

Institution: University of Bath		
Unit of Assessment: C20 Social Work and Social Policy		
Title of case study: Introduction of Minimum Excise Tax (MET) on Tobacco		
Period when the underpinning research was undertaken: February 2009 – April 2012		
Details of staff conducting the underpinning research from the submitting unit:		
Name(s):	Role(s) (e.g. job title):	Period(s) employed by submitting HEI:
Anna Gilmore	Professor, previously Reader	August 2007 – present
Rob Branston	Senior Lecturer, previously Lecturer, Teaching Fellow	January 2002 – present
Rosemary Hiscock	Research Associate, previously Research Assistant	February 2009 – present
Period when the claimed impact occurred: August 2013 – 2020		
Is this case study continued from a case study submitted in 2014? N		
1. Summary of the impact		
<p>Research at the University of Bath showed that the way the tobacco industry was pricing its cigarettes was undermining the government's ability to use tobacco tax increases to reduce smoking; and that the cigarettes the industry was deliberately keeping cheap (by absorbing tax increases) were used in particular by the young and least well off.</p> <p>We took our research findings to the UK Government, which used them as the basis for a public consultation. This led directly to a change of policy in 2017 - the introduction of a new minimum excise tax (MET), which ensures a minimum price for each cigarette.</p> <p>This policy increased the price of the cheapest cigarettes; contributed to an accelerated decline in cigarette use; reduced smoking rates among the young; and helped stabilise the previously widening gap in smoking between rich and poor. These changes are all associated with significant public health benefits. Thus, UK smoking prevalence declined steadily from 20.2% to 14.1% between 2011 and 2019, with the largest reduction among 18- to 24-year olds.</p>		
2. Underpinning research <i>[Numbers in square brackets refer to references in Section 3].</i>		
<p>There was established and overwhelming evidence that tobacco tax increases are the most effective means of reducing tobacco use (IARC, 2014). By 2013 they had also been shown to be the tobacco control policy most likely to reduce inequalities in smoking (Hill et al, 2014).</p> <p>As part of an European Union Seventh Framework (FP7) Programme (EU FP7) project (2009-2012) funded by European Commission, the Tobacco Control Research Group (TCRG) at the University of Bath undertook some of the first contemporary research into tobacco industry pricing, because it had become aware that the tobacco industry was possibly using its pricing strategies to undermine the intended public health impacts of tobacco tax policies [1]. We showed that in the UK the tobacco industry was absorbing tax increases on its cheapest products, so that their prices were not increasing in real terms [2], while simultaneously over-shifting taxes onto its expensive brands. We also showed that the government was unaware of this problem because it was tracking the impact of its tobacco tax policy by reference to the price trends only for expensive products [2].</p> <p>In a linked paper, we showed that the young and the poor were most likely to use these cheaper products [5]. We concluded that industry pricing, by widening the price-gap between the most and least expensive products, was likely to be driving greater inequalities in</p>		

smoking and undermining the ability of tobacco tax policy to discourage uptake and encourage quitting [2,5].

The tobacco industry was also claiming that tobacco taxes, by increasing prices, were driving the trade in illicit tobacco. Our research showed that the industry markedly exaggerated the scale of illicit tobacco in the UK [4], while downplaying its own involvement in supplying the illicit market in order to avoid tax payments [6]. Most importantly, it also showed that only half of the price increase was due to government taxes; the rest was due to industry profit-taking [3]. This highlighted, alongside our previous work [the immense profitability of the tobacco industry in the UK (and indeed, the scope for further tax increases) [3].

Our research [2,3,5] thus produced clear and rigorous evidence that existing taxes on cigarettes were failing to achieve their intended public health effects; that this was directly due to the pricing tactics of the tobacco companies [2]; that industry claims that tax increases were expanding the illicit trade [3,4,6] were highly misleading and thus, there was scope to increase tobacco taxes further.

It concluded that in order to achieve these public health objectives, it would be necessary to impose a minimum excise tax (MET) on each pack of cigarettes. This would work like a minimum price, stopping the tobacco companies selling so cheaply, but would simultaneously provide revenue to government. It was on the basis of this research that the UK Government introduced a MET on cigarettes in 2017 (see Section 4 below).

