

The Missing Profits of Nations: 2018 Figures*

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Abstract

We update the main figures from "The Missing Profits of Nations" from 2015 to 2018 values. The absolute amount of profits shifted to tax havens has increased from \$616 Billion to \$946 Billion. However, as the total amount of profits have increased by roughly the same percentage over that time period, the share of foreign profits booked in tax havens remains remarkably constant at 36%. The share of corporate taxes lost increases from 9 to 10 percent of current corporate tax receipts.

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1 Introduction

In the "Missing Profits of Nations" (Tørsløv, Wier and Zucman, 2018) we exploit national accounts and foreign affiliate statistics (FATS) to estimate global profit shifting. We do this by computing the profitability of local (domestically head-quartered) and foreign-owned firms. We find that foreign-owned firms in tax havens are always far more profitable than their domestic counterparts. Contrary, foreign-owned firms are always less profitable than local firms in high-tax countries. We show this pattern in the upper panel of Figure 1. As a simple and transparent estimate of profit shifting we assume that absent profit shifting local and foreign firms would be equally profitable in tax havens. We hence compute the artificial excess profits in tax havens as the difference in local and foreign firm profitability. Using 2015 data we estimate that \$616Bn. in profits were artificially shifted to tax havens — corresponding to 36% of foreign profits.

By using detailed bilateral balance of payments data we are further able to understand the origin of the excess profits in tax havens. We show that excessive transfers from high-tax countries to tax havens in the form of royalty payments, management fees and internal interest payments can fully explain the excess profitability of tax havens. Based on these payments we allocate the excess profits in tax havens to their origin country. This allows us to estimate the taxes lost due to profit shifting. We find that high-tax countries globally lose 9% of their corporate tax receipts as a consequence of profit shifting.

Last year we updated the findings using 2017 data (Tørsløv et al. 2020). We found that the our estimates remained remarkably constant: the global tax loss stayed constant at 9% and the global amount shifted to tax havens as a share of foreign profits also stayed constant at 36%.

Using the newest available data (2018) we can now update the figures again. In Figure 1 and 2 we see that the overall pattern of excess profitability in tax havens remains. Using these update figures we estimate that \$946Bn. were artificially shifted to tax havens in 2017 — this corresponds to 36% of foreign profits (Table 1). In Table 2 and Figure 3 we show the updated loss figures for high-tax countries — while there are some national differences in the estimated tax loss, the global tax loss increases from 9% of corporate tax receipts in 2015-17 to 10% in 2018. In this new update Singapore surpasses Ireland as the world's largest tax haven for the third year in a row with \$132Bn. of profits being shifted to Singapore (a doubling comparing to 2015).

The fact that profit shifting as a share of global profits remains so constant 2015-2018 is surprising, as 2018 was the second year of implementation for the OECD BEPS project¹ —

¹<https://www.oecd.org/tax/beps/background-brief-inclusive-framework-for-beps-implementation.pdf>

a global effort aimed at curbing profit shifting (OECD 2015). Our estimates hence find no measurable effect on global profit shifting three years into implementation.

Another notable finding is that the US corporate tax reform implemented in late 2017 have had no impact on the corporate tax loss in the US - in fact, we see an increase in the tax loss from 14-19% in 2015-17 to 23% 2018. This is striking, as the reform was in part aimed at reducing profit shifting through anti-shifting measures (GILTI and BEAT) combined with an overall lowering of the corporate tax rate.

From 2016 and onwards additionally add eight new countries to our database in this new update: Argentina, Egypt, Indonesia, Malaysia, Nigeria, Thailand, Venezuela and Uruguay. With the addition of these countries our database now covers 92% of the world economy and 70% of world population.

2 Technical notes

The full research with all computations and data sources can be found online at <http://missingprofits.world>. To ease the updating process we have moved many of the computations from the original paper from Excel to Stata.

References

- Organization for Economic Co-operation and Development..** 2015. “Base Erosion and Profit Shifting, Final Report”,
- Tørsløv, T.R., Wier, L.S. and Zucman, G.** 2018. “The missing profits of nations (No. w24701)”. National Bureau of Economic Research.
- Tørsløv, T.R., Wier, L.S. and Zucman, G.** 2020. “The missing profits of nations: 2017 Figures”. available at missingprofits.world

Table 1: Global profit shifting: Comparison 2015 vs 2017 estimates

	2015	2016	2017	2018	('18 -'15)
Profits shifted (\$Bn.)	616	667	741	946	330
Profits shifted (% of foreign profits)	36.2%	36.2%	36.0%	35.6%	-0.6%
Tax loss (\$Bn.)	188	195	212	243	55
Tax loss (% of corp. tax rev.)	9.0%	8.8%	9.0%	9.9%	0.9%

