



Addressing the Dangers of Vaping in Vermont Schools

An Electronic Vapor Product Education Toolkit for Schools



Dear Educators:

Nicotine – whether ingested by vaping or smoking – is never safe for kids. It's addictive, toxic and affects brain development.

After decades of effort, we have rolled back the appeal of tobacco and smoking among young people in Vermont and throughout the country. This is a significant win for public health. Now, a new and silent epidemic is taking hold in our homes and in our schools.

Technology, marketing and the fact that youth tend to underestimate certain behavioral risks are resulting in a new generation of people becoming addicted to nicotine.

In the face of aggressive marketing to youth, getting the message heard about the harmful impact of nicotine and vaping is a huge challenge. In public health, we must use all the tools we have to help educate both students and adults about nicotine addiction.

Here is a toolkit to help you educate your students about making healthy choices for themselves, and to better understand what electronic vaping products are all about.

According to the National Institute on Drug Abuse, 31% of teen e-cigarette users will start smoking within six months, compared to 8% of non-e-cigarette users. Our overriding goal in providing this toolkit is to join with you in keeping a new generation of Vermonters from suffering a deadly, lifelong addiction to nicotine and tobacco products.

We, as educators, parents and public health professionals may not be able to control the actions of our children. But we can take a creative and comprehensive approach to making sure they have the information they need to understand the physical and emotional implications of the choices they make.

Thank you for your partnership and for all you do for the youth of Vermont.

Sincerely,

Mark Levine, MD Commissioner of Health

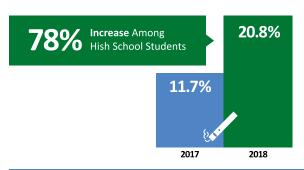
TABLE OF CONTENTS

INTRODUCTION 1
<u>ACTIONS</u>
What Administrators Can Do3
What Health Educators and Classroom Teachers Can Do5
What School Nurses and Student Assistance Professionals Can Do6
What Students Can Do7
CASE STUDY Stowe High School8
APPENDIX A
Memo from Education Secretary French and Health Commissioner Levine9
APPENDIX B
Public Health Advisory
APPENDIX C
Health Pointers for Parents
APPENDIX D
Health Pointers for School Nurses and Student Assistance Professionals14
APPENDIX E
Youth Cessation Resources
Parent Resources
Teacher Education Resources
Employer Resources
APPENDIX F
Vermont State Statutes and Resources
vermont state statutes and nesources
REFERENCES

INTRODUCTION

Youth and young adults are using e-cigarettes at an alarming rate. The Vermont Department of Health shares the concerns of school personnel, parents and community members in wanting to protect youth from e-cigarettes, harmful nicotine exposure and the possibility of addiction and long-term harm to brain development.

One-third of Vermont high school students (34%) have tried an electronic vapor product



AMONG HIGH SCHOOL CURRENT E-CIGARETTE USERS ⁱⁱⁱ
Rise in frequency and use of flavors

According to the 2017 Youth Risk Behavior Survey data, one-third of Vermont high school students (34%) ever tried an electronic vapor product, with 12% reporting past 30-day use. Students who identify as lesbian, gay, bisexual and/or transgender are significantly more likely to both ever try an electronic vapor product and currently use electronic vapor products compared to heterosexual/cisgender students."

Nationally, electronic vapor product use among youth increased 78% among high school students and 48% among middle school students from 2017 to 2018, according to the National Youth Tobacco Survey.

The data also shows a rise in frequency of use and in the use of flavors. There was an increase from 20% to 28% in students using e-cigarettes on 20 or more days and more used flavored e-cigarettes (from 61% to 68%).^{III}

There are now more than 15,000 flavors available to be used in electronic vapor products.^{iv}

Our school communities have an important role to play in halting this trend. This toolkit gives you resources and tools to prevent use of electronic vapor products among youth and help them to quit. It can also be used by anyone who works with pre-teens to young adults, including youth-serving organizations, health care providers, parks and recreation departments and mentoring programs.

For more information about this toolkit or the Health Department's Tobacco Control Program: tobaccovt@vermont.gov



What are Electronic Vapor Products?

Electronic vapor products, also known as electronic cigarettes, e-cigarettes or e-cigs, e-hookahs, mods, pod mods, vape pens, vapes, tank systems and electronic nicotine delivery systems.

E-vapor products frequently contain nicotine and are never safe for youth and young adults.

An e-cigarette is a battery-powered device that converts liquid, containing nicotine or other harmful chemicals, into a mist or vapor, that the user inhales. Modified e-cigarette devices can be used to deliver non-nicotine substances, such as cannabis extract or honey oil.