This led to follow-on research grants from NIHR of more than GBP1,000,000 - one to expand our research to roll-your-own tobacco; the other to expand it to alcohol. Another grant, of GBP137,000, from Cancer Research UK and the British Lung Foundation, was to research the impact of the MET and the laws on plain packaging (introduced simultaneously) on prices and sales of tobacco. This has already found strong evidence of beneficial effects (cited in section 4 below).

3. Research publications

1. Smith, K, Gilmore, A, Chaloupka, FJ & Delipalla, S 2011, Tobacco industry pricing, price-related marketing and lobbying. in *IARC Handbooks of Cancer Prevention: Tobacco Control: Effectiveness of Price and Tax Policies for Control of Tobacco*. vol. 14, International Agency for Research on Cancer, Lyon, pp. 31-90. <https://publications.iarc.fr/Book-And-Report-Series/Iarc-Handbooks-Of-Cancer-Prevention/Effectiveness-Of-Tax-And-Price-Policies-For-Tobacco-Control-2011>
2. Gilmore, AB, Tavakoly, B, Taylor, G & Reed, H 2013, 'Understanding tobacco industry pricing strategy and whether it undermines tobacco tax policy: The example of the UK cigarette market', *Addiction*, vol. 108, no. 7, pp. 1317-1326. <https://doi.org/10.1111/add.12159>
3. Gilmore, ABC & Reed, H 2014, 'The truth about cigarette price increases in Britain', *Tobacco Control*, vol. 23, no. e1, pp. e15-e16. <https://doi.org/10.1136/tobaccocontrol-2013-051048>
4. Rowell, A, Evans-Reeves, K & Gilmore, AB 2014, 'Tobacco industry manipulation of data on and press coverage of the illicit tobacco trade in the UK', *Tobacco Control*, vol. 23, no. e1, pp. e35-e43. <https://doi.org/10.1136/tobaccocontrol-2013-051397>
5. Gilmore, AB, Tavakoly, B, Hiscock, R & Taylor, G 2015, 'Smoking patterns in Great Britain: the rise of cheap cigarette brands and roll your own (RYO) tobacco', *Journal of Public Health*, vol. 37, no. 1, pp. 78-88. <https://doi.org/10.1093/pubmed/fdu048>
6. Gilmore, AB, Rowell, A, Gallus, S, Lugo, A, Joossens, L & Sims, M 2014, 'Towards a greater understanding of the illicit tobacco trade in Europe: A review of the PMI funded

'Project Star' report', *Tobacco Control*, vol. 23, no. e1, pp. e51-e61.

<https://doi.org/10.1136/tobaccocontrol-2013-051240>

Relevant grants

Gilmore A, with Clancy L, Perkurinen F, Godfrey F, Fischbacher C, Levy D, Boffetta P, Gallus S, Fernandes E, Ross H. "*Pricing Policies and Control of Tobacco in Europe (PPACTE)*." European Commission, Seventh Framework Programme (FP7), (EUR2,991,656), October 2009-12. Gilmore was Work-package lead for work on industry pricing strategies (EUR458,823 to University of Bath).

Gilmore A (PI) with Collin J, Fooks G. Tobacco companies, global governance and public health. National Cancer Institute, US NIH, (USD1,341,828), August 2011- July 2014.

Gilmore A (co-PI), with Lee K, Collin J, McKee M. "Globalisation, the tobacco industry and policy influence – grant extension." National Cancer Institute, US National Institutes of Health (NIH), (USD1,530,805), 2006-2010.

Gilmore A (PI). Health Foundation Clinician Scientist Fellowship. "Developing and evaluating policies to reduce tobacco use and harm in the UK". The Health Foundation, (GBP576,195), November 2006-2013.

4. Details of the impact [*Letters A to I in square brackets refer to references in Section 5*].

Until November 2017, tobacco companies were absorbing taxes on their cheaper cigarettes, while raising the prices of their expensive brands, to cover the tax increases. This meant that cheap tobacco was still available, and the intention of government was thereby defeated – to use pricing as a means of reducing consumption, especially by the young and the poor, and to improve public health.