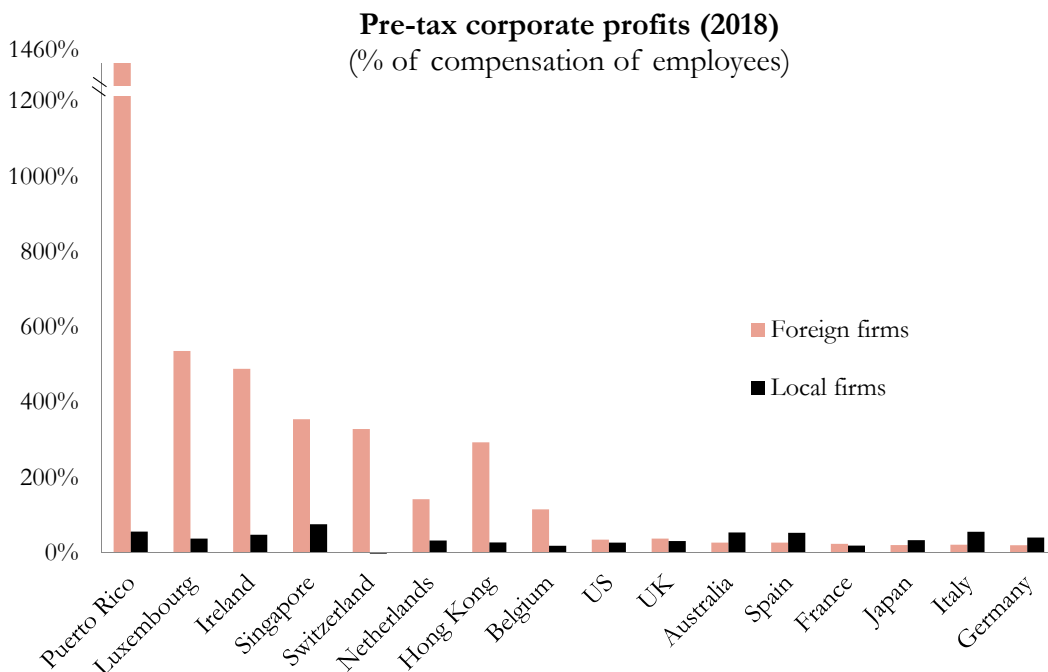
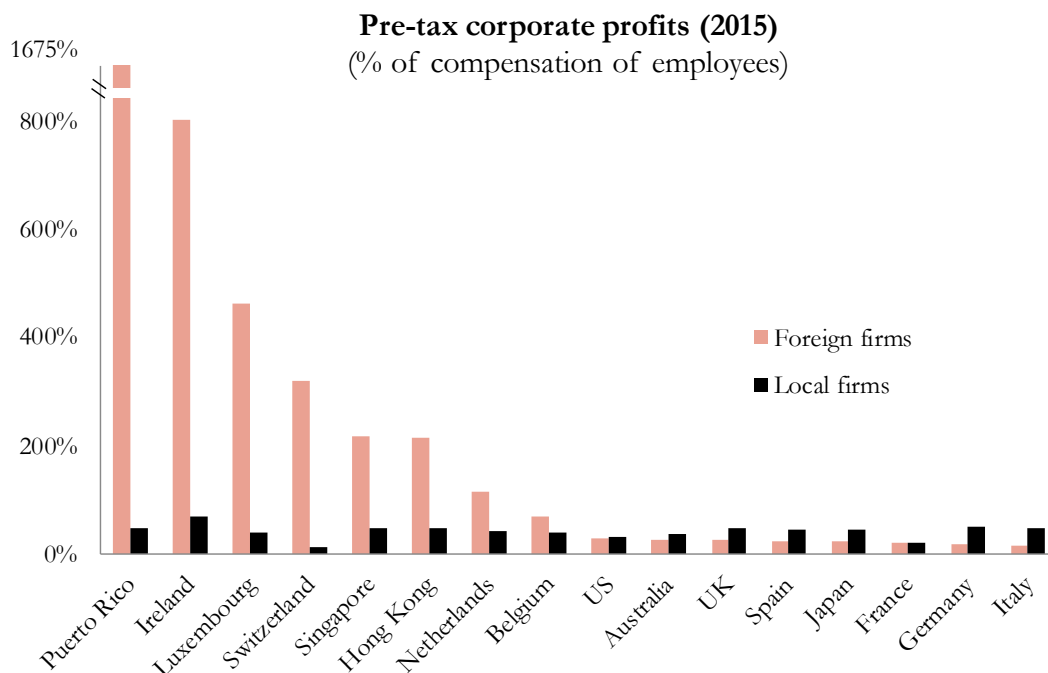
Source: 2015 figures: Tørsløv et al. (2018) appendix table A7 and C4D / 2018 figures: TWZ2021.xls backup table U1 and C4D

