

Skipping the Bag: The Intended and Unintended Consequences of Disposable Bag Regulation (Homonoff et al., 2021)

Starbucks replaced plastic straws with strawless cups to reduce plastic waste in 2018. However, producing these new cups required more plastic, thus defeating the whole purpose. This is one of many examples of policies that focus on a particular product, which ends up being more wasteful.

One Sentence Summary

The authors show how a ban of thin plastic bags in the city of Chicago with the intent to decrease plastic waste managed to achieve the opposite. In reaction to the ban, companies substituted thin plastic bags with thick ones that ultimately increased plastic waste. After changing the ban policy to a tax on plastic and paper bags, plastic waste finally decreased.

Main Findings

In 2015, Chicago issued a ban on plastic bags with less than 2.25mm of thickness. The idea was to eliminate the single-use bags used by grocery store consumers. To study how would this policy affect plastic bag consumption, Homonoff et al. (2021) collected the number of plastic and paper bags that costumers carried in grocery stores in Chicago and right outside of the limits of the city. The authors wanted to measure the plastic consumption between the costumers in the city subject to the ban and those rights outside the city where the ban did not apply.

Homonoff et al. (2021) found that the costumers in the city of Chicago and costumers in the city's outskirts used a similar number of plastic bags. However, the costumers in Chicago used thicker bags than those in the outskirts. The authors found that companies, in reaction to the ban, started to produce thick plastic bags (just above 2.25mm) and grocery stores in Chicago gave them instead of the thin ones. Naturally, Chicago consumers started using more paper and thick plastic bags, increasing the amount of plastic waste.

The city of Chicago saw the unintended consequences of their ban and in 2017 eliminated it and introduced a 7-cent plastic bag tax of any thickness in its stead. After the introduction of the tax, the percentage of Chicago costumers who used plastic or paper bags dropped from 82% to 49%, while 90% consumers in the outskirts kept using them. In contrast with the ban, the tax reduced the use of plastic and paper bags and decreased plastic waste.

Concluding Remarks

Almost every policy has unintended consequences because policy makers¹ are unable to correctly predict how people or companies react. Although a tax on plastic bags is more effective in reducing environmental costs than a ban of single-use bags is more effective, not every country should adopt taxes to reduce the use of plastic bags. For instance, people in the U.S. reduce their plastic bag consumption with the tax, but I am not so sure how successful would the same policy have in Latin America, where I think people are less sensitive to financial incentives.

References

- Homonoff, T., Kao, L.-S., Selman, J., Seybolt, C., 2021. Skipping the Bag: The Intended and Unintended Consequences of Disposable Bag Regulation.

¹ Although I use the word policy maker, humans have a really hard time predicting how other humans — and an even harder time predicting how groups of humans — behave.