Between 2011 and 2015, Gilmore and her colleagues regularly took their research findings on tobacco company behaviour to the UK Government. This led directly to a change in policy in 2017, in the form of a new minimum excise tax (MET), which would directly raise the price of each cigarette. This has contributed to reducing smoking rates among the young and a stabilisation in the previously widening gap in smoking between rich and poor. These changes are all associated with significant public health benefits.

a. Changing government thinking, policy and legislation: the impact chain from research findings to policy change

Gilmore first presented their preliminary research findings on tobacco industry pricing to a meeting held at Her Majesty's Treasury (HMT), also involving Her Majesty's Revenue and Customs (HMRC) and Department of Health (DH) civil servants (1 November 2011). Subsequent publications and meetings established a clear case for the introduction of a minimum excise tax (MET) on tobacco and linked efforts helped steer the policy to implementation. In the words of a senior UK civil servant:

"Gilmore and colleagues played a pivotal role in steering and securing the implementation of a Minimum Excise Tax (MET) on cigarettes Their work not only made the case for the MET but also made clear the policy was both feasible and would not result in the unintended consequences suggested by the tobacco industry" [see A].

From 2012 onwards, Gilmore and Branston summarised the research findings and the relevant policy recommendations in annual Budget submissions sent to the Treasury. These submissions were prepared by Action on Smoking and Health (ASH), the leading tobacco control NGO in the UK, and the UK Centre for Tobacco Control Studies (UKCTCS, later the UK Centre for Tobacco and Alcohol Studies, UKCTAS) – the UK research consortium of which we were part. They drew extensively on our research [see B]. They were endorsed by up to 80 other public health organisations including the Royal College of Physicians, the

Royal College of General Practitioners, Royal College of Radiologists, British Heart Foundation, British Lung Foundation, Cancer Research UK, Faculty of Public Health etc. They were often press released, with Gilmore being cited in 7 ASH press releases from 2013 – 2020 and linked National press coverage in the Guardian in 2015 and 2017 [see C]. In support of these Budget submissions, Gilmore and/or Branston met annually with a Minister to present their latest research findings on tobacco price and profits [see E]. All this led to the April 2014 Budget announcing that HMG would consult on a MET. This consultation, run by (HMT), cited and directly reproduced our work [see A and D]. ASH chief executive noted:

“The research by Gilmore et al was included in the consultation on MET carried out by HMT and was instrumental in securing the decision by Government to proceed with the policy” [see E].

The MET was not introduced immediately. Efforts to underline the need for it therefore continued, with University of Bath staff playing a key role. For example, Gilmore and Branston presented the research findings in person to the All-Party Parliamentary Group on Smoking and Health Inquiry. That Inquiry in turn made a representation to the 2015 Comprehensive Spending Review, recommending a MET and referring directly to our presentation contents and citing 6 pieces of our research [see F]. The ASH written submission to the Comprehensive Spending Review made a similar recommendation and again cited our work at references 30 and 31. (These documents promote either a MET (a minimum level of excise duty) or a “*minimum consumption tax*” which is almost identical to a MET but includes VAT in addition to a minimum excise duty).

The 2016 Budget announced the introduction of a MET via the 2017 Finance Bill (clause 69), with the MET taking effect from November 2017, once the 2017 Budget had announced the rate of the MET. In the 2018 budget the MET was updated from GBP5.60 to GBP5.88 (per 20 stick pack), this being the most significant change to tobacco tax policy in that budget. In the 2020 budget, the MET was updated again, with an increase by retail price index (RPI) plus 2% on all tobacco products, and an increase of RPI plus 6% on hand-rolling tobacco. In the 2018 and 2020 budgets, the MET was updated in line with recommendations made in the ASH/UKCTAS budget submissions, which again extensively cited Bath’s research [see B].

b. From policy change to reducing smoking among the young and less well off

Our recent research using time series analysis of tobacco sales [see G] shows that the MET has increased the price of the cheapest cigarettes and contributed (alongside standardised packaging of tobacco products) to reductions in cigarette sales. Post-implementation, the average monthly decrease in cigarette stick sales was 20,400,000, almost doubling the pre-legislation rate of decline. In addition, sales of the cheapest factory-made brands, previously increasing, plateaued after implementation, showing a specific impact of the policy on the products it targeted [see G].

