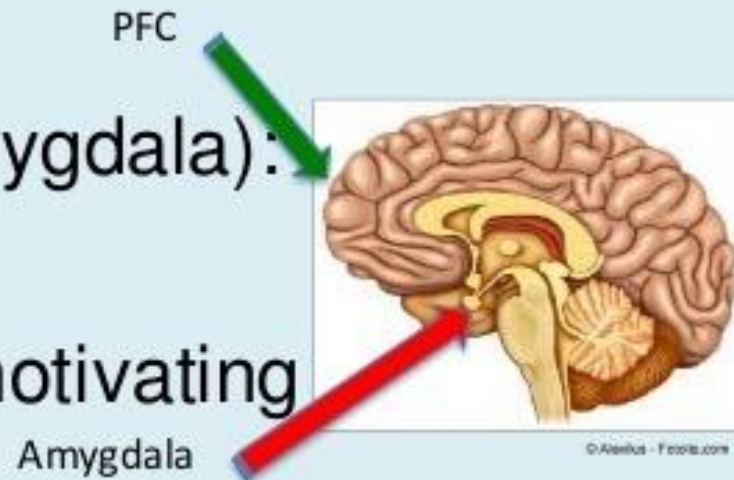
Prefrontal cortex:

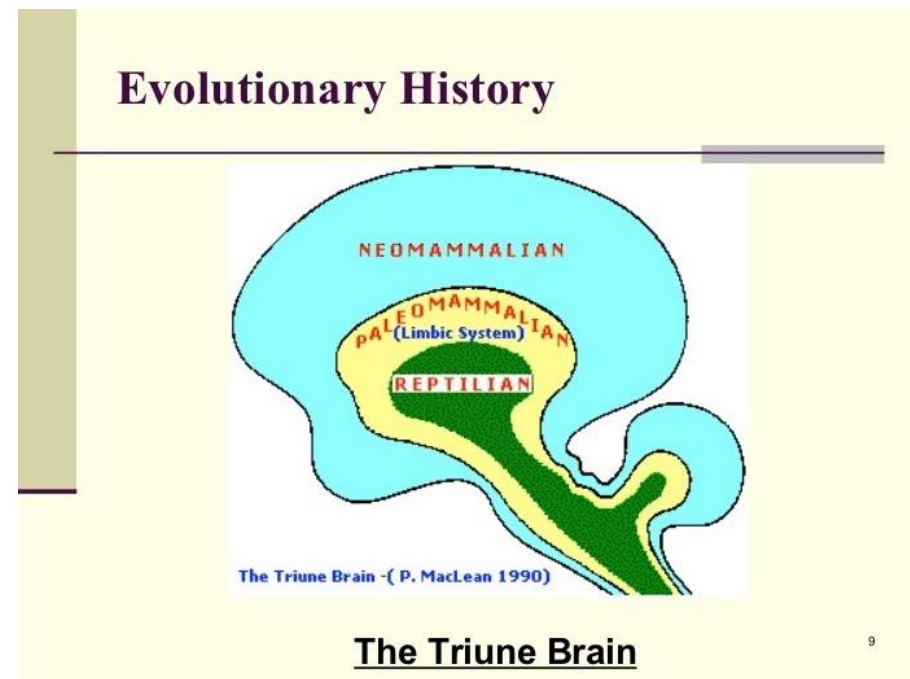
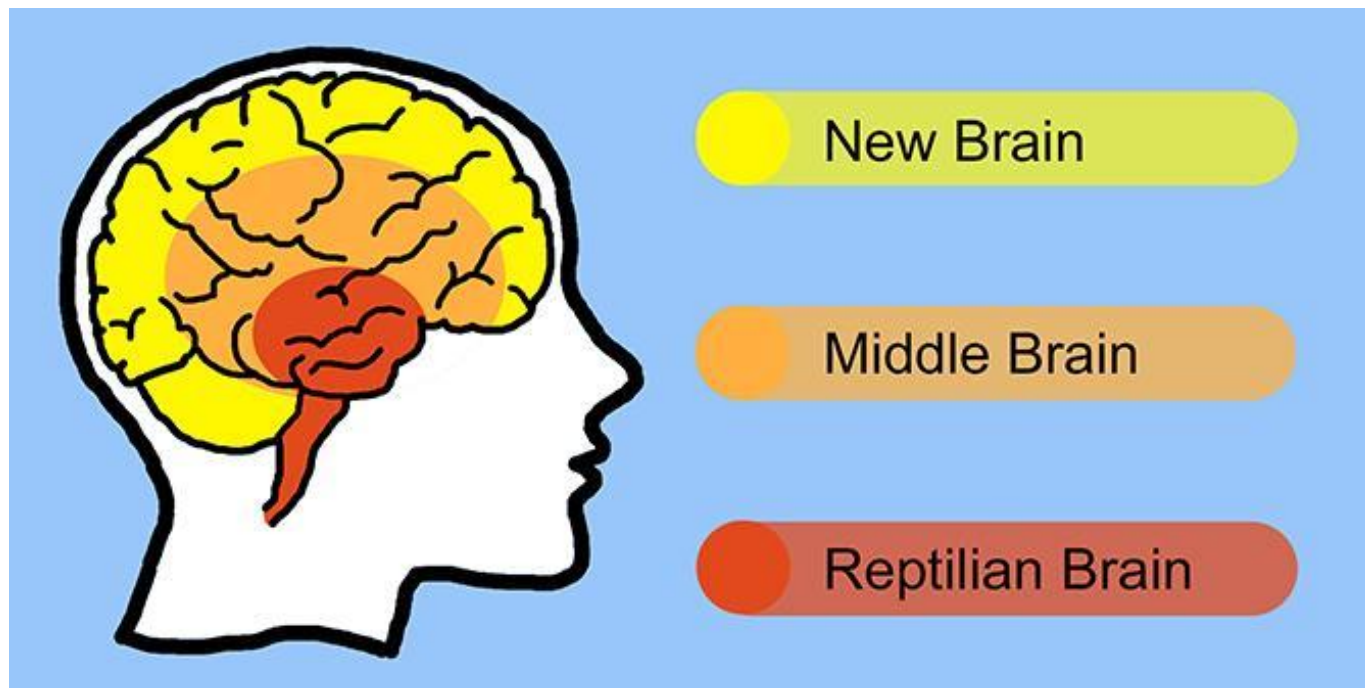
- Control: reason, logic, prediction, analysis, impulse control, moral values, decisions

