



TO: Senate Committee on Health & Human Services
FROM: Sarah Yale, MD, Pediatric Hospitalist & Unit Medical Director, Children's Wisconsin
DATE: Wednesday, March 11, 2020
RE: Support for SB 364 – Raising the legal age for purchase of nicotine, tobacco and vapor products

Chairman Testin and members of the committee, thank you for allowing me the opportunity to testify today. My name is Dr. Sarah Yale and I am a pediatric hospitalist and unit medical director at Children's Wisconsin.

I am here today to express my strong support for Tobacco 21 legislation and ask for your support on this important bill. I applaud the bill's authors, as well as the many bipartisan cosponsors of this legislation. At Children's Wisconsin, we strongly believe that e-cigarette and tobacco use is never appropriate, healthy or safe for kids and teens. As a physician, it's extremely frustrating that after years of progress which resulted in declining teen tobacco use, we are now witnessing an alarming increase in the use of e-cigarettes which should concern parents, providers and policymakers alike. Tobacco 21 represents a positive step to address the e-cigarette epidemic and to continue reducing youth tobacco use.

On a daily basis, our pediatricians see firsthand the prevalence of e-cigarette use and are concerned about the severe risks it poses to kids' health. As you are well aware, Children's has been on the forefront of the nationwide outbreak of severe lung injuries associated with the use of e-cigarette products. We are still learning about the effects of inhaling the aerosol vapors produced by these products and remain concerned about the harmful effects of teen use of tobacco products. Regardless of the contents being used in these devices, they have no place in the hands of our youth.

Let me tell you why we are concerned about youth tobacco and particularly e-cigarette use:

- Tobacco and e-cigarette products contain nicotine. This highly addictive drug has a negative impact on brain development, which continues until the mid 20s. The adolescent brain is exquisitely sensitive to nicotine, which can cause problems with learning and memory, as well as long-term behavioral impairments including depression, anxiety and mood disorders.
- Studies have shown that high exposure to nicotine in children makes them more susceptible to nicotine addiction and puts them at risk for lifelong addiction to tobacco products and other drugs. While there are resources available for youth to quit using traditional tobacco products, there are limited resources addressing youth e-cigarette cessation. Some may turn to using traditional tobacco products instead, which also have significant health risks. As with most public health issues, prevention is critical.
- There is also not sufficient data or research regarding both the short- and long-term health impacts of e-cigarette use among adults, let alone teens. We are still learning about the effects of inhaling the aerosol produced by these products, which contains harmful chemicals, heavy metals and ultrafine particles. Additionally, these products are easy to use: vaping devices and e-liquids come in appealing and pleasant flavors, they are easy to hide and have no residual odor, they are less expensive than traditional tobacco products and they don't require a lighter.

- In Wisconsin, three-quarters of high school students say it is easy to obtain tobacco products. There has been a 154% increase in teen e-cigarette from 2014, with 1 in 5 high schoolers reporting using e-cigarettes in 2018. This effectively represents a new generation of nicotine addicts and potential future traditional tobacco users.

I want to briefly share with you some of my experiences in caring for patients diagnosed with e-cigarette or vaping associated lung injury. As a pediatric hospitalist physician at Children's, I treat pediatric patients who are sick enough to be hospitalized. This past summer we started seeing previously healthy teenagers be hospitalized with a myriad of symptoms – shortness of breath, chest pain, fatigue, abdominal pain, and weight loss, just to name a few. They were requiring supplemental oxygen just to keep their oxygen saturations at normal levels. Even scarier, minimal activity such as getting up to go to the bathroom would make their oxygen saturations drop dangerously low, and measures we routinely use in the hospital would not improve their breathing. These patients had severe respiratory distress, and we called multiple rapid responses for deteriorating patients. Kids who previously spent their time on an athletic field now were in our ICU requiring a breathing tube and ventilator.

You would think that seeing these previously healthy and active kids decompensate would be the worst part, right? Well it wasn't. Looking these teens and their parents in the face and having to tell them that we didn't what their prognosis looked like and if their lungs would ever return to normal was worse. We don't know the long term effects of e-cigarettes - both to teens' lungs and to their developing brains. I had teenagers telling me they weren't sure if they could go more than an hour without vaping, and the fear they expressed when they realized the severity of their addiction is something that we cannot ignore. This is just a brief snapshot of what I have witnessed firsthand and illustrates why both myself and Children's Wisconsin believes passing a state law here in Wisconsin is so critical.

We are all familiar with the harmful risks associated with tobacco use including various cancers, lung disease, heart disease, stroke and more. We know that tobacco habits start when you're young: 90% of adults who use tobacco started in their teen years and 95% started before age 21. The younger a person starts using tobacco, the faster they become addicted and the harder it is for them to stop. Preventing use in the first place is critical to reducing the number of youth who smoke or use e-cigarette products and Tobacco 21 aims to do just that.

80% of kids turn 18 while in high school; unfortunately, this makes it easy to supply these products to their younger friends and classmates. That's why raising the purchase age to 21 helps make it more difficult for kids to access these products. Younger teens and middle schoolers are not as likely to be friends with 21-year-olds. Adults should be doing what we can to make these products unappealing and as hard as possible for our kids to get their hands on them.

While the federal government recently passed a national law to raise the age to legally purchase tobacco and e-cigarette products from age 18 to age 21, passage of this state bill is necessary. SB 364 will help ensure strong, adequate compliance and enforcement is conducted across the state. Important stakeholders, including law enforcement and retail partners, also need this legislation to ensure they can help keep these harmful products out of the hands of our young people and out of our high schools. Strong enforcement efforts are crucial to ensuring compliance with the law.

We hope to see cross-sector cooperation in preventing e-cigarette possession among our young people. This includes doing what we can to aid enforcement efforts to prevent kids from having easy access to these products and reduce their opportunities to try them in the first place.

Tobacco 21 is an important component of addressing this public health crisis among our youth. Together we can get ahead of it. I thank you for your time today and ask again for your support for this legislation. I am happy to answer any questions you may have.

Children's Wisconsin (Children's) serves children and families in every county across the state. We have inpatient hospitals in Milwaukee and the Fox Valley. We care for every part of a child's health, from critical care at one of our hospitals, to routine checkups in our primary care clinics. Children's Hospital also provides specialty care, urgent care, emergency care, dental care, school health nurses, foster care and adoption services, family resource centers, child health advocacy, health education, family preservation and support, mental health services, pediatric medical research and the statewide poison hotline.