

Tobacco 21 laws and their impact on youth smoking and vaping

Raising the minimum sale age for tobacco to 21 has emerged as a highly recommended measure for tobacco control systems. This briefing note reviews the history of Tobacco 21 measures and the research that has been conducted on the effectiveness of this measure at reducing tobacco or e-cigarette use by young people.

TOBACCO 21 LAWS HELP PROTECT YOUTH FROM SMOKING.

Tobacco remains the leading cause of preventable death in Canada. Tobacco products kill up to one-half of users,¹ and are currently responsible for more than one in six Canadian deaths.² Almost all people who use tobacco products start doing so as teenagers or as young adults.³

Measures which help protect youth and young adults from experimenting with and becoming addicted to tobacco will have long-term benefits for those individuals and for the community.

Laws which set the minimum legal age for the sale of cigarettes at 21 help protect young people by raising barriers to their accessing tobacco:

- They establish a new social and legal norm
- They prohibit the sale by retailers to those 20 years of age or younger
- They reduce the ability of younger teenagers to buy from their peer-group, creating a longer age buffer between those who are legally able to purchase and high-school students.
- They help create new norms for post-secondary education institutions and employers.

Tobacco 21 laws will protect many young people from starting to smoke or vape, and will also help those for whom it only defers the age of initiation.

- Those who start smoking at a younger age are more likely to find it difficult to quit.
- Nicotine use is harmful to the developing brains of young people.

TOBACCO 21 LAWS ARE IN PLACE AROUND THE WORLD.

At least 8 countries have set the minimum sale age for tobacco products at 21.

The United States changed its *Food, Drug and Cosmetic Act* to raise the

age from 18 to 21 on

December 20, 2019.⁴ The

Philippines did so in early

2020.⁵ Singapore increased

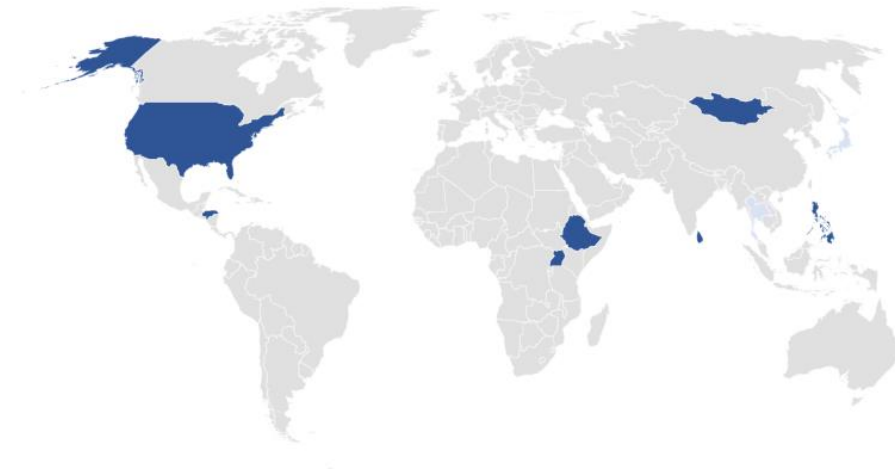
the age to 21 in January

2021.⁶ Other countries

include: Mongolia (2013),⁷

Uganda (2016),⁸ Ethiopia

(2019),⁹ Honduras (2010),¹⁰ and Sri Lanka (2006)¹¹



There are additional countries which have a minimum age higher than those in effect in most parts of Canada include Thailand (20 years, set in 2017)¹² and Japan (20 years, set in 2001).¹³

Some sub-national jurisdictions (provinces, cities or states) have also adopted age 21 restrictions:

- Prince Edward Island is the only Canadian jurisdiction where the minimum legal sale age is 21. This measure was adopted in December 2019 and came into force on March 1, 2020.¹⁴ Those who were 19 at the time of introduction are exempted from the law.
- Prior to the change in U.S. federal law, half of the U.S. population lived in the 19 states or 540 cities where the minimum age had already been raised.¹⁵

CANADIANS SUPPORT TOBACCO 21

- In December 2019, an Ipsos Reid poll commissioned by Global News found that about 80% of Canadians supported raising the minimum age to 21 for the purchase of vaping products.¹⁶ The previous year support had been measured at 72%.¹⁷
- A survey conducted by the ITC consortium found a 70% support for raising the age to 21 in Canada in 2018.¹⁸
- In response to Health Canada's consultation paper on "The Future of Tobacco Control in Canada", about three-quarters (73%) of respondents supported the idea of raising the minimum legal age to 21.¹⁹

CANADIAN HEALTH AGENCIES SUPPORT TOBACCO 21

Raising the minimum legal age for tobacco and vaping products to 21 is supported by the following Canadian health organizations:

- Canadian Cancer Society.²⁰
- Heart and Stroke Foundation of Canada.²¹
- Clean Air Coalition of B.C.²²
- Canadian Cancer Society.²³
- Manitoba Tobacco Reduction Alliance²⁴
- Physicians for a Smoke-Free Canada.²⁵
- Saskatchewan Coalition for Tobacco Reduction²⁶
- Smoke-Free Nova Scotia.²⁷
- The Lung Association²⁸
- Doctors Nova Scotia²⁹

CANADA'S MEDICAL OFFICERS OF HEALTH SUPPORT TOBACCO 21

Provincial health authorities which endorse raising the age to 21 include:

- Québec directeur national de santé publique³⁰
- Council of Chief Medical Officers of Health.³¹

TOBACCO AND VAPING COMPANIES POSITIONS ON TOBACCO 21.

Tobacco and vaping suppliers which support increasing the minimum age to 21 include:

- JUUL Labs.³²

Suppliers whose public positions do not include support for raising the age to 21 include:

- Vaping Industry Trade Association.³³
- Canadian Vaping Association.³⁴
- Imperial Tobacco Canada Ltd.³⁵
- Rothmans, Benson & Hedges³⁶
- JTI-Macdonald³⁷

“Opportunities for both federal and provincial/territorial jurisdictions....

... Consider making the age of 21 the minimum sales age for both tobacco and vaping products, knowing that establishing the legal minimum sales age requires balancing policy objectives to minimize an illegal market while delaying the onset of youth use through limiting access through social sources.”

COUNCIL OF CHIEF MEDICAL OFFICERS OF HEALTH ON NICOTINE VAPING IN CANADA, 2020.

SELECTED RESEARCH ON TOBACCO 21:

2021

- Bryan, C, Hansen, B, McNichols, D, Sabia, JJ.
Do State Tobacco 21 Laws Work?
NBER Working Paper 28173
This study reviewed data from the U.S. Behavioral Risk Factor Surveillance Survey and Youth Risky Behavior Surveys. It found that Tobacco 21 laws reduced smoking rates of 18 to 20 year olds by 2.5 to 4 percentage points. The authors concluded that Tobacco 21 laws were more effective at reducing youth use than raising cigarette taxes.
- Choi K, Omole T, Wills T, et al
E-cigarette-inclusive smoke-free policies, excise taxes, tobacco 21 and changes in youth e-cigarette use: 2017–2019
Tobacco Control Published Online First: 25 February 2021.
This study reviewed data from the Youth Risk Behaviour Survey in 2017 and 2019. The authors found that states with Tobacco 21 laws did not have an increase in youth e-cigarette use during this period, although states with lower legal age did.
- Hawkins SS, Kruzik C, O'Brien M, et al
Flavoured tobacco product restrictions in Massachusetts associated with reductions in adolescent cigarette and e-cigarette use
Tobacco Control Published Online First: 27 January 2021.
This study used the Massachusetts Youth Health Surveys to look at the rate of change of youth smoking behaviour in counties within the state that had different tobacco control policies. Age 21 laws were found to make a difference in the smoking rates of 18 year olds.
- Boettiger, DC and White, JS
Cigarette Pack Prices and Sales Following Policy Changes in California, 2011-2018
Am J Public Health, 2020 Jul; 110(7).
This study compared tobacco sales in California (which adopted Tobacco 21 laws in 2016) with states which had not.
- Dobbs P, Chadwick G, W Ungar K, et al
Development of a tobacco 21 policy assessment tool and state-level analysis in the USA, 2015–2019
Tobacco Control 2020;29:487-495.
This study reviewed the Tobacco 21 policies that were implemented in U.S. jurisdiction, and describes the various approaches taken.
- Edwards, R.
Has the time come to focus on (young adult) smoking uptake prevention?
Nicotine and Tobacco Research, Vol. 22, 2020.
This commentary provides a rationale for giving priority to stronger measures to prevent young people from starting to smoke.
- Friedman, AS. Wu, PJ.
Do Local Tobacco-21 Laws Reduce Smoking Among 18 to 20 Year-Olds?
Nicotine & Tobacco Research, Volume 22, Issue 7, July 2020, Pages 1195–1201,
This study looked at smoking rates in metropolitan areas where Tobacco 21 laws were in place and found that 18 to 20 year olds in such locations were 1.2 percentage points less likely to be smokers.
- Liber AC, Xue Z, Cahn Z, et al
Tobacco 21 adoption decreased sales of cigarette brands purchased by young people: a translation of population health survey data to gain insight into market data for policy analysis
Tobacco Control Published Online First: 03 December 2020.
This study used analytic modelling to compare the sale of cigarette brands that were preferred by young people in states which had adopted Tobacco 21 laws and those which had not. Sales data was taken from Nielsen Scantrack was used from 2015 to 2019, and brand preference from the National Survey on Drug Use and Health from 2015 to 2018. Tobacco 21 had a stronger connection to reduced sales of youthful brands than did other factors.

