Case studies on the impact of the revision of the European Union Tobacco Tax Directive

Higher tax jurisdictions: Finland, Denmark, Netherlands, Belgium, and France

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1. Introduction

The revision of the European Union's (EU) Tobacco Tax Directive (Council Directive 2011/64/EU, known as the Current TTD) is set to resume following the 2024 European Parliament elections and the appointment of a new European Commission. An unofficial draft of the proposed reforms has been circulating since late 2022. This draft (referred to as the Draft TTD) was evaluated in previous research,[1] which concluded that while the proposed reforms would benefit tobacco control, they fall short in several key areas, particularly regarding the minimum taxes applicable to tobacco and related products. To address these shortcomings, a series of amendments (referred to as the Enhanced Draft TTD) have been proposed in a recent report.[2]

The evaluation of the Draft TTD and the formulation of the Enhanced Draft TTD were based on evidence predicting the likely evolution of several outcomes, comparing these potential pieces of legislation against a baseline scenario where the current TTD remains in force. Estimates for product prices, affordability, market volumes, and excise revenue under these alternative scenarios were obtained using models that relate changes in tax rates to changes in product prices and, subsequently, simulate the effects on product demand and excise revenue. While these models are based on individual country data, the empirical evidence presented in the studies was aggregated to EU totals for some relevant outcomes.

Developing country case studies is a necessary complement to the more aggregate evidence, providing insights that can strengthen the overall argument for policy reform by better reflecting the impact of EU-wide reforms on domestic outcomes. The future of the TTD will largely depend on the support it garners within the European Council, the EU institution representing the governments of the member states. National public health organizations may also benefit from evidence on the effects of this legislation in their countries, using it to advocate for a prompt resumption of the TTD revision and to highlight opportunities to enhance its impact on tobacco control.

While most EU members would need to adjust their tax rates under either the Draft TTD or the Enhanced Draft TTD, there are several countries which apply tax rates close to or above what either of the two sets of reforms would require. These "tobacco tax champions" are Ireland,

[1] (López-Nicolás, 2023, 2024)
[2] (López-Nicolás & Drope, 2024)

France, Finland, Denmark, Netherlands, and Belgium. Retail price levels in these countries are higher than in lower tax neighboring jurisdictions.[3]

It might seem at first glance that there is not much at stake for these countries regarding whether and how the TTD is renewed. However, even if the renewal of the TTD would not affect them directly, they would be indirectly affected via the adjustment to tax rates, which would contribute to reduce the differentials between foreign and domestic retail prices.

These price disparities, particularly those across land borders, create incentives for cross-border shopping to legally exploit tax differentials and, in some cases, for illicit trade involving the resale of cigarettes in higher-tax jurisdictions without proper taxation (Stoklosa, 2020). This undermines the tobacco control policies of higher-tax jurisdictions. In fact, the wide disparities in the retail prices of cigarettes and other tobacco products across borders within the EU is one of the motives that the European Council singled out to prompt the European Commission to prepare a proposal for a renewal of the TTD.[4]

This report develops the case study of the tax champions from the perspective of how the retail prices of cigarettes in neighboring countries are likely to be affected by a new TTD, using the Draft TTD and the Enhanced Draft TTD as alternative counterfactuals to the current TTD. Among the six countries mentioned above, we will focus on Finland, Denmark, the Netherlands, Belgium and France. The reasons for not including Ireland is that it does not share land borders with any EU member.[5] This does not imply that price differences across maritime borders are generally not important. In fact, when analyzing the case of Finland, we will show evidence on the likely price changes in Estonia and Latvia. Even if they do not share a land border, there is evidence of significant cross border trade in cigarettes from the latter two into the former.[6] The case of Ireland in this regard is different because its closest EU shores belong to a high tax jurisdiction (France).

We will analyze the case of cigarettes in this report. While there are cross-border price disparities for other tobacco products, cigarettes are by far the most important in terms of volumes and sales value and therefore remain the biggest threat to public health among tobacco and tobacco-related products. As far as this product is concerned, the main difference between

[3] The use of the term "champions" should not be interpreted to mean that the levels cigarette taxes in these countries are deemed sufficient for public health purposes. As it is known from recent literature (Drope et al., 2024), cigarette affordability has increased over the last few years in many of these countries, which would justify further tax increases.

