

Nicotine (Vaping / Smoking / Dipping) Education



Presented by:
David Fialko, BS, NCTTS, ICPS



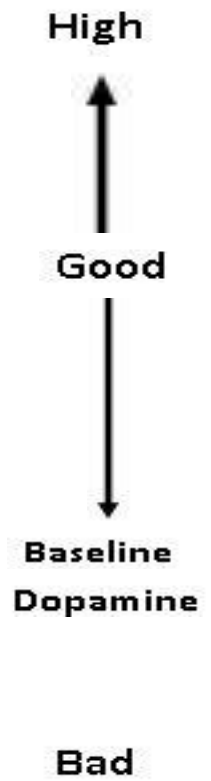
Training Goals

1. Provide parents with information regarding addictive properties of nicotine-based products
2. Discuss current and future health risks associated with nicotine use
3. Discuss cessation (quitting) resources –
Note: NRT for minors should be a discussion with a medical doctor.

Nicotine

- 80 percent of smokers do it primarily to self-medicate emotional problems.
 - They are using cigarettes to cope with anxiety, stress and negative emotions.
- Months or years after giving up, we still crave nicotine because, as with any drug, repetition, tolerance and habituation results in brain changes.
- Nicotine improves concentration and performance on tasks that demand these.
- Nicotine provides an increase in dopamine (Bodies “natural happy drug”) also acts as a stimulant
- Nicotine use begins with it feeling pleasant and fitting in / social acceptance or feeling “independent” and adult like.
- The “pleasant” feeling is the hook.....

Nicotine



Effect of Nicotine on Learning

- Nicotine raises pulse & heart rate. Brain tests same as when people are **agitated**.
 - It also constricts arteries and vessels!
- Nicotine cravings occur frequently within 15 to 30 minutes after last vape / cig
- Strong cravings will begin about every **2 hours**.
- Students who smoke may have more challenges learning and trouble concentrating due to withdrawal symptoms.



Effect of Nicotine on Body

- Increased risk of **cardiovascular, respiratory**, gastrointestinal disorders.
- **Decreased immune response** and it also poses ill impacts on the reproductive health.
 - Epigenetics!
- Nicotine affects the cell proliferation, oxidative stress, **apoptosis**, DNA mutation by various mechanisms which leads to cancer.
 - Affects the tumor proliferation and metastasis and causes resistance to chemo and radio therapeutic agents.

Effect of Nicotine on Body (COVID 19)

- A UCSF study showed that smoking almost doubles the rate of COVID 19 progression
- “Experts” still are unsure regarding smoking and acquisition of COVID 19
- Common diseases amongst smokers:
 - Chronic Obstructive Pulmonary Disease (COPD)
 - Heart disease
 - Blood vessel disease

Effect of Nicotine on Body (COVID 19)

- Macrophages
 - Alveolar macrophages are the cleaner of the lungs
 - Clearing air space of infectious, toxic and or allergic particles that have evaded the mechanical defenses of the respiratory tract
- Two macrophages found in your lungs
 - One that fights viruses
 - One that prevents tissue damage
- These are what protect the lungs and body from viruses overtaking the lungs

Nicotine Vs. Exercise?

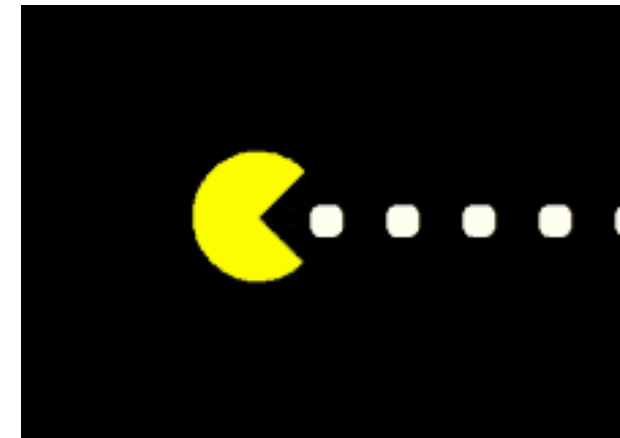
What's the difference?

- The healthy heart only has to work under pressure for brief intervals, several hours of strength / cardio training per week.
 - Heart becomes stronger with a lower resting heart rate
- Nicotine results in high blood pressure for extended periods throughout the day, seven days a week.
 - Dependency increases frequency
 - Heart becomes weaker with a higher resting heart rate
- Exercise stimulates the production of new blood vessels!
 - Improving blood delivery
- Nicotine also promotes the growth of new blood vessels BUT also stimulates tumor growth and the build up of plaque inside arteries.
 - Tumor enhancer qualities of Nicotine allowing tumors to grow much more quickly which are more densely packed with blood vessels feeding the tumor.