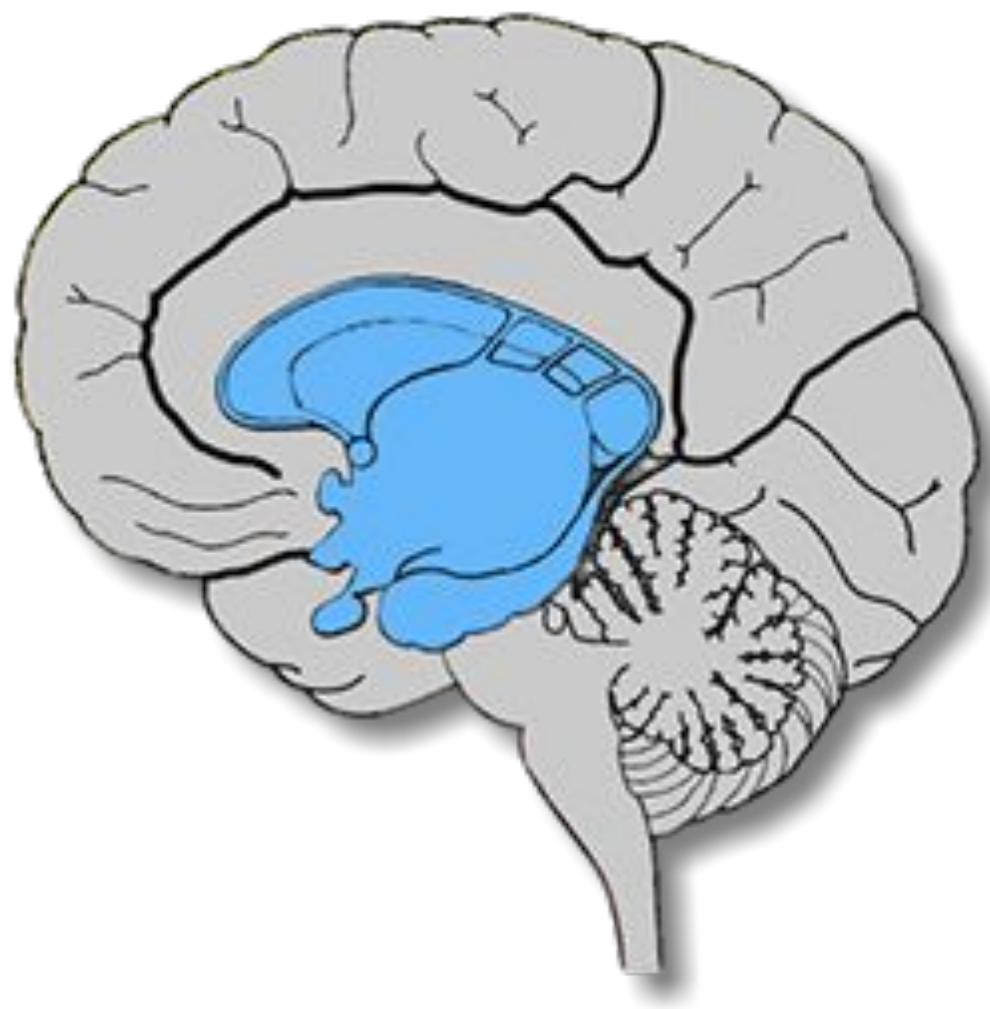
Limbic system (inc amygdala):