[4] (European Council, 2020)

[5] It does share a border with a former EU member, the UK, with similarly high tobacco taxes.

[6] (PwC PricewaterhouseCoopers LLP, 2020)

the Draft TTD and the Enhanced TTD is that the latter introduces an update in the overall minimum tax applicable to cigarettes to account for inflation between 2022 and 2025.[7] Thus, while the Draft TTD proposes a fixed minimum rate of € 180 per 1000 cigarettes, the Enhanced Draft TTD proposes a rate of € 203 per 1000 units.[8]

Section 2 presents the effects of the reforms on minimum taxes and retail prices for the countries of interest and section 3 concludes.

2. Changes in minimum tax rates and retail prices for cigarettes around high tax jurisdictions

For each of the countries analyzed the next sub-sections present estimates of the minimum tax rate applicable to cigarettes in 2025, the year on which the Draft TTD was intended to come into force, and a corresponding estimate for average retail price in the EU countries that share a land border.[9]

For the baseline scenario, we use the tax rates known to apply in 2025 as per official budgetary publications of Spain, Estonia and Germany[10] or, for the rest of countries considered herein, the available rates prevailing in 2024 according to the European Commission's Taxes in Europe Database (European Commission, 2024).

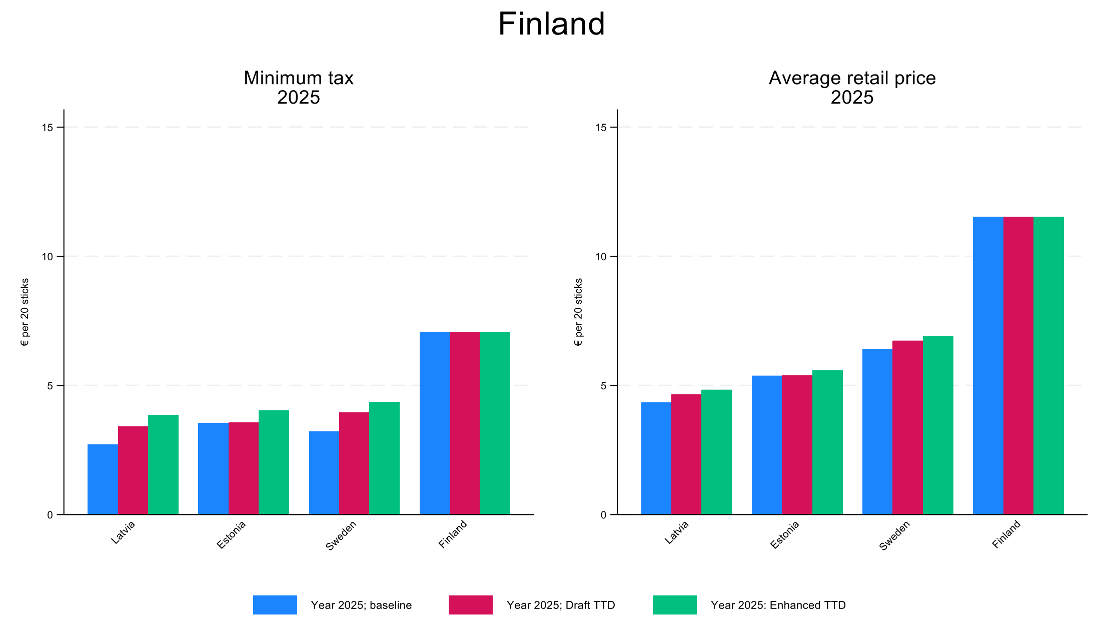
2.1 Finland

The left panel of Figure 1 shows that, at € 7.07 per pack of 20 sticks, Finland applies a higher minimum tax on cigarettes than any of its EU neighbors, leading to an expected retail price in 2025 of € 11.5 per pack. The ensuing price differentials with respect to its neighbors are notable. In the case of Latvia, it is expected to reach more than € 7 per pack in 2025 under the baseline

