In November 2019, Massachusetts became the first state to restrict the sale of all flavored tobacco products, including menthol cigarettes, followed by California in 2020 (implementation pending a referendum vote). In 2020, New Jersey, New York and Rhode Island also passed bans on the sale of flavored e-cigarettes. In addition, over 360 localities across the U.S. have enacted restrictions on the sale of flavored tobacco products, although laws differ in their application to specific products and store types. Over 170 of these communities restrict the sale of menthol cigarettes, in addition to other flavored tobacco products.

Emerging Evidence from U.S. State and Local Flavor Restrictions is Promising

Because it is a relatively new strategy, data on the impact of flavored tobacco sale restrictions is still emerging. However, the available data indicate that strong laws can be easily implemented and can help reduce youth access to and use of tobacco by removing from store shelves the products that are most attractive to youth and the products that youth use most often. A 2020 Surgeon General report concluded that, “Prohibiting flavors, including menthol, in tobacco products can benefit public health by reducing initiation among young people and promoting cessation among adults.”

Research also points to the importance of strong laws with robust enforcement programs, including retailer education. Weak enforcement measures and exemptions can reduce compliance and have other unintended consequences. In many localities, the most commonly sold noncompliant products were cigars or cigarillos with “concept flavors” like “Blue,” “Jazz,” and “Wild Rush.” Case studies show that retailer education and providing retailers with a list of known flavored products can help to increase compliance. A report from the Johns Hopkins University concluded that, “When compliance is high, a comprehensive flavor ban or restriction without exemptions is likely to significantly affect sales of flavored tobacco products” and that, “A comprehensive flavor ban without product, flavor, and retailer exemptions may maximize public health benefits and minimize the opportunity for unintended consequences.”

California Local Policies

In 2017, the San Francisco Board of Supervisors enacted the first comprehensive ban on all flavored tobacco products, which was upheld by city voters in June 2018. The San Francisco Department of Public Health’s outreach and retailer education efforts extended through the fall of 2018. Between January and December 2019, compliance was 80%, compared to 18% in December 2018. Sales data show that flavored tobacco product sales decreased by 96% in San Francisco after implementation of the city law in early 2019. Total tobacco sales also significantly decreased over the same period, suggesting consumers did not broadly switch to unflavored tobacco products. The study concluded, “A reduction in total tobacco sales in SF suggests there was not a one-to-one substitution of tobacco/unflavored products for flavored products.”

In 2018, Oakland restricted the sale of all flavored tobacco products to adult-only tobacco retailers. From 2017 to 2019, high school e-cigarette use in Oakland declined from 11.2% to 8.0% and high school smoking declined from 4.4% to 2.4%. Oakland later strengthened its law to remove the retailer exemptions.

A survey conducted in 2019 found that youth and young adult flavored e-cigarette users who lived in a California locality with a flavored restriction were less likely than their peers in the rest of the state to report obtaining flavored e-cigarettes from a retail source, but more likely to report obtaining them from a social source.
New York City, NY

New York City restricted sales of flavored tobacco products (excluding e-cigarettes and menthol cigarettes) in 2009 and began enforcement in November 2010. In 2020, New York City’s law was strengthened to prohibit flavored e-cigarettes, but evaluation data is not yet available on the new law.

- **Implementation:** Retailer scanner data through 2012 showed sale of all flavored cigar, smokeless and pipe/roll-your-own tobacco declined by 87%. These declines were coupled with only minor increases in the sale of non-flavored cigars and pipe/roll-your-own tobacco (5% and 4%, respectively).6 Out of over 75,000 compliance checks conducted from 2010 to 2015, the New York City Department of Community Affairs found only a 4.1% violation rate.7
- **Youth tobacco use:** Data from the New York City YRBS shows that New York City teens in 2013 had 37% lower odds of ever-trying flavored tobacco products and 28% lower odds of ever using tobacco products than teens in 2010. The percent of New York City teens who reported ever use of flavored tobacco products or use of any tobacco products declined significantly after the policy was implemented (from 19.6% in 2010 to 15.6% in 2013; a 20% decline).8

Together, these findings indicate that not only are retailers complying with the New York City ordinance, it is effectively reducing youth access to and use of these products.

Massachusetts

**Local Policies**

Research shows that local-level policies passed before the statewide law had an impact on reducing youth use and access to flavored tobacco products.

- Counties with greater implementation of flavored tobacco product restrictions (restricting flavored non-cigarette tobacco products to adult-only retailers) were associated with reductions in the likelihood of current e-cigarette use and a decrease in the frequency of cigarette use among users.9
- Store assessments conducted 8-10 months after implementation of Boston’s law restricting the sale of flavored non-cigarette tobacco products, 14.4% of stores were selling flavored products, compared to 100% before the law was implemented. The law also led to a significant reduction in advertising for flavored tobacco products. Flavor advertisements were present in 28% of retailers at follow-up, compared to 58.9% before the law. Finally, the law reduced retail demand for flavored tobacco products. After the law, 64% of retailers reported that customers only asked for flavored products a few times a week or did not ask at all.10
- After implementing flavored tobacco restrictions, Salem and Attleboro experienced significantly smaller increases in current use of flavored and nonflavored tobacco products, compared to Gloucester, a locality with similar demographics but no flavored tobacco restriction.11

