

Tobacco 21 laws are *bad* for public health

Separating Fact from Speculation

A presentation by:



Tobacco Harm Reduction **4** Life

Leading the way toward a Smoke-free America

Minnesota Smoke-free

THR4LIFE is a non-profit 501(c)(3)

Background: Tobacco 21 is an initiative to raise the minimum legal sales age (MLSA) for tobacco and vapor products. Proponents of this measure are admittedly crusading the state of Minnesota in an effort to convince municipalities to participate in the agenda, in hopes they can eventually convince lawmakers to pass the policy at a state level.

While on the surface 'raising the smoking age' may seem like a noble idea, upon further investigation, we find any potential benefit of the policy to be outweighed by the potential harm.

Objective: In this presentation, we aim to separate fact from speculation and misinformation by outlining popular claims made by Tobacco 21 proponents, followed by the results of our research and analysis.

Our Mission: Tobacco Harm Reduction 4 Life (THR4Life) was established to help smokers regain control over their lives by providing balanced and accurate information about tobacco harm reduction. We believe that honesty and transparency in public health is imperative to the long term well being of our communities. We assert that the best way to protect future generations from the harms of tobacco, is to begin with the adults in their lives. We advocate for the technological innovation of tobacco harm reduction as paving the way toward a smoke-free future, a healthier population, and a cleaner environment.

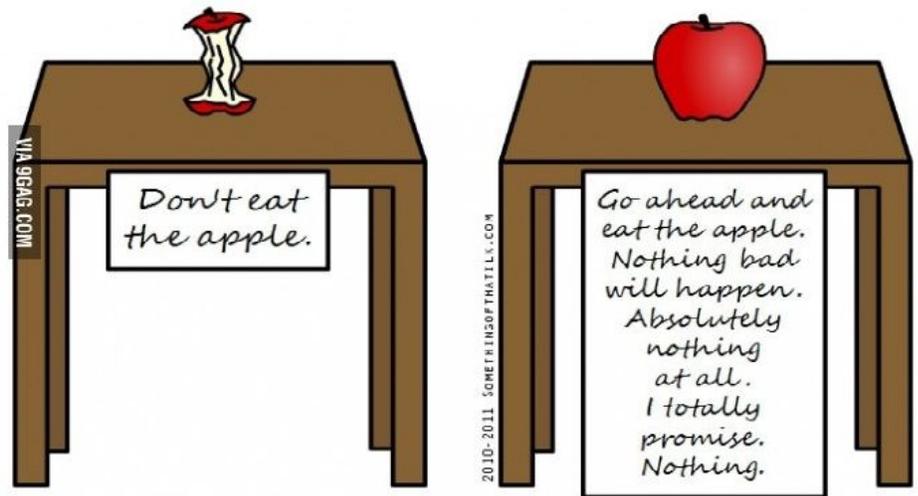
CLAIM: *Raising the minimum legal age to purchase tobacco products will reduce the amount of tobacco use by high school students.*

ANALYSIS: There is currently **no conclusive evidence to indicate that Tobacco 21 laws are effective** in preventing youth from tobacco use and access. There *are* 'tobacco control' commissioned, methodologically lacking surveys that speculate hopeful statistics, however, hopeful speculation does not qualify as conclusive evidence.

Psychological reactance may cause the target objective to backfire, increasing smoking

We need to stop and think about the sociological and psychological repercussions of violating the Age of Majority rights, and arguably the Constitutional rights, of young adults. We need to consider the *impact* of removing freedoms from the same demographic of people that we are concurrently encouraging to risk their lives in service to our country, in the name of protecting *our* freedom. When rules are perceived as arbitrary, it adds to an overall diffidence toward the law. As young adults realize their freedom to chose has been removed, they may enter into reactance motivational state and act to regain control by not complying. The term for this is *psychological reactance* - an aversive affective reaction in response to regulations or impositions that impinge on freedom and autonomy. This is a very 'human' and common reaction to loss of free will, and has the potential **to increase smoking**.