[7] See López-Nicolás & Drope (op. cit.).
[8] One third of these EU-wide rates are adjusted by the corresponding member state's Comparative Price Level index to account for differences in purchasing power across the EU.
[9] These estimates were obtained by means of econometric models that relate changes in tax rates to changes in product prices. Technical details on model specifications and estimates are available in López-Nicolás & Drope (op. cit.)
[10] For Estonia and Germany we use the rates made available in the comprehensive review of national legislation from the Campaign for Tobacco Free Kids (Campaign for Tobacco-Free Kids, 2024). For Spain we use the rates in (Congreso de Los Diputados, 2024).

scenario. With respect to its land neighbor Sweden, the price differential is expected to surpass € 5 per pack in 2025 in such a scenario.

Figure 1. Minimum tax and average retail prices under three policy scenarios; Finland.



Sources: Author's elaboration with data from Euromonitor, European Commission and national fiscal legislations

Both the Draft TTD and the Enhanced Draft TTD would require Finland's neighbors to raise minimum tax rates. In the case of Latvia, these would require a minimum tax of € 3.42 or € 3.86 per pack respectively. The corresponding expected retail prices would increase to € 4.65 and € 4.84 per pack respectively. In Estonia, retail prices in the reform scenarios would reach € 5.4 and € 5.6 respectively. And in Sweden, prices would reach € 6.75 and € 6.9 per pack respectively.

2.2 North-West (Netherlands, Denmark and Belgium)

For illustration purposes, we group together the results for the three tax champions in the (continental) North-West of the EU -Netherlands, Denmark and Belgium- in Figure 2. Note that the borders of each of these are as follows: Netherlands (Germany and Belgium); Denmark (Germany); Belgium (Netherlands, Germany and Luxemburg).

Germany, which shares borders with the three higher tax jurisdictions in the region, would have to raise its minimum tax on cigarettes from € 3.8 to € 4.4 per pack under either the Draft TTD or the Enhanced Draft TTD, which would increase the price of cigarettes from € 7.2 per pack to € 7.5 per pack.

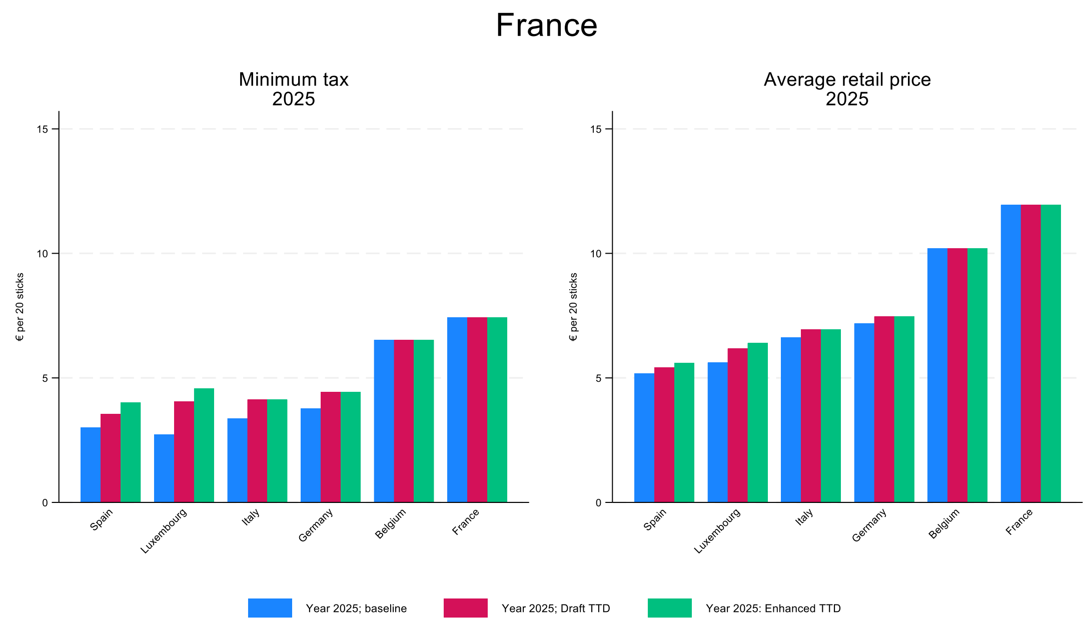
Figure 2. Minimum tax and average retail prices under three policy scenarios; North-West.