Nicotine Stimulates New Blood Vessel Formation; Also Promotes Tumor Growth And Atherosclerosis
July 31, 2001
Source: Stanford University School of Medicine

Effect of “Vaping” on The Lungs

- Macrophages
 - Alveolar macrophages are the cleaner of the lungs
 - Clearing air space of infectious, toxic and or allergic particles that have evaded the mechanical defenses of the respiratory tract
- Two macrophages found in your lungs
 - One that fights viruses
 - One that prevents tissue damage
- These are what protect the lungs and body from viruses overtaking the lungs



Transition From E-cigs (ENDS) to Tobacco Products

A study by the University of Pittsburgh Schools of the Health Sciences found that young adults who use e-cigarettes are more than four times as likely to begin smoking tobacco cigarettes within 18 months as their peers who do not vape.



Puff Bars

- Were banned for flavoring
- They came back using synthetic Nicotine to skirt FDA deeming/regulations.



All PuffBar products listed on this website contain nicotine but do not contain tobacco or anything derived from tobacco. PuffBar products are not intended for use with any tobacco product or any component or part of a tobacco product.

WARNING: PuffBar products are not intended to diagnose, treat, cure, or prevent any disease, condition, or disorder and are not smoking cessation or nicotine replacement therapy products. The FDA has not reviewed these products, nor has it evaluated their safety or any of the statements made regarding these products. PuffBar products contain nicotine, which is a highly addictive substance, and are intended to be used only by adults at least 21 years of age who use combustible cigarettes or other tobacco or nicotine vaping products. Do not use PuffBar products if you are pregnant or nursing, if you have heart disease, high blood pressure, diabetes, ulcers, liver or kidney disease, throat disease, asthma, or difficulty breathing. Do not use PuffBar products if you are taking theophylline, ropinirole, or clozapine. As with other nicotine products, use of PuffBar products can increase your heart rate and blood pressure and may cause nausea or dizziness or aggravate existing respiratory conditions. Use of PuffBar products may expose you to certain chemicals identified as harmful and/or carcinogenic, including aldehydes, volatile organic compounds, and metals.

⚠️ WARNING: PuffBar products can expose you to chemicals including glycidol, which is known to the States of California to cause cancer, and nicotine, which is known to the State of California to cause birth defects or other reproductive harm. For more information, go to www.P65Warnings.ca.gov.

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Suorin Disposables

WHOLESALE SUORIN KITS & PODS ▾ E-LIQUIDS ▾ BRANDS ▾ DISPOSABLE VAPE ▾ REPLACEMENT PODS / COILS / BATTS. ▾ ALTERNATIVE ▾

ADULT SIGNATURE NOW REQUIRED ON ALL DELIVERIES. [CLICK HERE FOR MORE DETAILS.](#)

WARNING: This product contains nicotine. nicotine is an addictive chemical. **21+Only**



DISPOSABLE E-CIGS

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SALE**



SIXT PRO DISPOSABLE -
4000 PUFFS
\$15.00 ~~\$17.95~~

"WARNING: This product contains nicotine. Nicotine is an addictive chemical."



Suorin Air Bar Box
Disposable E...
\$15.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical."



FLUM FLOAT Disposable
E-Cigs - P...
\$16.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical."



Suorin Air Bar Max
Disposable E...
\$16.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical."



VFUN D1 Disposable
E-Cigs - Pack...
\$10.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical."



Hyde Plus Color Edition
Disposab...
\$14.95

SUORIN LIMITED EDITION

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SOLD OUT**



Suorin Air V2 Navy
Special Editi...
\$19.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SOLD OUT**



Suorin Drop Metallic
Prism Blue ...
\$27.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SOLD OUT**



Suorin Air V2 Ice Blue
Special E...
\$19.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SOLD OUT**



Suorin Air V2 Sunset
Purple Spec...
\$19.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **Trending**



Suorin Air V2 Hollywood
Red Spec...
\$19.95

"WARNING: This product contains nicotine. Nicotine is an addictive chemical." **SOLD OUT**