Young people are particularly susceptible to unintended *reverse psychology* effects as they develop an appetite for independence. When making their own choices is at such a high level of importance to them, creating a new forbidden fruit to tempt them with is imprudent. By 'raising the smoking age', we are drawing unnecessary attention to smoking during a time when smoking among youth is **already declining at an unprecedented rate**.



Instead of creating an environment of 'control' for youth to rebel against, we need to foster a more *positive environment* that encourages youth to make good decisions because they *want* to. The appropriate response to our unprecedented decline in youth smoking and vaping, is to applaud our youth for **making good choices** and focus on *positive reinforcement* for a continued positive outcome. Tobacco 21 is essentially a punishment for doing well. Removing the simple freedom of choice from legal adults, is an inappropriate response to our declining youth [and adult] smoking rates.

Tobacco 21 sets the stage for black market, increasing tobacco access among youth

Under Tobacco 21 laws, cities lose revenue to neighboring cities and states while simultaneously **setting the stage for a bolstered black market for cigarettes in our schools**. Nothing is stopping a motivated 18-year-old from simply driving to neighboring cities or states, picking up cigarettes, and driving back to capitalize on the new business opportunity. This idea is nothing new. Many Minnesota smokers make the trek to North Dakota and Wisconsin for tax-free smokes since Minnesota raised the sin tax on cigarettes. Furthermore, cigarettes can easily be purchased online, duty-free. Keep in mind, these young “entrepreneurs” *will not be requiring age verification for sales*.

Prohibition is a failed strategy

History repeats itself; this is indisputable. Looking at our history can provide us with clarity and wisdom in making future decisions. When considering whether or not to enact a new prohibition, it is critical that we take a look at the results of similar prohibitive measures.

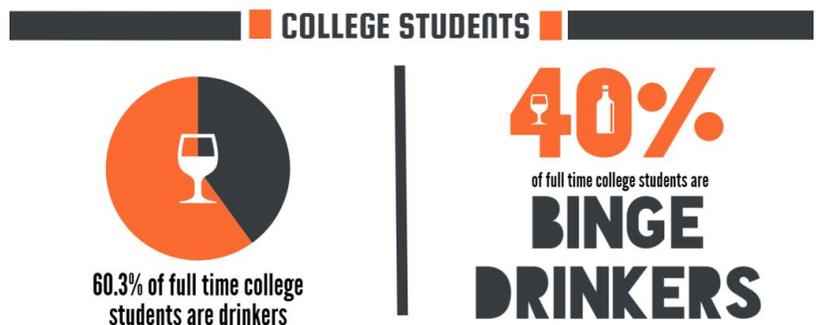
Alcohol prohibition was a failed strategy

The United States has a complex history regarding the legalization of dangerous drugs. In 1920, the 18th Amendment banned the sale of alcohol. The amendment aimed to stem what was seen as a growing moral decay of society and eventually led to the passage of the 19th Amendment, which gave women the right to vote.

But the 18th Amendment had some other major consequences as well. It helped create an epidemic of organized crime, giving rise to the era of Al Capone and others. It also cut down on tax revenues that could have helped the United States during the start of the Great Depression. In 1933, the 21st Amendment was approved, repealing the disastrous attempt at prohibition authorized by the 18th Amendment.

Raising the drinking age increased college binge drinking, does not prevent youth access

Since raising the drinking age to 21, there's been an **increase in college binge drinking** (ages 18-24). According to the CDC, "people aged 12 to 20 years drink 11 percent of all alcohol consumed in the United States. More than 90 percent of this alcohol is consumed in the form of binge drinks. On average, underage drinkers consume more drinks per drinking occasion than adult drinkers."