Table 2: Country estimates: Comparison 2015 vs 2018 estimates

	Shifted profits (\$Bn.)					Corp. tax revenue loss/gain (% of collected)				
	2015	2016	2017	2018	Difference ('18-'16)	2015	2016	2017	2018	Difference ('18-'16)
OECD countries										
Australia	12	15	18	25	10	7%	8%	7%	10%	2%
Austria	4	4	4	5	1	11%	11%	11%	11%	-1%
Canada	17	15	16	21	6	9%	8%	7%	9%	1%
Chile	5	5	5	7	2	11%	12%	12%	13%	1%
Czech Republic	2	2	2	3	1	5%	6%	6%	7%	1%
Denmark	3	4	5	6	2	8%	12%	10%	13%	1%
Estonia	0	0	0	0	0	10%	16%	15%	14%	-1%
Finland	3	3	4	5	2	11%	12%	12%	15%	3%
France	32	36	40	47	11	21%	24%	22%	26%	2%
Germany	55	65	66	83	18	28%	28%	26%	29%	1%
Greece	1	2	2	2	0	7%	10%	13%	15%	4%
Hungary	2	4	4	6	3	21%	24%	13%	31%	7%
Iceland	0	1	1	1	0	22%	20%	16%	18%	-2%
Israel	1	2	3	4	2	2%	6%	5%	8%	2%
Italy	23	24	26	32	8	19%	19%	15%	20%	1%
Japan	9	12	14	17	5	2%	2%	2%	3%	1%
Korea	4	5	6	8	4	2%	2%	2%	3%	1%
Latvia	0	0	0	0	0	7%	8%	9%	23%	14%
Mexico	12	11	11	17	6	10%	9%	8%	12%	3%
New Zealand	1	2	2	3	1	5%	6%	6%	7%	1%
Norway	5	6	6	7	1	8%	10%	7%	6%	-4%
Poland	4	4	4	6	2	8%	9%	8%	9%	0%
Portugal	3	3	3	4	1	9%	11%	9%	10%	-1%
Slovakia	1	1	1	1	0	5%	6%	6%	7%	1%
Slovenia	0	1	0	0	0	21%	21%	8%	8%	-13%
Spain	14	15	17	23	8	14%	13%	14%	16%	3%
Sweden	9	10	12	14	3	13%	16%	17%	18%	2%
Turkey	5	4	4	5	1	8%	5%	5%	7%	1%
United Kingdom	61	81	96	120	40	18%	22%	25%	28%	6%
United States	142	152	162	186	34	14%	17%	19%	23%	7%
Main developing countries										
Argentina		3	3	4	2		5%	7%	9%	3%
Brazil	13	17	20	22	5	8%	10%	12%	14%	4%
China	55	50	51	71	21	3%	3%	3%	3%	0%
Colombia	1	1	1	2	1	2%	1%	2%	4%	2%
Costa Rica	1	1	1	2	1	19%	17%	22%	28%	11%
Egypt		3	3	5	2		4%	5%	7%	2%
Indonesia		7	7	10	3		8%	9%	11%	3%
India	9	10	11	16	6	8%	5%	5%	6%	2%
Malaysia		4	4	6	2		5%	6%	6%	1%
Nigeria		3	2	4	0		24%	18%	25%	2%
Russia	11	13	14	17	5	5%	6%	5%	5%	-1%
India	4	4	11	16	12	6%	7%	5%	6%	-1%
South Africa	4	4	5	7	3	6%	7%	8%	10%	3%
Thailand		5	6	9	4		5%	7%	8%	3%
Uruguay		1	1	1	0		16%	15%	22%	7%
Venezuela		1	1	1	0		15%	15%	16%	1%
Tax havens										
Belgium	-13	-15	-20	-46	-30	16%	16%	19%	55%	39%
Ireland	-106	-117	-126	-126	-9	58%	65%	67%	61%	-4%
Luxembourg	-47	-50	-66	-57	-7	50%	54%	58%	49%	-6%
Malta	-12	-11	-11	-12	-2	90%	88%	88%	36%	-52%
Netherlands	-57	-90	-79	-106	-16	32%	30%	39%	28%	-2%
Caribbean	-97	-93	-95	-110	-17	100%	100%	100%	100%	0%
Bermuda	-24	-17	-13	-84	-67					0%
Singapore	-70	-78	-98	-132	-55	41%	42%	30%	37%	-6%
Puerto Rico	-42	-38	-38	-36	2	79%	25%	35%	72%	48%
Hong Kong	-39	-18	-18	-43	-25	33%	24%	24%	56%	32%
Switzerland	-58	-73	-98	-102	-29	20%	28%	38%	39%	11%
Other	-51	-66	-78	-91	-25					