2020

- [Ali FRM, Rice K, Fang X, et al](#)
[Tobacco 21 policies in California and Hawaii and sales of cigarette packs: a difference-in-differences analysis](#)
[Tobacco Control 2020;29:588-592.](#)
This study looked at the change in overall tobacco sales in states which had adopted Tobacco 21 measures against comparable other states. They found that sales were reduced by 13% to 18% following adoption of a higher legal age.

- Nuyts, PAW, Kuipers, AG, Willemsen, MC, Kunst, AE. An Increase in the Tobacco Age-of-Sale to 21: For Debate in Europe
Nicotine & Tobacco Research, 2020, 1247–1249
This paper analyzes the development of Tobacco 21 laws, and their appropriateness for European countries.
- Wells Economic Analysis
T21: Raising the minimum age for tobacco sale in Tasmania to 21 years. Economic Analysis.
Thus commissioned analysis reviewed the impact on the business sector resulting from reduced tobacco sales (\$3 - \$4 million per annum) and the economic benefits to Tasmania of reduced smoking (\$72 million per annum).

2019

- Reynolds, MJ, Crane, R, Winickoff, JP.
The Emergence of the Tobacco 21 Movement From Needham, Massachusetts, to Throughout the United States (2003–2019)
AJPH November 2019
This paper describes the development of Tobacco 21 laws in the United States, and the process of early legislative change.

2018

- Macinko J, Silver D.
Impact of New York City’s 2014 increased minimum legal purchase age on youth tobacco use.
Am J Public Health. 2018;108(5):669–675
New York City adopted 21 as the legal age for tobacco sales in 2014. This study compared adolescent tobacco use in the city with that in other parts of New York State. They found that smoking among young people in New York City did not fall more than in other parts of the state.
- Zhang X, Vuong TD, Andersen-Rodgers E, et al
Evaluation of California’s ‘Tobacco 21’ law
Tobacco Control 2018;27:656-662.
This paper reports on the California government’s evaluation of the Tobacco 21 law that came into effect in 2016, including retailer awareness and compliance.

2016

- Kessel Schneider S, Buka SL, Dash K, Winickoff JP, O’Donnell L.
Community reductions in youth smoking after raising the minimum tobacco sales age to 21.
Tobacco Control. 2016;25(3):355–59
This study looked at the impact of Tobacco 21 in the first jurisdiction where it was implemented (Needham, Massachusetts, in 2005) and compared youth tobacco use there and in 16 comparable jurisdictions. The reduction of youth smoking in Needham was significantly higher.

2015

- Bonnie, RJ., Stratton, K and Kwan, LE.
Public Health Implications of Raising the Minimum Age of Legal Access to Tobacco Products
Institute of Medicine. National Academies Press.
“The report reviews the existing literature on tobacco use patterns, developmental biology and psychology, health effects of tobacco use, and the current landscape regarding youth access laws, including minimum age laws and their enforcement. Based on this literature, the report makes conclusions about the likely effect of raising the minimum age to 19, 21, and 25 years on tobacco use initiation. The report also quantifies the accompanying public health outcomes based on findings from two tobacco use simulation models. According to the report, raising the minimum age of legal access to tobacco products, particularly to ages 21 and 25, will lead to substantial reductions in tobacco use, improve the health of Americans across the lifespan, and save lives.”

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- 3 Hammond, D. Smoking behaviour among young adults: beyond youth prevention *Tobacco Control* 2005;14:181–185
- 4 U.S. Food and Drug Administration. Notice. Newly Signed Legislation Raises Federal Minimum Age of Sale of Tobacco Products to 21. January 2020.
- 5 [Philippines. Republic Act 11467. An Act Amending Sections 109, 141, 142, 143, 144, 147, 152, 263, 263-a.... “](#)
- 6 [Singapore. Tobacco \(Control of Advertisements and Sale\) Act, amended 2017.](#)
- 7 [World Health Organization. FCTC Secretariat. Mongolia-Comprehensive tobacco control legislation revised. April 2013.](#)
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- 9 [Ethiopia. Food and Medicine Administration Proclamation No. 1112/2009.](#)
- 10 Honduras Ley Especial para el Control del Tabaco, or “LECT”), Decree No. 92-2010.
- 11 Sri Lanka. National Authority on Tobacco and Alcohol Act, No. 27 of 2006.
- 12 [Thailand. Tobacco Products Control Act, 2017](#)
- 13 [Japan. Act Prohibiting Smoking by Minors, No. 33 of 1900 \(as amended\)](#)
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- 16 Global News. Most Canadians support increasing e-cigarette legal purchase age to 21: Ipsos poll. Ipsos Reid. 2019 Year End Poll.
- 17 Canadian Cancer Society. Issue Brief. 21 as the minimum age for tobacco and e-cigarette sales.
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