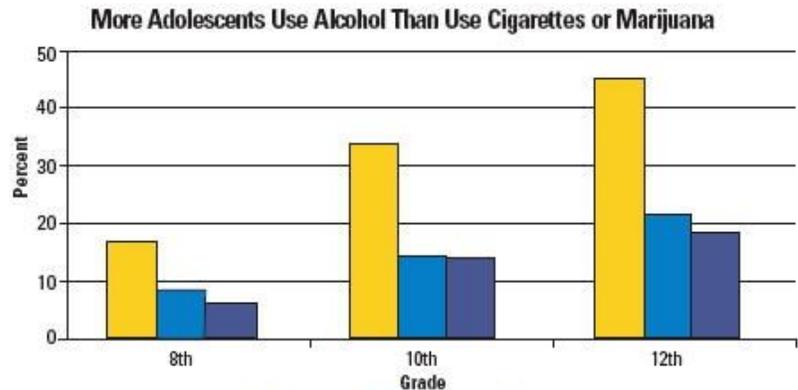


Alcohol is responsible for the deaths over 1,000 people in the U.S. between the age of 18-24 every year. The National Institute on Alcohol Abuse and Alcoholism says that even though the "**21 year-old**

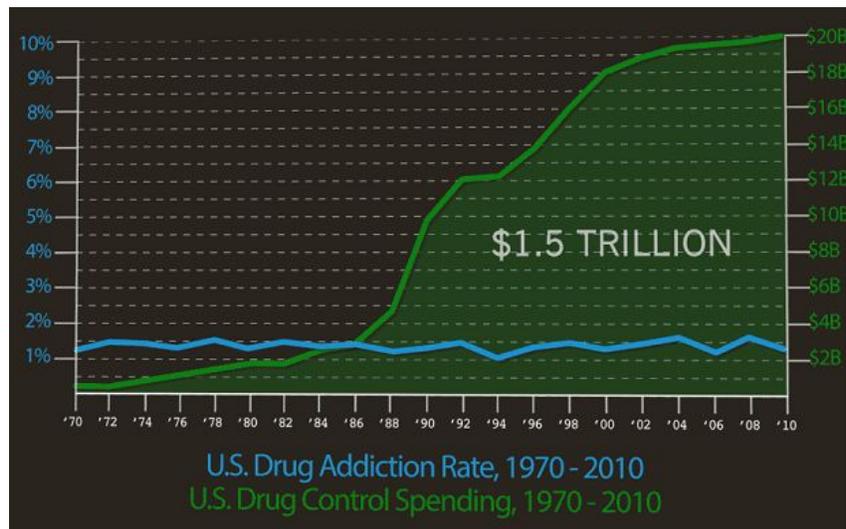
drinking age has been in place for over 25 years, we are still facing an environment where drinking by people under 21 is the norm."

Statistically, more teens use alcohol, than cigarettes and marijuana combined - **despite the legal drinking age being 21.**

Prohibition on drugs remains ineffective



Similarly, the **war on drugs has done nothing to decrease drug use.** All it's done is create a violent black market, the highest incarceration rate on the planet, and has cost the U.S. over \$1 trillion since Nixon initiated it in the 1980's.



“Torches of Freedom”, when discriminatory tobacco prohibitions backfire

Before the twentieth century, smoking was seen as a habit that was corrupt and inappropriate for women, and some states tried to prevent women from smoking by enforcing laws. In 1908 the New York City Board of Aldermen unanimously passed an ordinance that prohibited smoking by women in public. Following in 1921, a bill was proposed to prohibit women from smoking in the District of Columbia. Cigarettes became a way for women to challenge social norms and fight for equal rights as men. Eventually for women the cigarette came to symbolize ‘rebellious independence’. Women who otherwise wouldn't have smoked, began smoking as a statement of social and political activism. This is a prime example of **psychological reactance** in regard to a tobacco prohibition, specifically one that unequally discriminated against a particular demographic of U.S. adults. This prohibitive attempt was rendered

ineffective at accomplishing the desired outcome, and **resulted in an increase in smoking among the targeted demographic.**

All of this proves that prohibition and restriction do not work. Every time the United States has opted to ban some kind of drug in some shape or form, a thriving drug trade has been born. Is that the kind of future we want to create for our children and our society? This kind of solution is not the kind that the state of Minnesota should pursue. Raising the age for tobacco consumption and purchase will not stem usage.