According to a study in Environmental Health Perspectives, 75% of fruit-, candy- and cocktail-flavored e-cigarettes – flavors that attract youth – contained diacetyl, a chemical linked to lung disease.

E-cigarette aerosol can contain harmful substances, including nicotine, heavy metals such as lead, volatile organic compounds and cancer-causing chemicals.

Exposure to nicotine during adolescence through young adulthood can disrupt the formation of brain circuits that control attention and learning because the brain is not fully developed until the mid-20s. Nicotine activates the limbic system more strongly in the adolescent brain than in the adult brain, making addiction a significantly greater risk for youth who use nicotine. Young people are also at risk for long-term effects of exposing their 75% of Flavored E-Cigarettes

Contain Diacetyl

brains to nicotine, including mood disorders and permanent lowering of impulse control.

Some newer electronic vapor products available on the market, such as the popular brand JUUL, have nicotine salts in their liquid or pod. This makes the nicotine more readily absorbed into the bloodstream and makes the vapor less harsh, so that it's easier to inhale more nicotine for longer periods of time.

E-cigarettes can be just as addictive as traditional cigarettes, and their use increases future risk of smoking traditional cigarettes.

Over the past decade there has been a 50% decrease in the percentage of youth who currently smoke traditional cigarettes. According to the Surgeon General, rising e-cigarette use among youth and young adults is strongly linked to use of other tobacco products including cigars, hookah and smokeless tobacco.

There is also evidence that e-cigarette use is associated with alcohol and other substance use, including marijuana.

In Vermont between 2015 and 2017, frequency of use of e-cigarettes increased from 13% to 22% among high school students. Use of alcohol is associated with frequency of e-cigarette use. Youth are 3.5 times more likely to currently drink if they use electronic vapor products. The percentage of high school youth who report some risk behaviors, such as bringing a weapon to school or fighting at school, increases as the frequency of electronic vapor product use increases.vi

More information about the dangers of electronic vapor product use among youth can be found in the Vermont Department of Health's Public Health Advisory. For more information about the state's response to electronic vapor product use in schools, refer to the memo sent from Agency of Education Secretary Dan French and Health Department Commissioner Mark Levine, MD, available in Appendix A.

SCHOOL ADMINISTRATION

What administrators can do:

Administrators have a unique role in promoting comprehensive prevention strategies throughout the school or district. You can have significant impact in preventing and reducing electronic vapor product use among youth by communicating and reinforcing strong tobacco policies, providing ongoing faculty and staff education, and promoting employee cessation resources.



Enforce strong tobacco policies.

- State laws prohibit the use of all tobacco products on school property at all times by staff, students and guests. Familiarize yourself with these laws and enforce them.
- Update regularly and communicate the school or district tobacco-free policy to all school personnel, community and contractors, including school bus drivers.
- School boards may adopt further policies on confiscation and referral to law enforcement as they see fit.



Provide ongoing education to faculty and staff.

- Educate faculty and staff to recognize electronic vapor products and follow the school's/district's policy.
- Arrange ongoing education and training to support faculty and staff in recognizing products and their use, and how to address use with students.
- Train faculty and staff to recognize symptoms students may exhibit related to nicotine addiction.
 These symptoms can resemble having an upset stomach or feeling anxious.



Educate and provide resources for parents.

- Parents are influential, so encourage them to talk with their kids. www.ParentUpVT.org can help.
 Encourage conversations among school youth groups and parent community groups, and provide them with resources as well.
- Use different types of communication such as the school newsletter and intercom announcements – to send messages. Students will be more likely to share at home if they hear something multiple times and through different channels.
- Share the school or district tobacco policy with parents. In addition to newsletters, make the information available on the school or district website, social media platforms and at in-person educational events.
- Inform parents of vape treatment options, including consultation with their pediatrician or referral to Vermont's quitline at 1-800-QUIT-NOW or at www.802quits.org.



Promote a tobacco-free workplace.

Promoting a tobacco-free workplace and providing cessation resources to employees ensures that school personnel are modeling healthy behaviors for one another, parents and most importantly youth.

- Begin to create tobacco-free workplaces by informing employees about the Vermont laws and school district policies that prohibit tobacco use on school grounds.
- Promote cessation resources for employees who need support.
- Become a 3-4-50 sign-on <u>school</u>. 3-4-50 helps us understand the overwhelming impact of chronic disease in Vermont and inspires us to take action to change it. 3-4-50 is about making a difference at a level that can influence the health of many. Businesses, schools, cities, towns and health care providers all play an important role in shaping the health of Vermonters. Our common goal is to make the healthy choice the easy choice where we live, work, learn and play.

See APPENDIX E for a list of resources for employers, including how to get free signage.