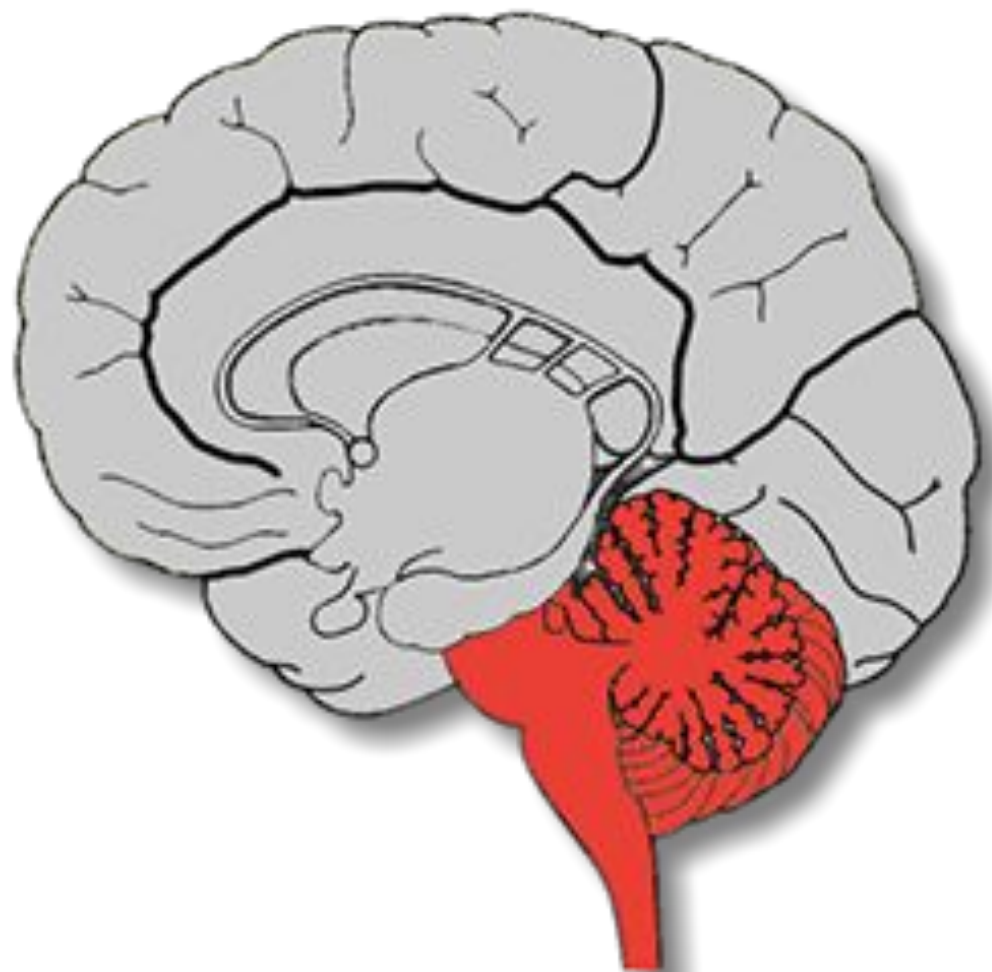
- Emotions + instinct:

Reactive, impulsive, motivating

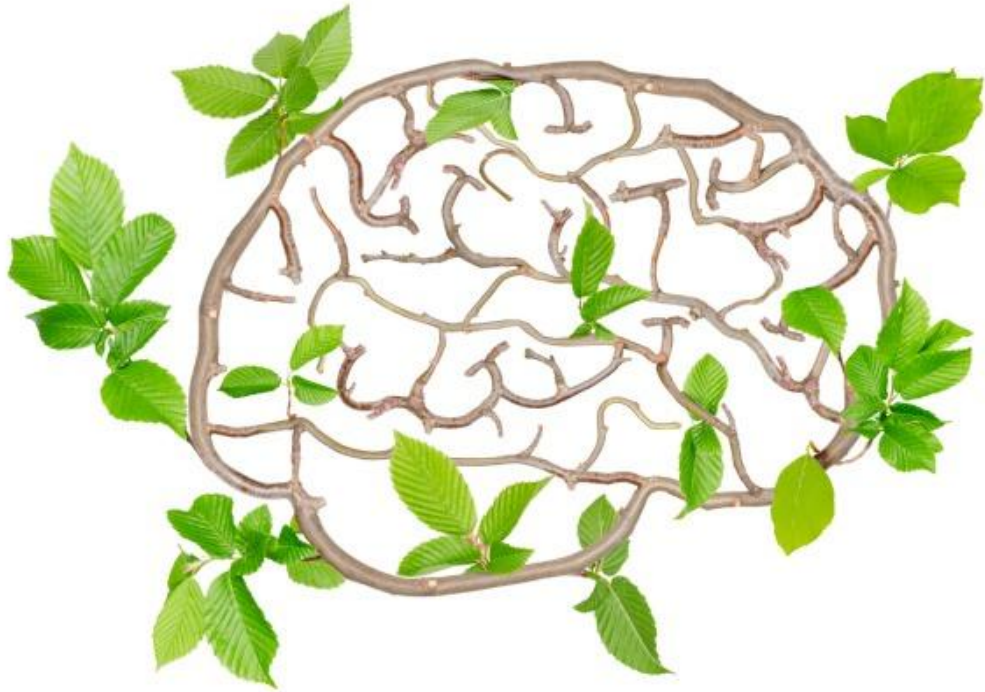




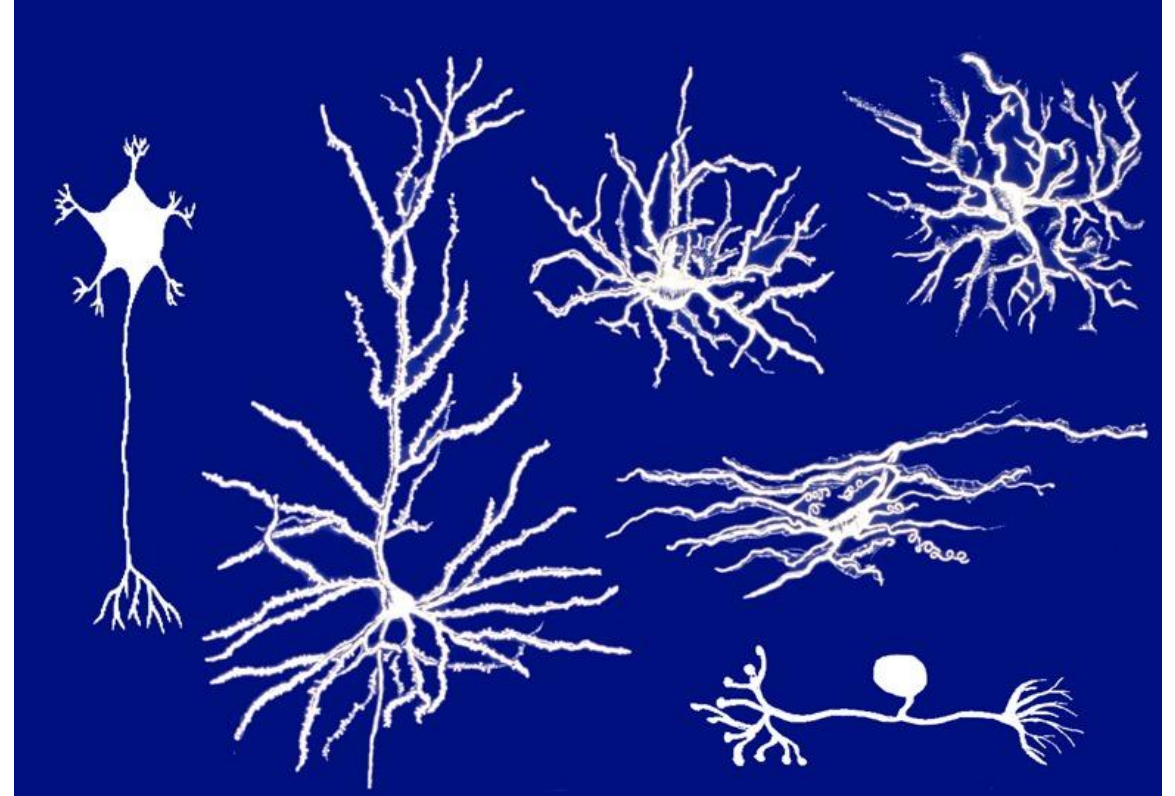




Neuroplasticity



Neurons



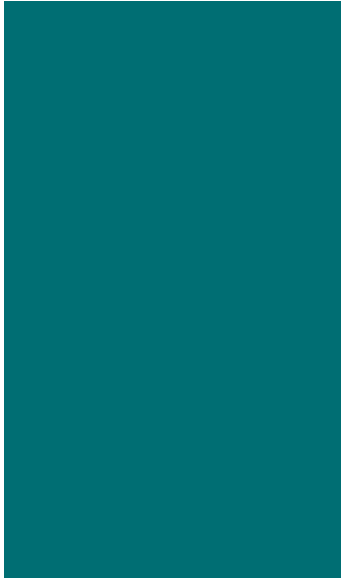
The brain continually reorganizes itself by forming **new neural connections** throughout life.

This phenomenon is known as **neuroplasticity.**

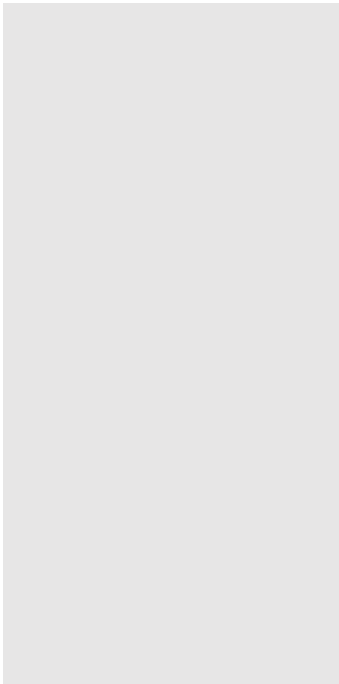


Functional Neurochemistry

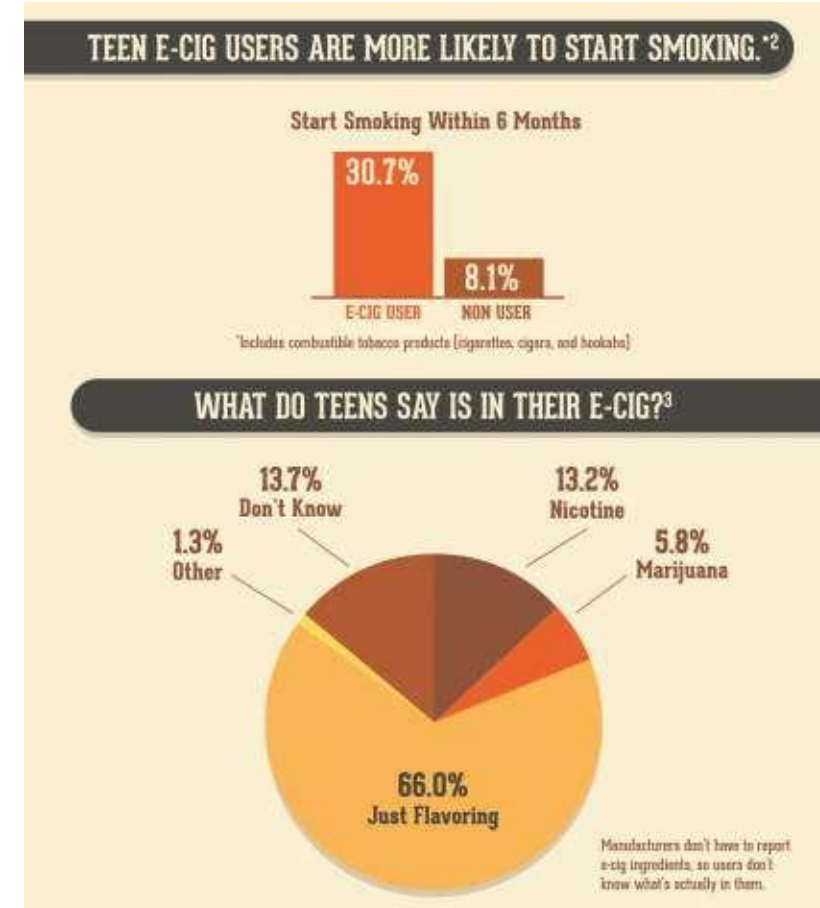
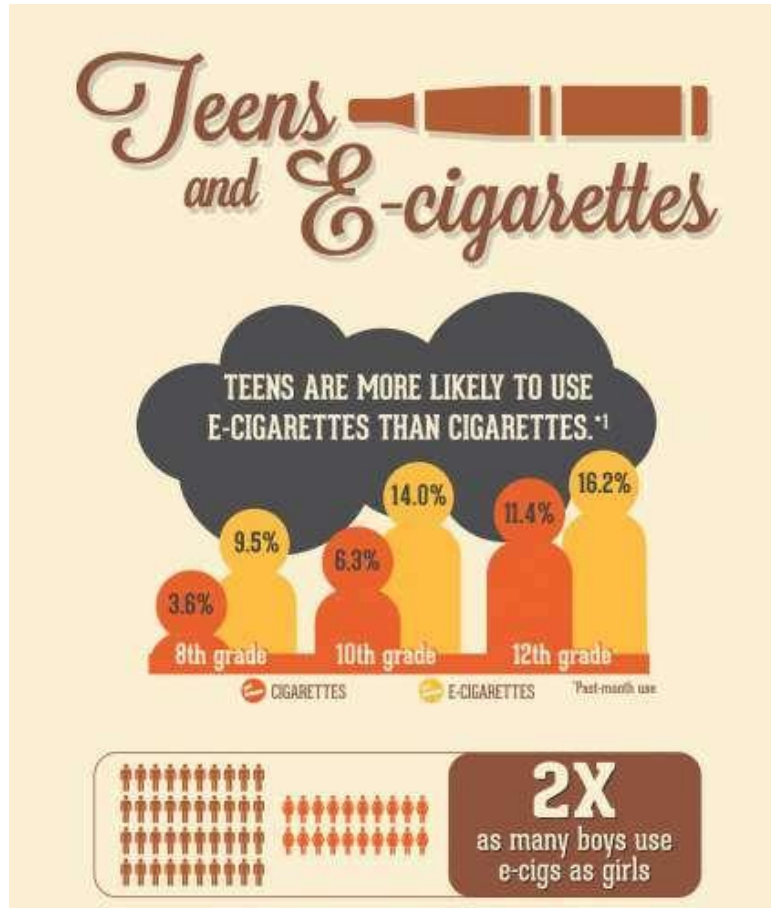