Tobacco 21 laws push youth toward traditional cigarettes

Tobacco 21 does **nothing to prevent youth from obtaining cigarettes through other common means** such as stealing them from a store or a parent, obtaining them consensually from a friend or family member over the age of 21, or even scavenging ash trays outside of grocery stores and gas stations.

Tobacco 21 **prevents adults age 18-20 from access to smoke-free vapor products**, which the Royal College of Physicians has concluded to be [at least 95 percent less harmful than smoking](#). This measure is poised to keep the 90 percent of people who start smoking before the age of 18, bound to cigarettes for *three additional years*, **hardening an addiction to smoking**.

In a recently published National Bureau of Economic Research Working Paper titled "[The Effects of E-cigarette Minimum Legal Sale Age Laws on Youth Substance Use](#)", research supported by the National Institutes of Health concluded that **laws banning sales of e-cigarettes to young adults actually pushes youth toward traditional cigarettes**. Strict enforcement of these laws is linked to an increase in youth smoking participation of 0.7 to 1.4 percentage points. The study concludes that the unintended consequences of these laws is concerning and may have a **negative impact on public health**.

Tobacco 21 laws do not prevent 18 - 20 year olds from smoking. Under this policy, adults (age 18 - 20) are still legally allowed to possess and use tobacco products. Tobacco 21 simply creates an easily surmountable hurdle for those that smoke to obtain cigarettes, while discouraging access to and education in tobacco harm reduction products.

CLAIM: *Needham Mass. saw a 48% decrease in youth smoking rates after implementing Tobacco 21.*

ANALYSIS: Tobacco 21 proponents often cite Needham, Mass. as their golden example of the policy's success. Unfortunately, their claims are misleading, as they fall short of telling the whole story. The Boston suburb did see an impressive 48% reduction in teen smoking rates from 2006 to 2012 after implementing the policy, however, as Needham's director of public health points out, the city had enacted multiple other tobacco control efforts at the same time. **"I wouldn't say it's all because of this [Tobacco 21],"** she told WNYC. Additionally, 'the study analyzed data starting in 2006, a year after the

purchasing age hike. Kessel Schneider, study co-author, acknowledged this as a possible limitation to the research as **it's unclear exactly how teen smoking was trending in Needham during the years leading up to the policy change**.

The entire nation's smoking rates have been steadily declining for decades, reaching historic lows; Needham is hardly an exception. For example, from 2011 to 2016, **Minnesota's youth smoking rates declined by 56% despite having no Tobacco 21 laws in place**.

Out of the 2 states and 200 plus communities that have passed this policy, this out of context and inconclusive example of Needham, Mass. remains the only statistical claim of Tobacco 21 success.

CLAIM: *Nicotine is highly addictive and dangerous.*

ANALYSIS: The popular perception has long been that it is the nicotine that 'addicts' people to smoking, but according to a number of recent studies, including one by the Royal College of Physicians (RCP), this is not the case. The RCP is one of the most respected medical research groups in the world, and was the first to tell us smoking is dangerous. In their 2016 report "Nicotine without smoke: Tobacco harm reduction", RCP reports that **nicotine, when isolated from the other chemicals in tobacco cigarettes, is relatively benign in its harm, benefit, and addictiveness** (compare to caffeine), and that the most harmful and addictive property of tobacco cigarettes is not the nicotine, rather it is the chemical laced smoke of combustible tobacco that is to blame for tobacco related cancers, diseases, and addiction. This is why tobacco companies add thousands of additional chemicals to tobacco - to create an addiction above and beyond simple nicotine.