In both relative and absolute terms, the increases in the minimum tax required of Luxemburg would be much greater: from € 2.7 per pack in the baseline scenario to € 4 and € 4.6 per pack in the Draft TTD and Enhanced Draft TTD respectively. The corresponding expected retail prices would be € 6.2 and € 6.4 per pack.

2.3 France

The tax increases in Germany and Luxemburg discussed above would also affect the southernmost tax champion, France, as shown in Figure 3.

Figure 3. Minimum tax and average retail prices under three policy scenarios; France.



Sources: Author's elaboration with data from Euromonitor

Other land neighbors which would be required to increase the minimum taxes on cigarettes are Italy and Spain. In the former, the minimum tax rate would need to increase from € 3.4 to € 4.1 per pack under either the Draft TTD or the Enhanced Draft TTD. The retail price would be expected to rise from € 6.6 to € 6.9 per pack. In Spain, the baseline minimum tax of € 3 per pack would need to increase to € 3.6 and € 4 per pack respectively, with corresponding retail prices of € 5.4 and € 5.6 per pack.

3. Discussion and conclusion

Some EU member states already tax cigarettes at levels that meet or exceed those proposed in both the European Commission's Draft TTD and its "enhanced" version, which adjusts for inflation between 2022—when the Draft TTD was formulated—and 2025, when it is intended to take effect. While these high-tax jurisdictions would not need to modify their own rates, they stand to benefit from the tax increases their lower-tax neighbors would be required to implement, leading to higher retail prices across their borders.

As Stoklosa (op. cit.) has shown, narrowing cross-border price gaps reduces incentives for cross-border shopping, leading to an increase in domestic sales. This shift benefits public finances in high-tax jurisdictions. However, evidence also indicates that the substitution of foreign purchases with domestic ones is not complete, meaning that overall cigarette consumption in these jurisdictions would also decline—an outcome aligned with public health objectives.

For lower-tax jurisdictions, the decline in cross-border cigarette sales would likely be offset by higher excise tax yield per unit sold in their domestic markets. This expectation is supported by the low price elasticity of cigarette demand in the EU, with estimates ranging from -0.47 to -0.35 (Stoklosa, op. cit.) and a more recent estimate of -0.3 (López-Nicolás & Drope, op. cit.). Furthermore, the overall impact on cigarette exports is expected to be limited. Stoklosa (op. cit.) suggests that if low-tax jurisdictions completely lost their price advantage over their neighbors, total sales would decline by approximately 6%.

While the estimated effects of the Draft TTD and Enhanced Draft TTD on cross-border price differentials may appear modest, they nonetheless represent a meaningful contribution to broader tobacco control and public finance goals. Even small reductions in these differentials help reinforce domestic tax policies, discourage cross-border shopping, and strengthen revenue collection in high-tax jurisdictions. Additionally, by narrowing price disparities, the reforms could also reduce incentives for illicit trade. These effects complement the more substantial public health and fiscal benefits expected from the broader provisions of the revised directive.

However, if the goal is to fully address the distortions caused by large cross-border price disparities, a more ambitious approach will be necessary. The proposed reforms mark an important step forward, but they do not eliminate the incentives for cross-border shopping or illicit cigarette trade. As long as significant price differences persist, lower-tax jurisdictions will continue to undermine the efforts of their higher-tax neighbors, limiting the full potential of taxation as a tobacco control tool.

Policymakers should therefore view the current proposals not as an endpoint, but as part of an ongoing effort to harmonize tobacco taxation across the EU. A more comprehensive revision—one that further reduces price disparities—would deliver even greater public health and fiscal benefits, ensuring that tax policy aligns more effectively with the EU's broader tobacco control objectives. The experience of high-tax jurisdictions underscores both the progress made and the need for further action if the full potential of the Tobacco Tax Directive is to be realized.

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