Suorin Air V2 Navy
Special Editi...
\$19.95

Tanks

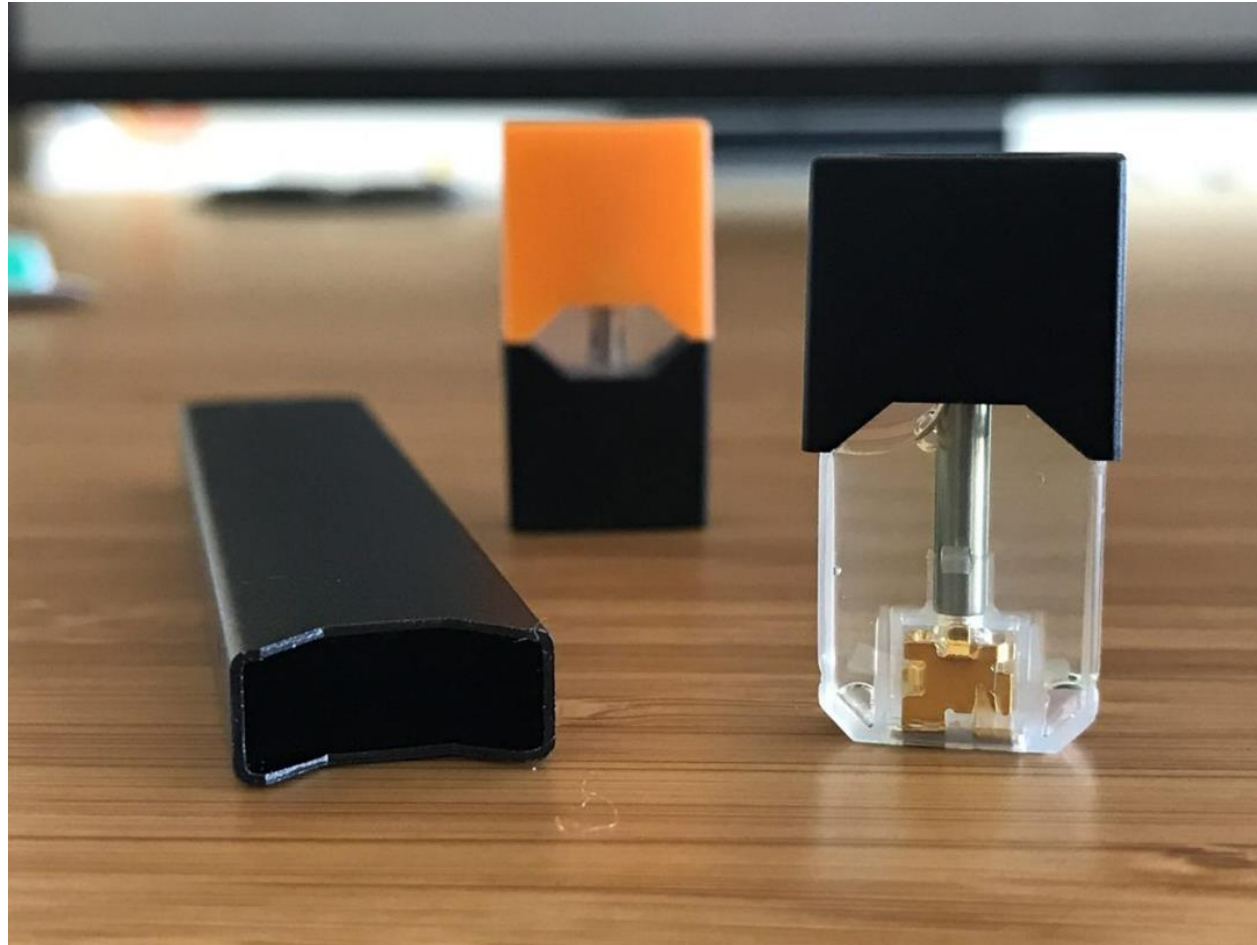
- Offers extra power to personal vaporizers
- Bigger battery
- Power and voltage customizable for a cooler vape, warmer vape or more vape volume
- Generally used by advanced users