This is echoed by the FDA which claims, "although any nicotine-containing product is potentially addictive, decades of research and use have shown that NRT (Nicotine Replacement Therapy) products sold OTC **do not appear to have significant potential for abuse or dependence.**" To date, there are no documented cases of nicotine patches, gums, or lozenges creating addiction in users. Nicotine may be the most well known chemical in cigarettes, but is not the culprit when it comes to cancer and other tobacco related disease. [Smoking causes cancer, nicotine does not.](#)

The notion that nicotine is addictive dates back to the introduction of Nicorette in the 1980s, when for the first time in history smokers were labelled as "addicts" - as people with no willpower - unable to give up cigarettes without pharmaceutical nicotine products. Claims that 'nicotine is more addictive than heroin' were touted from the official "Surgeon General" report, "Nicotine Addiction", published in 1988. These findings were that of prominent anti-tobacco 'experts', who were later found in a 2014 Washington DC court case to have significant financial ties to the pharmaceutical industry, particularly in the nicotine replacement therapy market, during the time they were designated by the US government as scientific editors of the official "Surgeon General" reports on tobacco. A judgment ordered the FDA to remove these experts from Tobacco Products Scientific Advisory Committee (TPSAC) because of their extensive conflicts of interest with pharmaceutical companies. According to the presiding judge over the case, their recommendations must be considered "suspect" and "at worst unreliable" because of their long-standing

financial ties to the pharmaceutical companies. However, this has not stopped groups with special interests from cherry-picking “facts” from these reports.

The alarmist claims that ‘nicotine is the addictive and harmful aspect of smoking’ are rooted in corrupt financial interests of pharmaceutical corporations trying to gain a monopoly on the nicotine market through NRT cessation products.

The e-cigarette has been a threat to the pharmaceutical nicotine profits, since it succeeded in taking half of the Nicorette market in 2012. Survey results in the American Journal of Preventative Medicine revealed respondents using e-cigarettes more than 20 times per day had a **quit rate of 70.0%**. Of those who had stayed off the smokes for 6 months; 34.3% were not using e-cigarettes or any nicotine-containing products by that point.

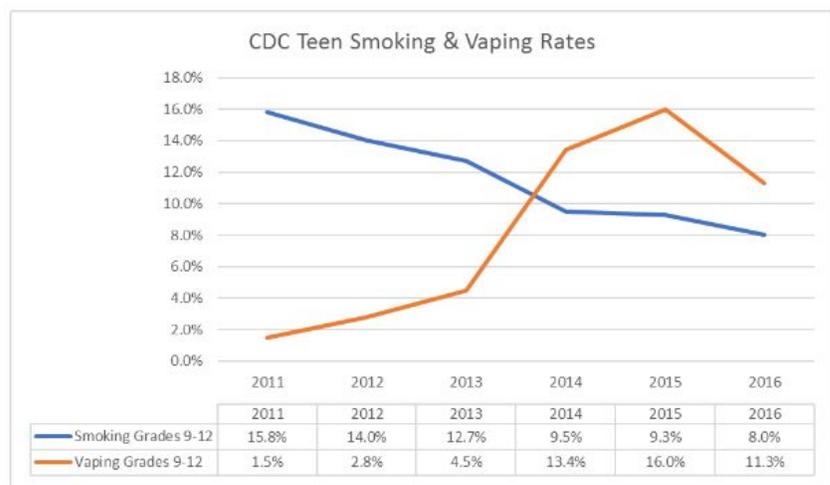
These results are astounding compared to endorsed nicotine replacement therapies that are far more expensive. For example, a study on the effectiveness of nicotine patches found just **8.2%** had abstained from smoking after 24 weeks. In a study of those using nicotine chewing gum, only **7.7%** of the prescribed gum group and **8.4%** in the over the counter gum group were not smoking at six months.

Smokers who switch to vaping are using a harm reduction method to abstain from cigarettes, and are able to detox the chemicals that are [intentionally] added to tobacco cigarettes to create an addiction above and beyond nicotine, while still satisfying cravings and oral fixation through a *clean delivery system for nicotine* suspended in vegetable glycerin and propylene glycol (both of which have been FDA approved for medical use for years.)