**Statewide Policy**

The statewide menthol ban was associated with a statistically significant decrease in state-level menthol and all cigarette sales. Adjusted 4-week sales of cigarettes in Massachusetts, compared to comparison states that had not passed flavor policies, decreased by 372.27 packs per 1000 people for menthol cigarettes but increased by 120.25 packs per 1000 people for nonflavored cigarettes. Overall, the adjusted 4-week sales of all cigarettes decreased by 282.65 packs per 1000 people in Massachusetts vs. the comparison states.12 Despite a small increase in menthol pack sales in bordering states, the law still led to a net decrease of 340.51 packs per 1000 persons across Massachusetts and its bordering states.13 Another analysis similarly found that the law did not have any significant impact on cross-border sales in neighboring states where menthol cigarettes are sold. Menthol and overall cigarette sales in border states did not significantly change and were not significantly different from patterns in non-border states.14

**Minnesota Local Policies**

In 2016, both Minneapolis and St. Paul implemented laws restricting all flavored non-cigarette tobacco products to adult-only retailers. In both Minneapolis and St. Paul, significantly fewer convenience and
grocery stores sold flavored tobacco after policy implementation. In Minneapolis, availability was reduced from 85.4% of retailers before implementation to 39% after 5 months and 15.4% after 14 months. In St. Paul, availability was reduced from 97.3% of retailers before implementation to 8.1% after 2 months. While Minneapolis saw a decrease in the sale of concept-flavor (e.g., “Blue”) cigars (from 80.5% to 61.5%), St. Paul had an increase (from 67.6% to 81.1%).

From 2014 to 2017, youth e-cigarette use in the Twin Cities increased by a much lesser extent than the rest of Minnesota (34.1% vs. 114% increase), suggesting that these policies attenuated the increases in e-cigarette use that occurred in the rest of the state.16

In 2018, Minneapolis and St. Paul implemented stronger laws that included restrictions on menthol cigarettes, but they added liquor stores to the definition of exempted retailers. In the same year, Duluth and Falcon Heights implemented comprehensive flavored tobacco bans with no retailer exemptions. Compliance has been high across all four cities, with only eight retailers found to be non-compliant. Minneapolis and St. Paul’s policies led to 76% and 62% reductions in the number of retailers selling menthol cigarettes, respectively, whereas Duluth and Falcon Heights saw larger reductions (95% and 100% respectively) because they did not allow for retailer exemptions.17 From 2016 to 2019, e-cigarette use and any tobacco use increased by a lesser extent in the Twin Cities area than the rest of Minnesota, and cigarette, cigar, and hookah use prevalence decreased to a greater extent in the Twin Cities than the rest of the state.18

Providence, RI

In January 2013, Providence began enforcement on its sales restriction on flavored non-cigarette tobacco products (except mint, menthol and wintergreen). Sales data from 2012 to 2016 show that sales of cigars with explicit flavor names (e.g., Cherry) declined by 93%. However, sales of concept-flavor cigars (e.g., Jazz) increased by 74%, resulting in a 51% overall decline in flavored cigar sales.19

International Evidence

In October 2017, Canada banned menthol cigarettes nationwide, although most provinces had banned menthol cigarettes prior to the nationwide law. A study from the International Tobacco Control Policy Evaluation Project (ITC), using longitudinal surveys of Canadian smokers in seven provinces from 2016-2018, found that after implementation of the law, menthol smokers were more likely to try to quit than non-menthol smokers (59% vs. 49%), and were twice as likely to have quit smoking for at least six months (12% for daily menthol smokers and 10% for occasional menthol smokers), compared to non-menthol smokers (3%), with no significant differences in relapse rates. Menthol smokers also reported more quit attempts than non-menthol smokers. Daily menthol smokers reported an average of 3 quit attempts, compared to 2.6 for occasional menthol smokers and 1.2 for non-menthol smokers.20

Earlier studies of Ontario’s provincial menthol ban found that the law was associated with significant reductions in menthol cigarette sales and total cigarette sales.21 In addition, the law was associated with increases in quit attempts and cessation:

- A 1-year follow-up survey found that both daily and occasional menthol smokers were more likely to report having quit smoking (24% and 20% vs 14%) or having made a quit attempt (63% and 62% vs 43%), compared to non-menthol smokers.22
- A 2-year follow-up survey found that menthol smokers were more likely to report having quit smoking for at least the last 6 months (12% for daily menthol smokers and 10% for occasional menthol smokers), compared to non-menthol smokers (3%), with no significant differences in relapse rates. Menthol smokers also reported more quit attempts than non-menthol smokers. Daily menthol smokers reported an average of 3 quit attempts, compared to 2.6 for occasional menthol smokers and 1.2 for non-menthol smokers.23

Based on this research from Canada and Ontario’s bans, researchers estimate that a menthol ban in the United States would lead over 1.3 million smokers to quit, including 381,000 Black smokers.24 It is important to note that menthol cigarettes comprised a much smaller proportion of the Canadian cigarette marketplace (~5%) than the US marketplace (37%), and the demographics of menthol smokers are very different between the two countries.
In May 2020, the European Union and the United Kingdom banned the sale of menthol cigarettes. Similar to Canada, emerging research shows a positive impact on quitting behaviors. According to data from the Netherlands, pre-ban menthol smokers were significantly more likely to attempt to quit than non-menthol smokers (66.9% vs. 49.6%) and a higher, but non-significant proportion of pre-ban menthol smokers reported quitting (26.1% vs. 14.1%). Researchers estimate that if the 12.0% additional quitting found in the Netherlands were applied to the entire European Union and United Kingdom, there would be more than a million additional quitters.25

5 Liu, J, et al. "Youth tobacco use before and after flavoured tobacco sales restrictions in Oakland, California and San Francisco, California,” Tobacco Control, published online March 17, 2022.
23 Chaiton, M, et al., “Prior daily menthol smokers more likely to quit two years after a menthol ban than non-menthol smokers: a population cohort study.” Nicotine & Tobacco Research, published online March, 10, 2021.