Establish a relationship with your local prevention coalition.

Prevention coalitions can provide information, resources and technical assistance to schools on tobacco and other substance use prevention strategies. Some coalitions collaborate with community-based youth groups that may be a resource for parent and peer-to-peer education. Find a local prevention coalition or the Health Department's state and community partners.

HEALTH EDUCATORS AND CLASSROOM TEACHERS

What health educators and classroom teachers can do:

Classroom teachers, specifically health educators, are instrumental in providing prevention education to students on nicotine addiction and electronic vapor product use.

Provide prevention education for students.

The Health Department recognizes the following resources developed by various partners as comprehensive and effective prevention education to address electronic vapor product use. While there are other curricula and resources to address electronic vapor product use among youth, we advise schools to be cautious and review the source of a curriculum. It is **NOT** best practice to use tobacco industry-sponsored prevention programming.

Federal Drug Administration – The Real Cost Campaign

The FDA partnered with Scholastic to create a <u>lesson plan</u> and <u>activity</u> for students in grades 9-12. This free resource is designed for administrators and teachers to engage students in discussions about the dangers of electronic vapor products. The Real Cost campaign also includes the latest data and information to raise awareness.

Stanford Medicine – Tobacco Prevention Toolkit

Stanford Medicine's <u>Tobacco Prevention Toolkit</u> is a theory-based and evidence-informed resource created by educators and researchers to prevent middle/high school students' use of cigarettes, cigars/cigarillos, chew, hookah and electronic cigarettes. It contains modules on e-cigarettes and vapes, messages on nicotine addiction, information and resources concerning positive youth development, school tobacco policies and tobacco control efforts. Most modules can be adjusted to meet the needs of elementary schools.

Northern New England Poison Center – Lesson Plan

The Northern New England Poison Center offers a free <u>lesson plan</u> for high school students on electronic cigarettes and vapor products. The download comes as a ZIP file, which includes the PDF lesson plan and a Jeopardy game in PowerPoint format.

CATCH Global Foundation & CVS Health – "CATCH My Breath"

CATCH Global Foundation and CVS Health's <u>free curriculum</u> for middle/ high school students aims to prevent electronic vapor product use among youth. It includes a series of classroom lessons, peer-led activities, parent education and social and community support.

• CDC's Office on Smoking and Health – Know the Risks: A Youth Guide to E-cigarettes The Centers for Disease Central & Provention developed this presentation to educate

The Centers for Disease Control & Prevention developed this presentation to educate youth on e-cigarettes, including the health risks, factors that lead to e-cigarette use, and what youth can do to avoid all tobacco products. This resource is intended for adults who educate or serve youth ages 11-18. Talking points and information are provided, so you need no additional instructions or permission to deliver the presentation. While it may be difficult to introduce a new curriculum or lesson plan into an established course, Module T of the Health Education Curriculum Analysis Tool can assess your current curricular offerings for effectiveness. Visit the CDC's website for more information about an effective health education curriculum.

SCHOOL NURSES AND STUDENT ASSISTANCE PROFESSIONALS

What school nurses and SAPs can do:

Nurses or School Assistance Professionals (SAPs) can assist youth by recognizing symptoms associated with tobacco addiction and vaping, discussing these with the student and parent, and referring to the student's health care provider.



Educate yourself on electronic vapor products and effects of nicotine.

- Information on <u>nicotine poisoning</u> from the Northern New England Poison Center
- The Vermont Department of Health's Pointers for School Nurses and SAPs



Educate youth on the risks of electronic vapor products.

• <u>Health Care Professionals: Educate Your Young Patients About the Risks of</u> E-cigarettes.



Establish youth tobacco cessation programming in school.

- The Blueprint for Health is expanding the American Lung Association's youth cessation program, Not on Tobacco, statewide to every hospital service area. Contact your local community health team https://blueprintforhealth.vermont.gov/contact-us for more information.
- Intervening with Teen Tobacco Users (TEG).
- Help Teens Stop Using Tobacco (TAP).



Help youth quit.

 Refer teens who may be struggling with nicotine addiction to 802Quits, popular quitting apps, or to talk with their health care provider. More detailed information on these cessation resources can be found in <u>Appendix E</u>.

See <u>Appendix E</u> for a list of youth cessation resources and <u>Appendix D</u>: Vermont Department of Health's Pointers for School Nurses and SAPs.

STUDENTS

What students can do:

Educating and engaging youth on how and why the tobacco industry targets them and giving them the opportunity to educate others in their community is a powerful strategy to counter tobacco's influence. Students can be involved in developing presentations to educate on the topic. Using posters available from the Health Department or FDA can be useful for keeping the topic visible in your school.