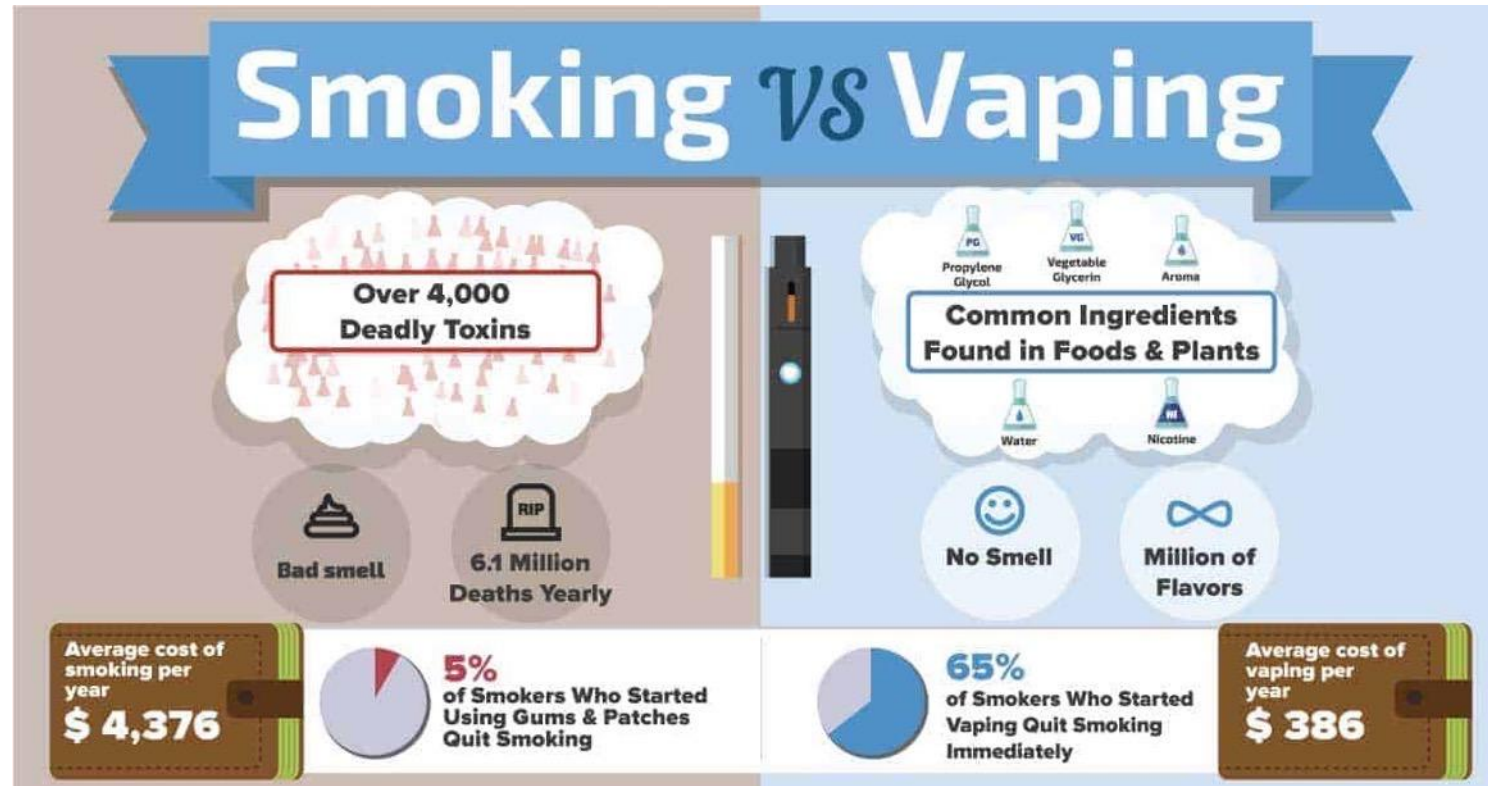
JUUL
SMOKING EVOLVED



Vaping Facts



Smoking versus Vaping



Main Ingredient = **NICOTINE**

False Advertising?

