Risk Conflation: How Generalized Claims About "Tobacco" and "Nicotine" Obscure Product Differences and Undermine Public Health Policy

From PPI's Project to End Smoking

Introduction

FDA recognizes a continuum of risk across tobacco products: combustible cigarettes are the most harmful, while noncombustible products pose lower, though not zero, health risks. That distinction matters for policy. Cigarette smoking, not tobacco use or nicotine use broadly, is responsible for the mortality and disease burden most commonly cited in legislative testimony.

When this distinction is obscured, policymakers may respond to lower-risk products with the policy force appropriate for cigarettes. That can restrict access to FDA-authorized noncombustible alternatives that may help adults who smoke move away from the most harmful tobacco product.

Risk conflation occurs when advocacy testimony, fact sheets, or policy materials use broad terms such as "tobacco," "tobacco use," or "nicotine" in ways that obscure meaningful differences in risk across products. Policymakers evaluating tobacco-related legislation on taxation, retail access, flavor restrictions, and product regulation regularly encounter this communication pattern from advocates. The result is that deaths, diseases, and economic costs caused overwhelmingly by cigarette smoking may be presented as though they apply equally to all tobacco or nicotine products.

This brief explains what risk conflation is, how it appears in policy advocacy, and the questions policymakers can ask to ensure that evidence presented to them is product-specific, scientifically accurate, and useful for designing risk-proportionate tobacco policy.

1. FDA's Role and the Continuum of Risk

In 2009, Congress passed the Family Smoking Prevention and Tobacco Control Act, giving the U.S. Food and Drug Administration the central federal role in evaluating tobacco product risk.[1] Many of the leading tobacco-control organizations — including the American Cancer Society, American Heart Association, American Lung Association, and Campaign for Tobacco-Free Kids — supported this legislation and the principle behind it: questions about which products reduce risk and by how much should be answered by independent scientific review, not by manufacturers' claims or advocates' assertions.

Through that authority, the FDA has formally concluded that tobacco product risks exist on a continuum:

> "No tobacco product is safe. However, the health risks for different tobacco products exist on a spectrum, which is sometimes referred to as a 'continuum of risk.' Combusted, or smoked, tobacco products — such as cigarettes — are the most harmful type of tobacco product. Non-combusted products — such as e-cigarettes and other smokeless tobacco products — generally have lower health risks than cigarettes and other combustible tobacco products."[2]

2. Why Product-Specific Risk Matters for Policy

Understanding the continuum of risk matters for policy because it supports a risk-proportionate framework in which the most harmful product — cigarettes — faces the greatest policy pressure, while ensuring adults who smoke have access to lower-risk alternatives.

Tax policy should reflect product risk. Excise taxes should be highest on cigarettes and meaningfully lower on FDA-authorized noncombustible products — that evidence indicates pose substantially lower risks than cigarettes. Meaningful price differentials give adults who smoke a financial incentive to transition toward products that carry significantly lower health risks.

Retail policy should preserve adult access while strengthening youth protections. FDA-authorized noncombustible products should be available in the same retail locations where adults purchase cigarettes, subject to retailer licensing, age verification, and enforcement against sales to minors.

A risk-proportionate approach should never mean weaker youth protections; it should mean stronger enforcement against youth access while preserving options for adults who smoke.

Risk Conflation

Risk conflation is a communication pattern that uses generalized categories such as "tobacco," "tobacco use," or "nicotine" to obscure meaningful differences in harm across nicotine products. Risk conflation is not simply acknowledging that all tobacco products carry some risk — they do. Risk conflation can make substantially different products appear to belong to a single risk category — either by implying that all tobacco products carry cigarette-level harms or by treating nicotine itself as the primary public-health risk.

The policy consequences are clear. If policymakers come away from testimony with the impression that tobacco use generally, or nicotine use specifically, is the leading cause of preventable death, they are more likely to treat all products similarly. If, instead, policymakers are clear that cigarette smoking specifically remains the leading cause of preventable death and have an accurate understanding of nicotine risks, they are better positioned to support risk-proportionate policies that can accelerate declines in adult smoking.

4. Recognizing Risk Conflation in Testimony and Policy Materials

Risk flattening appears in committee testimony, written submissions, fact sheets, and infographics. The two most common patterns are outlined below, along with the facts and clarifying questions policymakers should ask.

First Pattern: All tobacco products are given cigarette-specific harms

This pattern presents cigarette-caused mortality and healthcare costs under broader categories such as "tobacco use" or "nicotine use," creating the impression that those harms apply across all products.

Risk conflation example:

"Despite enormous progress in reducing smoking, tobacco use is still the leading cause of preventable death in the United States and imposes a terrible toll on families, businesses, and government. Tobacco kills more than 490,000 people annually — more than AIDS, alcohol, car accidents, illegal drugs, murders, and suicides combined. Tobacco costs the U.S. over $241 billion in health care expenditures and more than $365 billion in lost productivity each year."[3]

This passage begins with "smoking" but then shifts to "tobacco use," "tobacco kills," and "tobacco costs," even though the mortality and cost data are smoking-attributable.

The CDC has calculated the health and mortality impacts of cigarette smoking for decades, and these are regularly summarized in the U.S. Surgeon General's Reports on Smoking and Health and many other federal publications.