Establish or join a youth tobacco prevention group.

- Middle School Students <u>Vermont Kids Against Tobacco</u>
- High School Students <u>Our Voices Exposed</u>



Establish or join a "Getting to Y" group.

The Health Department partners with <u>Up for Learning</u> to support this youth engagement project. Vermont public schools that complete the <u>Youth Risk Behavior Survey</u> have an opportunity, with grant support, to send a team of students to a training where they learn how to analyze data and identify health priorities for their school.

Visit the Health Department's website for more health and wellness youth engagement opportunities.

CASE STUDY

Prevention in Action: Addressing Electronic Vapor Product Use at Stowe High School

In the 2017 fall semester, Stowe High School administration noticed a rapid increase in electronic vapor product use among their students. Knowing the dangers of nicotine addiction and its impact on youth, they knew they needed to address this issue and quickly implemented comprehensive tobacco and substance use prevention and intervention strategies.

What Stowe High School did:

- Immediately provided faculty and staff with education and information about electronic vapor products, including how to identify these products and the behaviors associated with use among youth.
- Clarified electronic vapor products are controlled substances and included them in the Alcohol and Other Drug Policy.
- Implemented restorative justice practices into disciplinary procedures related to electronic vapor product possession and distribution. Practices include parent involvement and wrap-around services such as in-school and community cessation resources.
- Shared parent education in a formal letter from the school principal, on the principal's blog and in formal talks at athletic open houses.
- Encouraged modeling of vape-free healthy behaviors from the high school students to the middle school students, including a peer education event by the high school Students Against Destructive Decisions group.
- Established a relationship with the local prevention coalition, Healthy Lamoille Valley.
- Engaged police to enforce age restrictions on sales at local businesses that sell electronic vapor products.
- Implemented electronic vapor product prevention education in multiple classrooms, including a liquid nicotine experiment in AP Environmental Studies.

The Impact

The most impactful intervention has been the implementation of fair and consistent disciplinary procedures to send a clear message to students about the school's intent to address as a serious issue and combat the use of the products. Stowe High School also delivered accurate, science-based information about the harms of electronic vapor products, rather than scare tactics that can be easily dismissed. The administration believes students can have open and honest communication with adults to create a culture of trust and respect.

What's Next

- Implement Stanford Medicine's Tobacco Prevention Toolkit in health class curriculum (see curriculum in toolkit).
- Restructure staffing to provide for an additional guidance counselor to develop, implement and provide oversight of peer education prevention programming.

APPENDIX A

Мемо





TO: Superintendents, Principals, Special Education Administrators, VT Independent School Headmasters

FROM: Secretary Daniel M. French. Ed.D. and Commissioner Mark Levine, MD

SUBJECT: Recommended school actions to prevent, detect and respond to student use of JUUL and Electronic

Vapor Products (EVP)

DATE: December 12, 2018

Background

The rapid rise in the use of Electronic Vapor Products (EVP), also known as e-cigarettes, vapes, vape pens or by the brand name JUUL, is a public health crisis. According to the 2017 Youth Risk Behavior Survey, 34% of high school youth reported ever trying an electronic vapor product. Current e-vapor product use has significantly increased from 3% to 4% among middle school youth. This Surgeon General's <u>report</u> provides more in-depth information regarding youth e-cigarette use, which the FDA warns is reaching epidemic proportions.

This memo provides information and recommendations related to any EVP and is addressing JUUL specifically. Please distribute this memo widely to all school staff including nursing, coaching and custodial personnel.

Recommendations for School Staff

School Administrators and staff should be working with families, students and other local resources to mitigate the potentially harmful effects of EVPs by having modern substance abuse policies, ensuring that staff are well trained to respond to EVP use and that students have access to quality health education programs to prevent their use. Here are some potential first steps:

- 1. Update and communicate your Substance Use Policies
- Remind students, staff and families about your local tobacco and tobacco substitute policies and the definitions of tobacco and tobacco substitutes at 7 V.S.A §1001.

- 2. Provide your staff with the knowledge to detect and respond to EVP.
- Ensure school nurses and other personnel are trained to identify EVPs, as well as the **symptoms of nicotine intoxication:** both are covered in <u>this handout</u> which includes visuals. Adopt procedures to assist students with addiction treatment; examples include limiting suspension and referring to a provider, SAP or the Health Department's quitline at 1-800-QUIT-NOW (free for ages 13 and above).