CLAIM: *Vaping is a gateway to smoking, re-normalizes smoking.*

ANALYSIS: Though repeated by many anti-tobacco groups, this speculation has no factual or statistical supporting basis. After a decade on the market, there is still **no evidence that vaping is a gateway to smoking**. Rather, there is evidence of the contrary. The CDC’s [most recent data](#) should put to rest the contention that electronic cigarettes are a gateway to smoking among youth. This new data shows that the prevalence of smoking among high school students was cut in half in just five years - from 2011 to 2016 - at the same time as the use of e-cigarettes among these very same students increased dramatically from 1.5% to a peak of 16.0% in 2015.

Not only has youth smoking declined at an unprecedented pace in the last five years, but for the first time, the prevalence of youth use of e-cigarettes has also declined, **dropping from 16.0% in 2015 to 11.3% in 2016** (among high school students). Use of cigarettes among



high school students continued to fall between 2015 and 2016, dropping from 9.3% **to 8.0%**.

This is great news because it reveals that smoking is truly becoming unpopular among youth. The rate of decline in youth smoking is unprecedented. This despite the rapid rise in e-cigarette experimentation. These data are simply **not consistent with the hypothesis that vaping is going to re-normalize smoking and that e-cigarettes are a gateway to youth smoking.**

The drop in e-cigarette use is also reassuring because it suggests that vaping is largely a social phenomenon that involves experimentation and that the addictive potential of these products is quite low. It also suggests that the popularity of youth vaping has peaked and that **concerns about vaping taking over and leading to nicotine addiction among a huge proportion of youth are not warranted.**

Landmark studies from [The Royal College of Physicians](#), [Public Health England](#), among others have determined **vaping does not act as a route into smoking for children or non-smokers.**

CLAIM: *Smoking causes 480,000 death per year in the U.S., and is responsible for approx \$3 billion in annual excess medical expenditures in Minnesota.*

ANALYSIS: According to the Royal College of Physicians' report 'Nicotine without smoke: tobacco harm reduction', **vaping has the potential to eliminate virtually all tobacco related harm.** Researchers have concluded that e-cigarettes are beneficial to public health; that **'smokers can therefore be reassured and encouraged to use them, and the public can be reassured that e-cigarettes are much safer than smoking.'** 11 million smokers have already successfully quit smoking by switching to vaping. Vaping has the potential to eradicate smoking in the U.S., alleviating the death toll and cost burden associated with smoking. [Public Health England](#) has already taken steps to promote vaping as a safer alternative to smoking. Bristol city council and public health officials have even offered carbon monoxide testing outside of local vape shops as an effort to [persuade smokers to switch to vaping.](#)

CLAIM: *Adolescents who smoke are 3x more likely to use alcohol, 8x more likely to use Marijuana, and 22x more likely to use cocaine.*

ANALYSIS: This claim illustrates that the legal status of a substance is not a barrier to youth who want to use it, and that 'raising the smoking age' is an ineffective way to combat youth smoking.

The age to purchase alcohol is 21 and has been for around 30 years. Marijuana and cocaine are illegal to purchase regardless of age. Though youth who experiment these substances may also smoke cigarettes, they do not use these substances *because* of cigarettes. Youth who have a proclivity toward using illicit and restricted substances, clearly do so regardless of age limit and legal status. There is no clear evidence that nicotine drives adolescents to use illicit substances. Rather, compromised psychological and emotional well being, and lack of awareness of the dangers and consequences, are to

blame for poor choices. Chaotic or abusive home life, depression, anxiety, anger, lack of self worth and confidence, rebellion and psychological reactance are all examples of root causes that lead an adolescent to make the choice to use a restricted substance.

More teens use alcohol than marijuana and tobacco combined. Clearly, the restrictive age of 21 hasn't impeded them from acquiring it. Additionally, meth and heroin have both become a problem in many U.S. schools despite being illegal. If teens are acquiring illegal substances like this, what makes us think they will not find a way to acquire cigarettes? Diffidence toward the law will not decrease by creating more perceivably arbitrary laws; if anything, it will only increase through psychological reactance by insulting the autonomy of those entering Age of Majority.