> "Cigarette smoking remains a major cause of death and disease — including cancer, cardiovascular disease, and chronic obstructive pulmonary disease — among all racial and ethnic groups. More than 490,000 deaths attributable to cigarette smoking and exposure to secondhand tobacco smoke are estimated to occur in the United States each year — about one in five of all deaths in the United States. This includes more than 473,000 deaths attributable to cigarette smoking and more than 19,000 deaths attributable to exposure to secondhand tobacco smoke."
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> **— The United States Surgeon General in 2024[4]**

The CDC also calculates healthcare[5] and lost productivity[6] costs associated with adult cigarette smoking. These estimates show that cigarettes cause hundreds of billions of dollars in annual healthcare costs — roughly half of which are covered by Medicaid. Unlike cigarette smoking, there are no comparable mortality or healthcare cost estimates for e-cigarettes, nicotine pouches, or heated tobacco products.

Questions policymakers should ask. Ask whether the cited mortality data are derived from epidemiological studies of cigarette smoking specifically. Ask if there are scientifically validated mortality risks for the products subject to the policy being proposed. Ask which products are included in the healthcare cost methodology and whether those costs would be incurred in the absence of cigarette smoking.

Second Pattern: Nicotine itself is framed as the primary harm

The second risk conflation pattern frames nicotine use and nicotine addiction as the primary public-health concerns. This pattern creates an impression that all nicotine-containing products should be subject to the same restrictions regardless of their health risk profile. By emphasizing the dangers of nicotine without a comparative-risk context, this pattern can replace the science-based continuum of risk with a generalized concern about nicotine use.

The scientific consensus — reflected in the FDA's own public guidance — is that nicotine is the primary driver of addiction to tobacco products, but not the primary cause of the cancers, lung disease, and heart disease associated with cigarette smoking. Those diseases are driven largely by toxicants produced through combustion.

> "Tobacco products containing nicotine pose different levels of health risk to adult users. Combustible products, or products that burn tobacco, are the most harmful. An example of a combustible product is cigarettes, which deliver more than 7,000 chemicals along with nicotine that makes it hard to quit. FDA-approved nicotine replacement therapies (NRTs), such as gums and lozenges, are the least harmful. Noncombustible products, such as heat-not-burn tobacco products, smokeless tobacco, and e-cigarettes, fall somewhere in between combustible products and NRTs."
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> **— U.S. Food and Drug Administration**[7]

Questions policymakers should ask. Ask how the harms associated with nicotine itself compare with the harms caused by cigarette smoking. Ask whether the organization distinguishes between ending cigarette smoking and ending all nicotine use as a policy goal, and which goal is best served by the specific policy under consideration.

When Policymakers Should Ask Clarifying Questions

The leading mortality, morbidity, or cost figure uses "tobacco use" or "nicotine use" as its subject, while the cited source is a study of cigarette smoking specifically.

The policy goal is framed as ending "nicotine addiction" or producing a "nicotine-free society" rather than ending smoking-related harm.

References to the FDA's continuum-of-risk determination or specific product authorizations are absent or limited to dismissive characterizations.

5. Conclusion

Risk conflation, whether it operates by presenting cigarette-attributable harms under generalized "tobacco" headings or by framing nicotine as the primary public health concern, can lead policymakers away from risk-proportionate tobacco policies and toward policies that treat all nicotine products the same. The result can be policies less likely to accelerate the end of combustible cigarette smoking — and less likely to reduce smoking-related disparities.

The standard should be simple: all parties — advocacy organizations, regulated industry, and government public health professionals — should speak precisely about which products produce which harms, distinguish youth protection from adult smoking harm reduction, and align their policy proposals with that precision.

What this brief does — and does not — argue

This brief does not argue that any tobacco product is safe, or that youth nicotine use should be tolerated. It argues that the FDA's tobacco regulatory science is credible and rigorous, that the FDA's determinations represent the best available federal science on comparative tobacco product risk, and that policymakers should give those determinations serious weight when considering tobacco-related legislation.

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ABOUT PPI'S PROJECT TO END SMOKING

The **Project to End Smoking** is designed to accelerate the decline in cigarette smoking in the United States. We believe it is possible to both protect youth from nicotine product use and dramatically accelerate adult smoking cessation. Achieving this requires better aligning public health policy with scientific evidence on nicotine risk and smoking cessation.

The Project to End Smoking advances people-centered, risk-proportionate policy strategies that align smoking cessation goals with real-world nicotine use patterns, particularly among populations for whom existing smoking cessation approaches have fallen short.

ABOUT PPI

Founded in 1989, the Progressive Policy Institute is a catalyst for policy innovation and political reform based in Washington, D.C. Its mission is to create radically pragmatic ideas for moving America beyond ideological and partisan deadlock.

Notes and References

1 *Family Smoking Prevention and Tobacco Control Act,* Public Law No. 111-31, 123 Stat. 1776 (2009), https://www.congress.gov/bill/111th-congress/house-bill/1256.

2 U.S. Food and Drug Administration, "The Relative Risks of Tobacco Products," updated March 12, 2026, https://www.fda.gov/tobacco-products/health-effects-tobacco-use/relative-risks-tobacco-products.

3 Campaign for Tobacco-Free Kids, "The Toll of Tobacco in the United States," updated December 2025, https://www.tobaccofreekids.org/problem/toll-us.

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5 Xu, X., Shrestha, S. S., Trivers, K. F., Neff, L., Armour, B. S., & King, B. A. (2021). U.S. Healthcare Spending Attributable to Cigarette Smoking in 2014. *Preventive Medicine*, 150, 106529.

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7 U.S. Food and Drug Administration, "Nicotine is Why Tobacco Products are Addictive," updated May 6, 2026, https://www.fda.gov/tobacco-products/health-effects-tobacco-use/nicotine-why-tobacco-products-are-addictive.