JUUL Products:

- Highly addictive, containing at least double the nicotine content of other e-cigarettes
- Discreet design resembling a USB flash drive making it easy to use and conceal in class
- Come equipped with a USB charging dock, allowing the device to charge by plugging into a computer's USB port

All Electronic Vapor Products (EVP):

- Can be purchased in many flavors that are attractive to youth
- Many youth believe that these products are harmless and/or nicotine-free
- Can be easily modified with substances other than nicotine (such as cannabis extract or honey oil)
- Are susceptible to leaking and potentially exploding, particularly if they have been tampered with
- May be unsafe to exposed skin due to the toxic levels of nicotine
- Are easily accessible. Students often get the EVP from a family member or friend (2017 YRBS data) or purchase them online
- When confiscating any EVP device, handle with care and consult with your local waste management or police department about safe disposal. Do not return them to students or leave in a desk for long periods.
- 3. Provide high quality educational support for students from elementary through high school.
- Ensure that EVP education is incorporated into existing tobacco prevention education. <u>This toolkit</u> can be accessed
 for free and used in conjunction with current curricula. Consider using <u>tobacco prevention materials</u> with students
 who violate the tobacco-free schools policy.
- The Health Department's Tobacco Program offers resources, including handouts for parents and school nurses, a presentation schools can use to educate on e-cigarettes and a youth campaign aimed to increase perception of harm to be released in 2019.
- Use only evidence-based prevention materials. No resource produced by JUUL or any EVP manufacturer is an approved prevention resource.

Questions/Additional Information

For questions, more information, or if you need assistance identifying appropriate materials, please contact Beth Keister, Tobacco and Substance Use Prevention Coordinator, at beth.keister@vermont.gov.

For additional information, visit the Vermont Health Department <u>website</u> or contact Rhonda Williams, Chronic Disease Prevention Chief, at Rhonda.williams@vermont.gov.

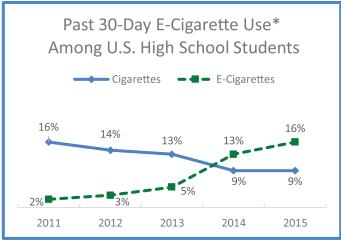
Additional resources are available at the U.S. Department of Health and Human Services website.

APPENDIX B

PUBLIC HEALTH ADVISORY

The Vermont Department of Health calls attention to the harm of e-cigarette use among youth, including exposure to nicotine.

E-cigarettes, also called personal vaporizers, vape pens, e-cigars, e-hookah or vaping devices, are devices that typically deliver nicotine, flavorings, and other additives to users through an inhaled aerosol. The aerosol is not considered safe.



* Defined as e-cigarette use on at least 1 day in the past 30 days Source: National Youth Tobacco Survey 2011-2015

Youth E-Cigarette Use Has Risen Rapidly

E-cigarettes are now the most commonly used tobacco product among high school and middle school students. 1,2

- From 2011-2015, past 30 day use of e-cigarettes increased more than nine-fold among U.S. high school students (1.5% to 16%).¹
- In 2015, a higher percentage of Vermont high school students reported current e-cigarette use than smoking cigarettes (15% versus 11%).
 The rate of use increased significantly with each increasing grade from 9th to 11th grade.²
- A 2014 study of California youth found that youth e-cigarette use was strongly associated with low perception of harm and high approval and use among family and friends.³

The Vermont Department of Health follows the 2016 U.S. Surgeon General's recommendation urging parents, teachers, health care providers, and others who influence youth to discourage tobacco use in any form, including e-cigarettes.

Nicotine Harms Brain Development

Many e-cigarettes contain nicotine and other harmful and potentially harmful ingredients.

- Nicotine is harmful to the developing adolescent brain and can negatively affect attention, learning and susceptibility to addiction.^{4,5}
- E-cigarette-related calls to U.S. Poison Control Centers increased dramatically from 2011 to 2014 (271 to 3,783 calls). 51% of calls involved children younger than 5 years of age.⁵
- E-cigarettes can contain harmful ingredients including ultrafine particles, heavy metals and flavorings such as diacetyl, a chemical linked to serious lung disease.⁵

Flavors and Marketing Attract Youth

E-cigarettes are promoted with flavors and marketing strategies known to appeal to youth.

- Nearly 1 in 4 Vermont high school students have tried a flavored tobacco product.²
- A national study found 81% of 12-17 year olds who had ever used an e-cigarette, began with a flavored product.⁵
- E-cigarettes come in over 15,000 flavors, including candy and fruit flavorings known to appeal to youth.^{4,6}
- The 2016 Report of the Surgeon General concluded that e-cigarettes are marketed by promoting flavors and other similar approaches used in the past to attract youth and young adults to conventional tobacco products.⁵

Recommendations:

Advise Youth on Dangers of Nicotine

E-cigarettes can contain nicotine, a highly addictive chemical that is especially harmful to youth, and other harmful or potentially harmful ingredients.