IS VAPING BAD FOR YOU?

VAPORIZERS

- Contain no tar
- Produce no carbon monoxide
- Four ingredients
- No second hand smoke
- No stink



CIGARETTES

- Tar
- Carbon Monoxide
- Thousands of chemicals
- Second hand smoke
- Stink

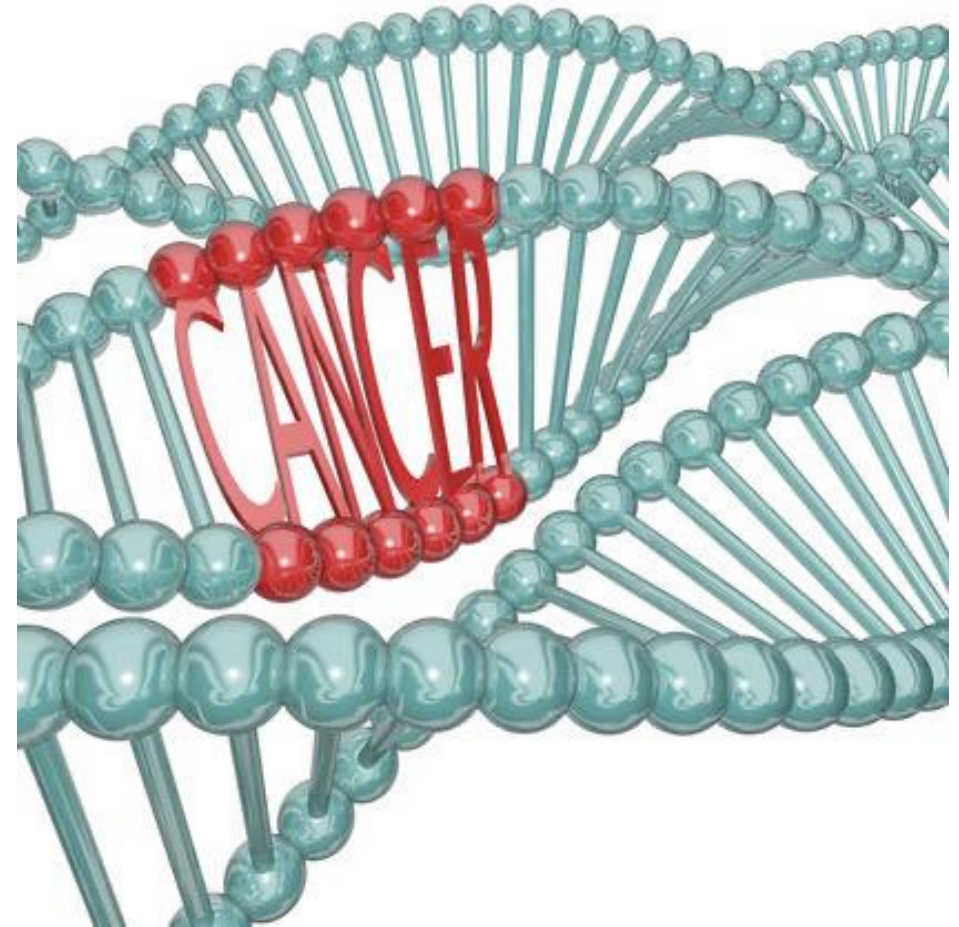


Both can contain nicotine and nicotine is an addictive chemical.

Veppo.