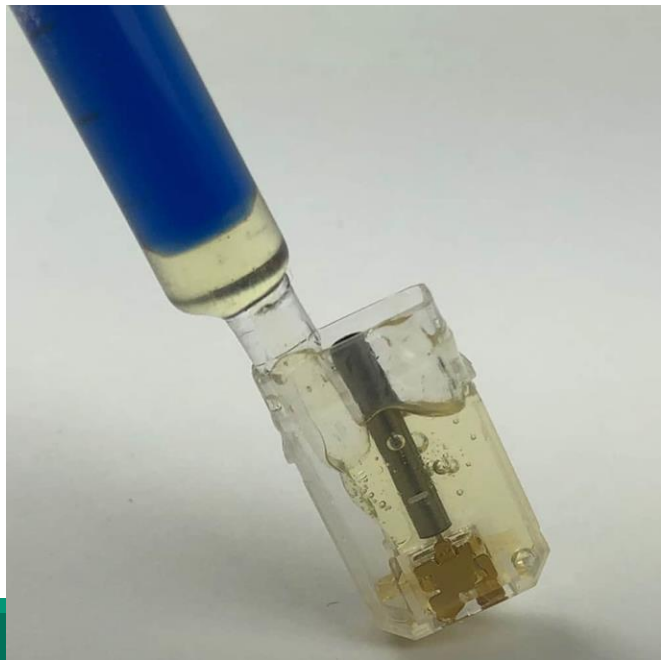
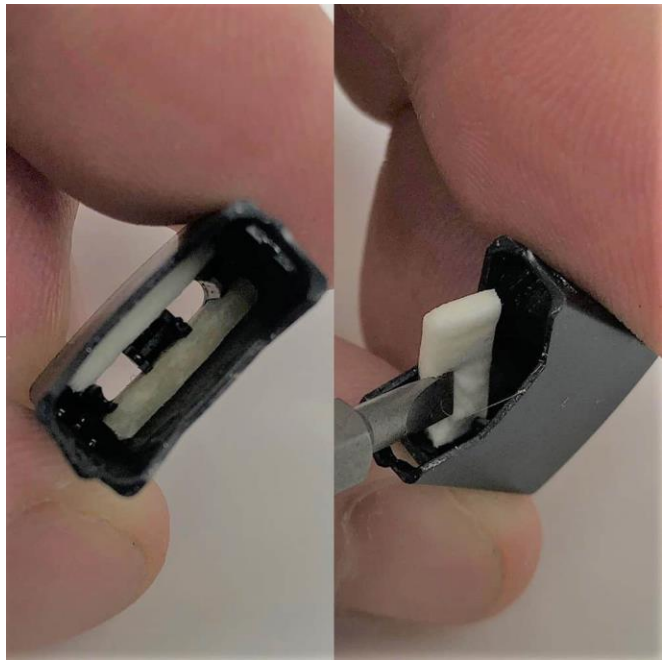


Vape Hoodie



JUUL





Cessation Options

Nicotine Replacement Therapies & Rx options

Goal is to be nicotine free in 3 to 4 months.

- FDA Approved NRT forms
 - Gum – short acting
 - Lozenges- short acting
 - Patches – long acting
- FDA approved prescription medication
 - Chantix (varenicline tartrate)
 - Zyban (bupropion hydrochloride / wellbutrin)



Verywell / Gary Ferster

Therapy	Mechanism of action	Dosage and duration	Efficacy compared to placebo or other therapies	Side-effects and special cautions	Precautions
Nicotine Replacement Therapies					
Patch Gum Lozenge Inhaler Nasal Spray	Reduces nicotine withdrawal symptoms	<p>PATCH</p> <ul style="list-style-type: none"> Dose: 21, 14, 7 mg/24 hours Duration: Up to 12 weeks <p>GUM</p> <ul style="list-style-type: none"> Dose: 2 & 4 mg/ up to 24 pieces/day Duration: Up to 12 weeks <p>LOZENGE</p> <ul style="list-style-type: none"> Dose: 2 & 4 mgs; up to 20/day Duration: Up to 12 weeks <p>INHALER</p> <ul style="list-style-type: none"> Dose: 6-16 cartridges/day Duration: Up to 6 months <p>NASAL SPRAY</p> <ul style="list-style-type: none"> Dose: 8-40 doses/day Duration: 3-6 months 	Effective in reducing withdrawal symptoms during tobacco abstinence and increases the odds of quitting for 6-12 months by 1.5-to-2 times	Local irritation (i.e., mouth sores, skin rash, nasal and throat irritation) associated with the route of administration of the medication (i.e., mouth—gum, lozenge, inhaler; skin—patch; nasal irritation—nasal spray). Sleep disturbance is common for those using the 24-hour nicotine patch. Nausea, dizziness, and rapid heartbeat can occur in some patients who concurrently smoke and use medication.	NRT should be used cautiously among patients who are within 2 weeks of an acute myocardial infarction, those who have significant arrhythmias, and by those who report worsening symptoms of angina. Pregnancy category C (nicotine gum) and category D (transdermal patches, inhalers, and spray nicotine products).