Be a Role Model

Set a positive example to youth by living tobacco-free. Even if you're quitting tobacco, share the reasons why you want to be tobacco-free and ask for support in your journey. For free quit help, visit 802Quits.org or call 1-800-QUIT-NOW.

Create a No Tobacco Policy

Make your home and vehicle tobacco-free. Keep tobacco products, including e-cigarette devices and liquid nicotine, locked and out of reach of children.

- ¹ Singh T, Arrazola RA, Corey CG, et al. Tobacco Use Among Middle and High School Students United States, 2011–2015. MMWR Morb Mortal Wkly Rep 2016;65:361–367. DOI: http://dx.doi.org/10.15585/mmwr.mm6514a1
- ² Vermont Department of Health. Vermont Youth Risk Behavior Survey. High School Survey. 2015. Available from: http://healthvermont.gov/sites/default/files/documents/pdf/CHS YRBS statewide report 2015.pdf
- ³ Barrington-Trimis, J.L., Berhane, K., Unger, J.B. et al, Psychosocial factors associated with adolescent electronic cigarette and cigarette use. Pediatrics. 2015;136:308–317 DOI: http://dx.doi.org/10.1542/peds.2015-0639
- ⁴ Groner, J.A., Walley, S.C., Etzel, R.A. et al, Public policy to protect children from tobacco, nicotine, and tobacco smoke. Pediatrics. 2015;135:998-1007 DOI: http://dx.doi.org/10.1542/peds.2015-3109
- ⁵ U.S. Department of Health and Human Services. E-Cigarette Use Among Youth and Young Adults. A Report of the Surgeon General. Atlanta, GA: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, Office on Smoking and Health, 2016. Available from: https://www.surgeongeneral.gov/library/2016ecigarettes/index.html
- ⁶ Campaign for Tobacco-Free Kids. "Electronic Cigarettes: An overview of key issues." Fact sheet. November 2016. Available from: https://www.tobaccofreekids.org/research/factsheets/pdf/0379.pdf

APPENDIX C

POINTERS FOR PARENTS

There has been an alarming increase in youth use of electronic cigarettes (e-cigarettes), also known as e-cigs, e-hookahs, mods, vape pens, vapes, tank systems and electronic nicotine delivery systems. An e-cigarette is a battery-powered device that converts liquid, typically containing nicotine or other harmful chemicals, into a mist, or vapor, that the user inhales.

Below are facts and resources to help raise awareness about the vaping crisis and nicotine addiction.

- E-cigarettes, which frequently contain nicotine, are never safe for youth and young adults.
- E-cigarette use among youth increased 78% from 2017 to 2018 [National Youth Tobacco Survey].
- Youth use of e-cigarettes increases future risk of smoking traditional cigarettes and can be just as addictive.
- Customizable e-cigarette devices can be used to deliver non-nicotine substances, such as cannabis
 extract or honey oil.
- According to a study by Environmental Health Perspectives, 75% of fruit-, candy- and cocktailflavored e-cigarettes, which attract youth, contained diacetyl, a chemical linked to lung disease.
- E-cigarette aerosol can contain **harmful substances**, including nicotine, heavy metals like lead, volatile organic compounds and cancer-causing chemicals [John Hopkins School of Public Health].
- Since launching in 2016, JUUL has become the most popular e-cigarette on the market. Its design,
 which looks like a USB flash drive, makes it easy to conceal. All JUUL products contain nicotine one
 pod delivers the equivalent of a pack of cigarettes.
- Signs of addiction to nicotine include trembling, nausea and frequent e-cig use. Watch for behavior such as frequent trips to the bathroom, reports of illness or hand-to-mouth activity.
- Youth can receive help in quitting e-cigarettes from their pediatrician. School nurses can assist by recognizing symptoms, discussing these with the student and parent and referring to 802Quits, Vermont's 24/7 quitline (1-800-QUIT-NOW) for ages 13 and older. For more, visit 802quits.org
- It is illegal to sell any tobacco product to minors, including e-cigarettes, **yet underage teens are obtaining devices**, often from older students or family and friends.
- E-cigarettes are called "tobacco substitutes" in Vermont's state statute. Use of e-cigarettes is banned

 except for vape shops wherever lit tobacco products are restricted, including on school grounds, at school events and while being transported.
- It is important for parents to **talk to their kids about the** <u>dangers of using e-cigarettes</u> including JUUL and other commonly-used products such as Suorin, Justfog, Minifit and MarkTen.