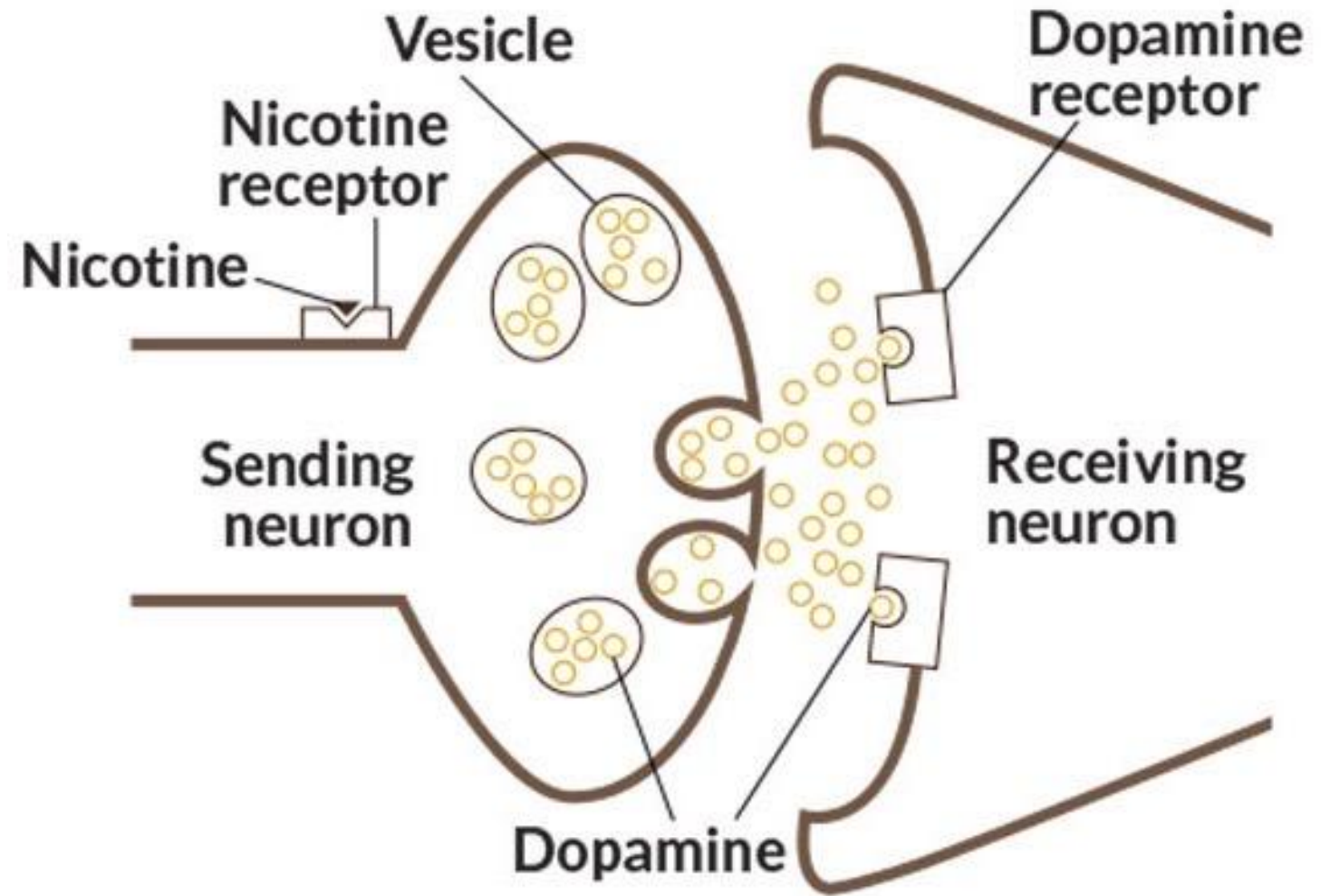
List of Carcinogens

- Acrylonitrile
- Acrolein
- Propylene Oxide
- Benzoic Acid
- Acrylamide
- Crotonaldehyde



Nicotine

Why so Addictive?



All Vaping / Juuling...

- Restricted Brain Development
- Less neurons in PFC
- No FDA regulation (2022)
- Insulin Resistance
- Hypertension (leading to...)
- Carcinogens



What about Juuling?



Juuling

- Nicotine level = 5% (versus 2.5%)
 - Nicotine Salt (versus base)
 - Increased Benzoic Acid



Vs.

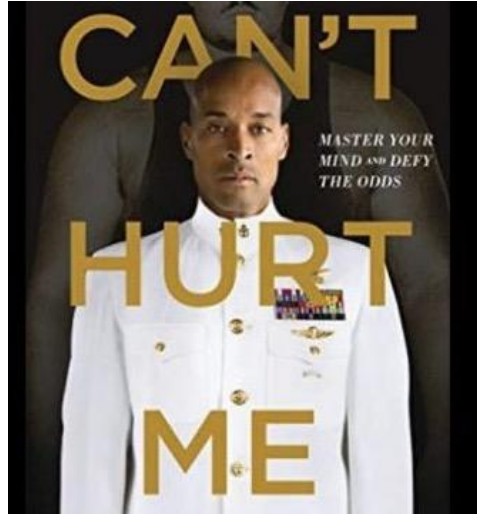


Marijuana a Gateway?

- Can someone be addicted?
- What's more likely to happen in a marijuana user?
- New Zealand IQ study



Neuroplasticity to your Advantage



Is it a DISEASE or is it a CHOICE?