Therapy	Mechanism of action	Dosage and duration	Efficacy compared to placebo or other therapies	Side-effects and special cautions	Precautions
Non-Nicotine Replacement Medications					
Bupropion SR	Bupropion is a selective dopamine/norepinephrine reuptake inhibitor which seems to help modulate negative mood states and lowers the intensity of cravings to smoke.	<p>Dose: Start 1-2 weeks before quit date with 150 mg every morning for first 3 days, then take 150mg twice daily</p> <p>Duration: Up to 12 weeks with maintenance lasting up to 6 months</p>	Bupropion increases the odds of smoking cessation twofold compared to placebo.	Dry mouth and sedation, insomnia	Not recommended for patients with a history of seizure disorders, current substance abuse, or other conditions that may lower the seizure threshold. Serious neuropsychiatric events, including but not limited to depression, suicidal ideation/ attempts, and completed suicide have been reported in patients taking bupropion for smoking cessation. Pregnancy category C.
Varenicline	Partial nicotine receptor agonist that reduces nicotine withdrawal symptoms by stimulating dopamine release and blocking the uptake of nicotine in the brain.	<p>Dose: Start 1 week before quit date with a 0.5mg tablet every morning for first 3 days; on days 4-7 take 0.5 mg tablet twice daily; Day 8 to the end of treatment take a 1 mg tablet twice daily</p> <p>Duration: Up to 12 weeks with maintenance up to 6 months</p>	Varenicline increases the odds of smoking cessation threefold compared to placebo.	Nausea, sleep disturbances, and headache. Constipation, flatulence, and vomiting	Recent reports to the FDA have linked the use of varenicline to increased risk of cardiovascular events and suicidal thoughts, depression, and aggressive and erratic behavior. A recent report has noted a possible association between varenicline and cardiovascular events. Pregnancy category C.

Sources: Adapted from Cummings KM, Mahoney MC. Strategies for smoking cessation: what is new and what works? Expert Review of Respiratory Medicine 2008; 2:201-213; Mahoney MC, Hyland A. Tobacco Cessation. In: South-Paul J, Matheny SC, Lewis EL, eds. Current Diagnosis & Treatment in Family Medicine, 2nd ed. New York, NY: McGraw-Hill, 2007, 626-633.

Short Acting ^{vrs} Long Acting Nicotine Replacement Therapies (NRT)

1. Patches: Long Acting

- It helps prevent the urge to smoke for up to 24 hours
- Step System To Quitting
 1. Step 1 - 21 mg
 2. Step 2 – 14 mg
 3. Step 3 – 7 mg

2. Gum / Lozenges

- Gum: Chew 1 piece of gum every 1-2 hours for the first 6 weeks of your quit.
- Lozenges: Use at least 9 lozenges per day for the first 6 weeks.

Action of Patches & Gum / Lozenges



Behavioral Support

- It helps the individual understand behaviors / feelings associated with quit attempts
- Provides access to others who are also attempting to quit.
 - Peer support
- Provides hope and self identified (internal) motivation to quit

Evaluation

[https://docs.google.com/forms/d/e/1FAIpQLSfgG86GsW6S2YGDDv8HS2TjCSicDIpqbRoJQd16LWCNin_xag/viewform?usp=sf link](https://docs.google.com/forms/d/e/1FAIpQLSfgG86GsW6S2YGDDv8HS2TjCSicDIpqbRoJQd16LWCNin_xag/viewform?usp=sf_link)

Resources

PA Free Quitline

1-800-QUIT-NOW (784-8669)

1-855-DEJELO-YA (335-3569)

www.2morrowhealth.net/BCHIP

Text2Quit.com

Nicotine Anonymous

1-877-879-6422

DeterminedToQuit.com



Quit Vaping

An App For Teens And Young Adults

Private · Personalized · Effective

Are you looking for help to quit vaping? Learn different ways to deal with the urge to vape that will make quitting easier.

Sign up for free at www.2MorrowHealth.net/BCHIP

About the Program

- Core lessons and exercises
- Bonus lessons
- Practice awareness and take action
- Receive text-based messages
- Earn a certificate of completion

Sponsored by



Bucks County Health Improvement Partnership
DELAWARE VALLEY UNIVERSITY
BCHIP

The advertisement features a background image of four diverse young adults smiling. A smartphone in the foreground displays the app's interface, which includes a progress bar, a 'VAPING' title, and a 'The Scoop' lesson. The app also shows a '7 TODAY' counter and a '7' below it. The 2Morrow Health logo is visible in the bottom right corner of the app interface.



Questions & Answers

Name: David Fialko

Title: Certified Prevention Specialist – ICPS, NCTTS

The Council of Southeast Pennsylvania, Inc.
4459 W. Swamp Road
Doylestown, Pennsylvania 18902

Phone: (215) 230-8218 ext. 3162

Dfialko@councilsepa.org

www.councilsepa.org