Learn more from Know the Risks: A Tip Sheet for Parents from the Surgeon General

For more information email tobaccovt@vermont.gov

APPENDIX D

POINTERS FOR SCHOOL NURSES AND STUDENT ASSISTANCE PROFESSIONALS

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- Signs of addiction to nicotine include trembling, nausea and the frequent use of the e-cigarette
 product. Watch for classroom behavior such as frequent trips to the bathroom or frequent hand- tomouth activity, along with visits to the health office reporting nausea and light-headedness.
- Read more on nicotine poisoning from the Northern New England Poison Center.
- Nurses or SAPs can assist youth by recognizing symptoms associated with vaping, discussing these
 with the student and parent and referring to the student's health care provider and 802Quits,
 Vermont's 24/7 quitline (1-800-QUIT-NOW) for ages 13 and older. For more, visit 802quits.org
- It is illegal to sell any tobacco product to minors, including e-cigarettes, yet underage teens are obtaining devices, such as JUUL, Suorin and MarkTen, often from older students, family or friends.

Learn more from Know the Risks: A Tip Sheet for Parents from the Surgeon General For more information, healthvermont.gov/wellness/tobacco or email tobaccovt@vermont.gov.

APPENDIX E

RESOURCES

Youth Cessation Resources

- 802Quits Programs and Support
 - Vermont's 24/7 Quitline (1-800-QUIT-NOW) provides coaching and text support to anyone age 13 and older. Youth are not eligible to receive NRT (nicotine replacement therapy). Refer them to their pediatrician if needed.
 - 2. Quit In-person is reserved for adults, 18 and older.
 - 3. Youth have free, unlimited access to Quit Online but cannot receive NRT from the platform.
- <u>The Truth Initiative's This is Quitting:</u> This app supports youth quitting tobacco and electronic vapor product use. The app provides real social media posts from other youth quitters, free text messages to keep youth quitters on track, and quitting exercises that are both structured and on-demand.
- <u>SmokeFree.gov's quitSTART app:</u> quitSTART is a free smartphone app that helps youth quit smoking with tailored tips, inspiration and challenges available to anyone age 13 and older.
- SmokeFreeteen.gov SmokefreeTXT for Teens: This mobile text messaging service is designed for young adults (13-19) who are trying to quit smoking. This service runs for 6-8 weeks, and provides 3-5 text messages per day, ranging from managing cravings to getting bac on track after a slip-up.

Parent Resources

The Vermont Department of Health and Agency of Education created an **E-Cigarette PowerPoint** that can be used to educate faculty and staff, parents and the community at large. To request the presentation: email the Tobacco Control Program at tobaccovt@vermont.gov

- The Vermont Department of Health's Pointers for Parents
- Surgeon General's Tip Sheet for Parents
- Truth Initiative 4 Things Parents Need to Know About Juul and Nicotine Addiction
- Standford Medicine's Tobacco Prevention Toolkit
- Partnership for Drug-Free Kids Vaping Guide for Parents
- Promote the importance of smoke- and vape-free homes and cars

Teacher Education Resources

- The Vermont Department of Health and Agency of Education created an **E-Cigarette PowerPoint** that can be used to educate faculty and staff, parents and the community at large. To request the presentation: email the Tobacco Control Program at tobaccovt@vermont.gov
- Inform teachers and support staff about high-use areas (bathrooms, stairwells, etc.). Encourage monitoring areas between classes.
- Surgeon General's Fact Sheet and Surgeon General's Advisory on E-cigarette Use Among Youth
- Truth Initiative E-Cigarette Fact Sheet
- <u>This recorded public forum</u> on e-cigarettes, vaping and JUUL is sponsored by the Howard Center, and includes students from BE the Above youth group at Edmonds Middle School, Essex High School Nurse Dianne Kirson-Glitman and Health Commissioner Mark Levine, MD.

Employer Resources

- <u>Vermont Department of Health's Quit@Work toolkit for Employers</u> is a free resource that offers specific guidance and tools.
- Promote <u>802Quits</u> programs by phone, in-person or online as cessation support for employees.
 Educational materials and free quit tools are available at www.802quits.org. Employers can offer group cessation classes at their worksite at no cost through <u>Vermont Quit Partners</u>.
- The Health Department provides <u>free signage</u> to organizations and schools to place on building grounds displaying smoke- and vape-free messages. In the first semester of 2019, the Health Department sent new signage to all public schools to assist with tobacco-free messaging, including electronic vapor products.

Learn more about promoting a tobacco-free workplace and other worksite wellness strategies on the Health Department's website at healthvermont.gov.