CLAIM: *During the years from ages 18-21, youthful experimentation often accelerates into daily use. It's a time when the adolescent brain is highly vulnerable, not developed enough to make potentially life altering choices. Humans do not reach a fully developed state until about 25 years of age, and until then lack the maturity, judgment and the ability to access risk in an appropriate form.*

ANALYSIS: At age 18, Minnesota adults can make their own medical decisions, get married, buy guns, own credit cards, vote, and join the military. If an 18-year-old commits a crime in Minnesota, they'll be charged as an adult and could even face the death penalty. Restricting an 18-year-old adult from buying tobacco products conflicts with the Age of Majority rule as defined in Minnesota Statute 645.451. If these young adults are considered too young to chose whether or not to use tobacco or vapor products, then they are also certainly too young to make decisions such as to risk their life serving in the military, to get gender reassignment surgery, or to accrue debt that will follow them the rest of their lives.

Our focus should be on cultivating whole and healthy adults through positive reinforcement and encouragement. According to a new report from the Minnesota Department of Human Services, 'rather than focusing on what youth are doing wrong, we should be emphasizing what the teens are doing right'. The CDC claims to have also found the approach to be effective in creating meaningful change on a range of issues.

Jill Ambuehl, a grant coordinator for Positive Community Norms in Hawley, MN describes the approach saying, "We are choosing to believe in our youth, so they can believe in themselves."

Meanwhile, tobacco control groups are taking the exact opposite approach. Not only are they overwhelming youth with negative statistics about the smoking rates of their peers, they are going as far as to negatively single out specific demographical groups, such as the LGBTQ the community.

For example: "If you identify as LGBTQ and are 18-24, you're nearly 2x as likely to smoke as your straight peers." - Truth Initiative

This message directly segregates a group of young adults based on their sexual identity, and targets them by using what is known as the 'nocebo effect' to instill negative programming and subsequently, negative outcome.

On a broader scale, tobacco control groups use this same *nocebo effect* through Tobacco 21, by negatively portraying the competency of young adults to make their own choices regarding tobacco use, as well as the ability of underage teens to, "just say no", by suggesting the government go as far as to step in and **take rights away from legal adults to 'protect the youth'**. The underlying message here is that *"we don't believe in the youth to make good choices"*. **This sends the message to teens and young adults that they are so incapable of making good choices that they require government intervention.**

This also reinforces the notion that smoking is of such prevalence, that drastic measures are being taken by municipalities to stop it. To an adolescent brain that is so "vulnerable" to suggestion, this is a dangerous misconception.

Tobacco control groups should take the advice from the MDOH, and focus more attention on celebrating our unprecedented and continued decline in youth and adult smoking. A quick look at the latest CDC data on youth smoking shows that our youth have already proven themselves responsible and worthy of our respect when it comes to making choices regarding tobacco use.

Contrary to popular belief, young adults are very informed about the dangers of smoking and using tobacco. **If we are expecting young men and women to live and die for this country, we should give them all possible and reasonable freedoms.** The decision of an adult to use tobacco or vapor products **should not be decided by the government.** That decision should come from each individual.

CLAIM: *70% of Minnesota adults are in favor of enacting Tobacco 21 laws.*

ANALYSIS: An average taken of 2017 Minnesota public polls show **71% of respondents oppose 'raising the smoking age' to 21.**

CLAIM: *65% of young people are in favor of raising the smoking age.*

ANALYSIS: Anti-smoking groups often coach high school students into speaking in support of Tobacco 21, while concurrently claiming that youth under the age of 21 are not developed enough to comprehend the ramifications of decisions such as whether or not to use nicotine. This is contradicting- if youth are not capable of making sound decisions until after they are 21, how then are they capable of comprehending

2017 Minnesota Public Polls Tobacco 21

Should Minnesota 'raise the smoking age' to 21?