MET contributed to reduced tobacco sales overall and to reduced smoking rates, particularly among the young. Thus, UK smoking prevalence has continued to decrease steadily from 20.2% in 2011 to 14.1% in 2019 with the largest reduction among 18- to 24-year olds, from 25.7% to 16.0% (ONS Annual Population Surveys). MET also helped stabilise the previously widening gap in smoking between the most and least well off, with important benefits to health and health inequalities [see G].

c. Stimulating awareness around the world

A senior UK civil servant speaks of “*the importance of Gilmore and colleagues’ work to UK public health and its knock-on impacts for global public health research and practice*” [see A].

This impact reflects the extensive efforts of Gilmore, Hiscock and Branston to disseminate the research internationally to academics, policy makers and the public. In addition to the publications and press releases detailed above, they have presented it at numerous international policy conferences [see H] and made the MET research publicly accessible in diverse and easily understandable formats. These include a MET web page on their knowledge exchange platform, TobaccoTactics; and a summary on the website of STOP, a global tobacco industry watchdog in which TCRG is the research partner.

This work has directly informed and been cited in similar research in other jurisdictions including Indonesia, Bangladesh, Turkey, Taiwan, New Zealand, Mexico, USA, a study on 5 Southeast Asian Countries, and another on 23 European countries. [see I].

As Chief Executive of ASH explains: *“this research on tobacco industry pricing of cigarettes ...has stimulated global interest on both the research and policy front ... This impact of Bath’s work will only grow over time as more countries seek to address the tobacco industry’s pricing strategies and maximise the impact of tobacco tax policies in reducing tobacco use”* [see E].

5. Sources to corroborate this impact

- A. Testimonial letter from former [text removed for publication] at the Department of Health, UK Government, received 11 January 2021.
- B. ASH/UKCTS/UKCTAS annual budget submissions in 2012, 2013, 2014, 2015, 2016, 2017, 2018, 2020.
- C. Seven ASH Press releases dating March 2013, August 2013, March 2014, November 2016, October 2017, February 2019, February 2020; and National press coverage in the Guardian on 5 April 2015 and 30 October 2017 promoting a MET.
- D. The HM Treasury MET Consultation, 6 October 2014.
<https://www.gov.uk/government/consultations/minimum-excise-tax/minimum-excise-tax>
- E. Testimonial letter from Chief Executive of Action on Smoking and Health (ASH), received January 2021.
- F. Submissions to the 2015 Comprehensive Spending Review: All-Party Parliamentary Group on smoking and health. Representation to the 2015 spending review (October 2015). <https://ash.org.uk/wp-content/uploads/2020/01/RepSR2015.pdf> (Professor Anna Gilmore, expert witness). ASH submission to the Comprehensive Spending Review 2015.
<https://ash.org.uk/information-and-resources/reports-submissions/submissions/ash-response-to-hm-treasurys-spending-review-2015-consultation/>
- G. Evidence of impact on price and sales:
Hiscock, R., Augustin, N., Branston, J. R. & Gilmore, A. (2020), ‘Standardised packaging, Minimum Excise Tax, and RYO focussed tax rise implications for UK tobacco pricing’ in: *PLoS ONE*. 15, 2, e0228069. <https://doi.org/10.1371/journal.pone.0228069>
Hiscock, R., Augustin, N. H., Branston, J. R. & Gilmore, A. B., (2020), Longitudinal evaluation of the impact of standardised packaging and Minimum Excise Tax on tobacco sales and industry revenue in the UK in: *Tobacco Control*.
<http://dx.doi.org/10.1136/tobaccocontrol-2019-055387>
- H. Nine International Policy Conferences from 2012 until 2020 including:
17th World Conference on Tobacco or Health: Uniting the world for a tobacco free generation. Cape Town, South Africa. 7 Mar 18 – 9 Mar 18. Tobacco industry strategies to keep tobacco prices low: evidence from industry data (FO-344-3). Branston R, Gilmore A, Hiscock R, Partos TR, Hitchman SC, McNeill A.
- I. Twenty-two illustrative citations of Bath research by researchers working in other jurisdictions (June 2015 – March 2020).