APPENDIX F

VERMONT STATE STATUTES AND RESOURCES

- 16 V.S.A. § 140 states that it is prohibited to use tobacco and tobacco substitute products, including electronic vapor products, on public school grounds and school-sponsored events.
- Act 108, Vermont's Clean Indoor Air Act, prohibits the use of tobacco and tobacco substitutes in indoor places of public access. This includes private and independent schools that are not covered under 16 V.S.A. § 140.
- 7 V.S.A. § 1003 was amended in 2019 to change the legal age for buying and using cigarettes, electronic cigarettes and other tobacco products from 18 to 21 years of age.
- 7 V.S.A. § 1002 was amended in 2019 to prohibit anyone from selling electronic cigarettes, liquids
 containing nicotine, or other tobacco substitutes without a Vermont tobacco seller license. This
 effectively prohibits the online sales of such products.
- 32 V.S.A. § 7702 now subjects electronic cigarettes to the wholesale tax on "other tobacco products".

If minor students disclose purchasing tobacco products on the internet or at a local retail store, report the retailer's non-compliance to the <u>Vermont Department of Liquor and Lottery</u>, <u>Division of Liquor Control</u>. Consider other health activities or policies that can reinforce a healthy school and learning environment, such as arranging after-school programming to give students opportunities to be engaged.

Model Policies and Signage

- The Vermont School Board Association offers model policies for <u>Tobacco Prohibition</u> of all school personnel, including students, as well as a <u>Student Alcohol and Drugs</u> policy. The Health Department recommends that school districts include tobacco and tobacco substitutes, including electronic vapor products, in their required Student Alcohol and Drugs policy.
- The Health Department provides <u>free signage</u> to organizations and schools to place on building grounds displaying smoke- and vape-free messages.

REFERENCES

- U.S. Department of Health and Human Services. E-Cigarette Use Among Youth and Young Adults: A Report of the Surgeon General—Executive Summary. Atlanta, GA: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, Office on Smoking and Health, 2016.
- "Vermont Department of Health. 2017. Youth Risk Behavior Survey Data. Available at: www. healthvermont.gov/YRBS. Accessed on 1/18/19.
- 2018 National Youth Tobacco Survey Finds Cause For Concern. US Food and Drug Administration, Center for Tobacco Products, Nov. 2018, www.fda.gov/downloads/TobaccoProducts/ PublicHealthEducation/ProtectingKidsfromTobacco/UCM625955.pdf.
- [™] Hsu, G., Sun, J.Y., & Zhu, S.H. (2018). Evolution of electronic cigarette brands from 2013-2014 to 2016-2017: Analysis of brand websites. Journal of Medical Internet Research, 20(3). doi: 10.2196/jmir.8550.
- ^v Study: Lead and Other Toxic Metals Found in E-Cigarette 'Vapors.' Johns Hopkins Bloomberg School of Public Health, 21 Feb. 2018, https://www.jhsph.edu/news/news-releases/2018/study-lead-and-othertoxic-metals-found-in-e-cigarette-vapors.html.
- vi Vermont Department of Health. Frequency of Electronic Vapor Product Use and Other Risk Behaviors Among High School Students. YRBS data brief. Burlington, VT: Vermont Department of Health. 2018.
- vii Singh T, Arrazola RA, Corey CG, et al. Tobacco Use Among Middle and High School Students United States, 2011–2015. MMWR Morb Mortal Wkly Rep 2016;65:361–367. DOI: http://dx.doi.org/10.15585/ mmwr.mm6514a1
- viii Vermont Department of Health. Vermont Youth Risk Behavior Survey. High School Survey. 2015. Available from: http://www.healthvermont.gov/sites/default/files/documents/pdf/CHS YRBS statewide report 2015.pdf
- * Barrington-Trimis, J.L., Berhane, K., Unger, J.B. et al, Psychosocial factors associated with adolescent electronic cigarette and cigarette use. Pediatrics. 2015;136:308–317 DOI: http://dx.doi.org/10.1542/ peds.2015-0639
- * Groner, J.A., Walley, S.C., Etzel, R.A. et al, Public policy to protect children from tobacco, nicotine, and tobacco smoke. Pediatrics. 2015;135:998-1007 DOI: http://dx.doi.org/10.1542/peds.2015-3109
- xi U.S. Department of Health and Human Services. E-Cigarette Use Among Youth and Young Adults. A Report of the Surgeon General. Atlanta, GA: U.S. Department of Health and Human Services, Centers for Disease Control and Prevention, National Center for Chronic Disease Prevention and Health Promotion, Office on Smoking and Health, 2016. Available from: https://www.surgeongeneral.gov/ library/2016ecigarettes/index.html
- xii Campaign for Tobacco-Free Kids. Electronic Cigarettes: An overview of key issues. Fact sheet. November 2016. Available from: https://www.tobaccofreekids.org/research/factsheets/pdf/0379.pdf