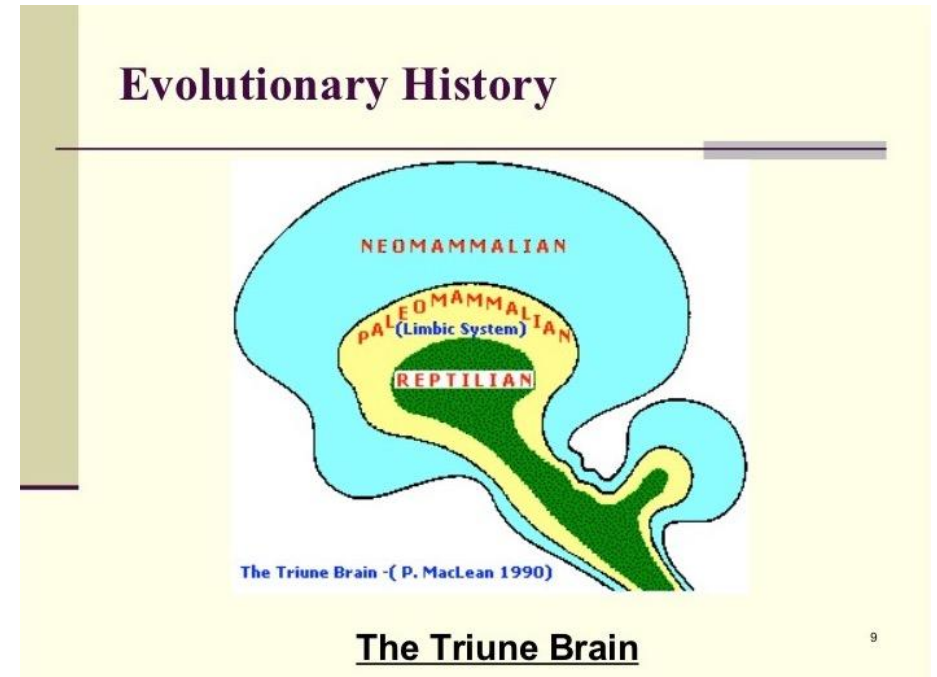
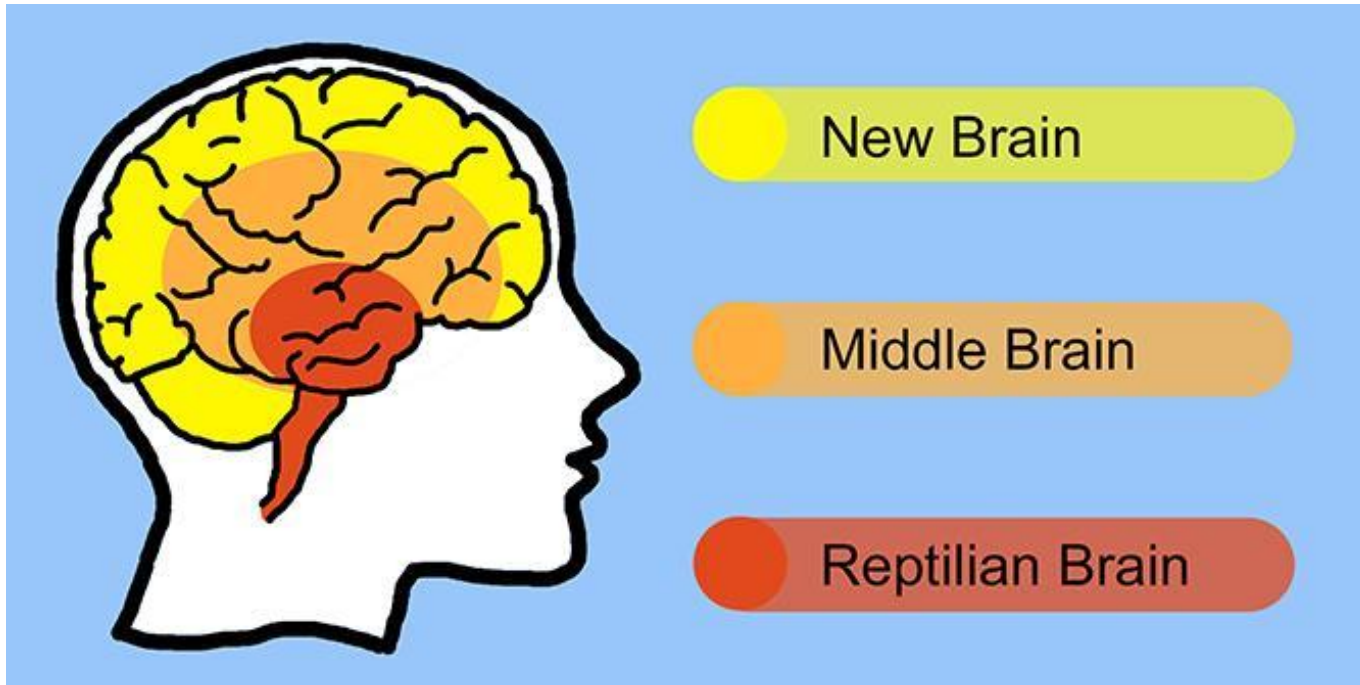


Does that matter?

What about mental health?

- Why do we discuss addiction and mental health together?
- How does one impact the other and vice versa?
- Is it a coincidence that BOTH are on the rise?

MENTAL HEALTH ARISES FROM.....



AND THAT MATTERS BECAUSE....

Signs of Dysregulated Nervous System

- Excessive worry / fear
- Excessive sadness
- Low energy
- Mood swings (highs / lows)
- Irritability / anger / aggression
- Confusion / problems concentrating
- Inability to manage daily stressors

Signs of Substance Use in Teens

- Changes in personality / attitude
- Changes in friends / hangouts / hobbies
- Isolating / Avoiding
- Drop in attendance at school / work / sports
- Breaking rules / Risk taking
- Secretive or suspicious behavior
- Changes in appetite / appearance / sleep
- Legal trouble
- Resisting help

How to Help

- Check in with each other
- Be Compassionate
- Recognize the signs someone is struggling
- Do not engage when someone's "lid is flipped"
- Seek out a trusted adult

Regulating our Nervous System

- Sleep
- Healthy diet
- Movement
- Music
- Writing
- Art
- Interact with others
- Yoga
- Mindfulness
- Deep breathing
- Positive Self-talk
- Practice Compassion

Main Take-Home Points

- An addict has an imbalance of brain neurochemistry
 - Once the first dose starts, brain changes BEGIN
- Mental Health and Addiction; a tangled web, navigate carefully
 - Neuroplasticity; use it to accomplish YOUR goals!
 - If we reduce addiction, everyone's life improves

Resources

Internal Resources

- Safe 2 Say

Text 723-2729 |

safe2saypa.org/for-students

- Staff members (guidance counselors, teachers, paraprofessionals & others)
- Glade Run therapists

Mental Health/Drug & Alcohol Resources

- Glade Run Lutheran Services 724.452.4453 | gladerun.org
- The Care Center/SPHS - Provides individual therapy for drug and alcohol 724.234.1370 | sphs.org
- Gateway Counseling Center - Provides drug and alcohol and mental health services 1.800.472.1177 | gatewayrehab.org/services/adolescent-programs
- Charlie Health - Provides mental health and substance use telehealth services 1.866.491.5196 | charliehealth.com
- Butler Crisis Hotline (for 24/7 help) 1.800.292.3866 or text 63288
- 211 Pennsylvania Get Connected. Get Help.™ (for 24/7 help) pa211.org

**If you are struggling to find help or seek help, please call the Gaiser Center.
We will work to help you get connected with the type of help you are seeking.
Call 724.287.8205 x122**

Ellen O'Brien
Gaiser
CENTER

Leading
Recovery
Since 1971

gaisercenter.com

Thank You!