Glencoe, MN - The McLeod County Chronicle: **No 61% Yes 34%**
 Hutchinson, MN - Hutchinson Leader: **No 50% Yes 49%**
 Mower County, MN - Kaus AM 1480: **No 84% Yes 16%**
 Wilmar, MN- West Central Tribune: **No 65% Yes 33%**
 St. Cloud, MN - WJON AM 1240: **No 66% Yes 33%**
 Minneapolis, MN - Star Tribune: **No 80% Yes 20%**
 Rochester, MN - Post Bulletin: **No 67% Yes 33%**
 St. Cloud, MN - 98.1 Country: **No 75% Yes 25%**
 Rochester, MN - Rock 107.7: **No 94% Yes 6%**

**71% of respondents said, "NO!"
The People Oppose Tobacco 21!**

6/23/17 Tobacco Harm Reduction 4 Life THR4Life.org 

the consequences of enacting laws that remove the rights of legal adults to make decisions for themselves, and add to the erosion of autonomy of U.S. citizens?

Moreover, if this number is accurate, then this is great news because it indicates that this percentage of people *is not interested in smoking*. This is not the demographic that we need to worry about, as they are already inclined to be non-smokers. Rather, it is the alleged 35% of those who are not in favor of such a policy, that need our focus, as they are more likely to become smokers, and even more likely to do so out of psychological reactance after their right to choose as adults, is stripped.

THR4Life Recommendation

When considering the harm reduction benefits of vaping and the dangers of smoking, it may seem logical to raise the legal age to purchase tobacco products to 21, while keeping the age to purchase vapor products at 18. While this could encourage adults over the age of 18 to choose vaping over smoking, we still need to consider the potential psychological backlash of removing freedom from legal adults. **The last thing we want is to do is risk hardening a young person's preference toward smoking, by turning smoking into a form of political activism or rebellion.**

Given the fact that our youth smoking and vaping rates are already steadily declining, we find tampering with this continued progress by adopting Tobacco 21 policies, to be hazardous to public health. We strongly advise legislators to consider the 'big picture' and the potential harm this legislation carries with it. Smoking and vaping are both losing popularity among youth, and community leaders should strive to **protect this progress by opposing Tobacco 21.**

Tobacco 21 is a poor method of addressing tobacco use and the ordinance should not be adopted into law.

"I support the goal of reducing smoking by young Minnesotans," he said. "However, people who are 18, 19 and 20 years old are legally adults and should generally be allowed to make the same personal decisions as older adults."

~ Mark Dayton, Governor of Minnesota ~

Nicotine without smoke: Tobacco harm reduction

<https://www.rcplondon.ac.uk/projects/outputs/nicotine-without-smoke-tobacco-harm-reduction-0>

Promote e-cigarettes widely as substitute for smoking says new RCP report:

<https://www.rcplondon.ac.uk/news/promote-e-cigarettes-widely-substitute-smoking-says-new-rcp-report>

E-cigarettes around 95% less harmful than tobacco estimates landmark

review: <https://www.gov.uk/government/news/e-cigarettes-around-95-less-harmful-than-tobacco-estimates-landmark-review>

Tobacco Use Among Middle and High School Students — United States, 2011–2016:

https://www.cdc.gov/mmwr/volumes/66/wr/mm6623a1.htm?s_cid=mm6623a1_w

E-Cigarettes Do Not Promote Cancer Growth in Lab Tests:

<http://newsroom.wiley.com/press-release/environmental-and-molecular-mutagenesis/e-cigarettes-do-not-promote-cancer-growth-lab->

British city council to advocate vaping on No Smoking Day:

<http://ecigintelligence.com/british-city-council-advocates-for-e-cigs-on-no-smoking-day/>

The Effects of E-Cigarette Minimum Legal Sale Age Laws on Youth Substance Use:

<http://www.nber.org/papers/w23313>

Comparison of select analytes in aerosol from e-cigarettes with smoke from conventional cigarettes and with ambient air: <http://www.sciencedirect.com/science/article/pii/S0273230014002505>