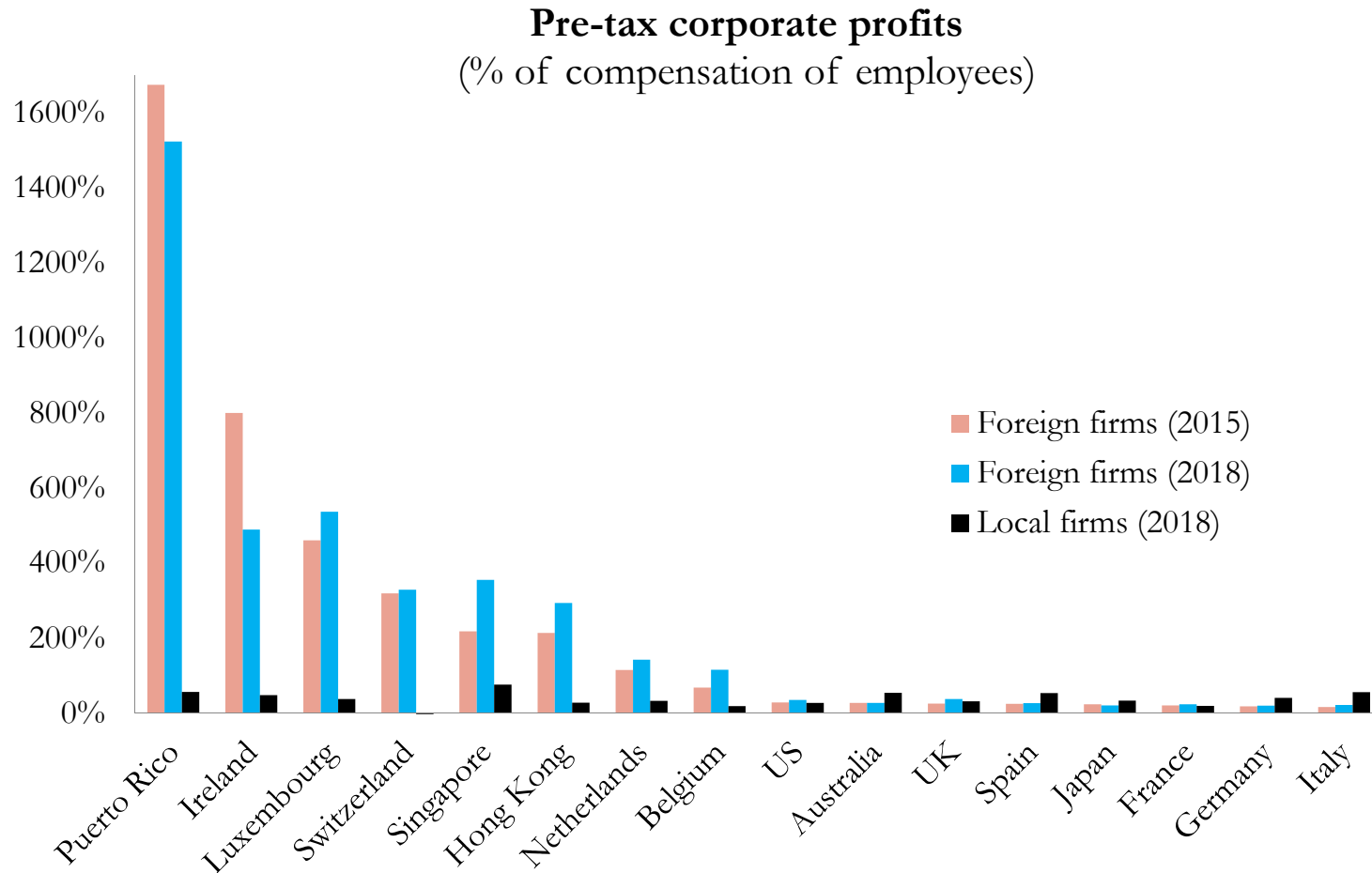
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Figure 1: Profitability in Foreign vs. Local Firms in 2015 and 2018



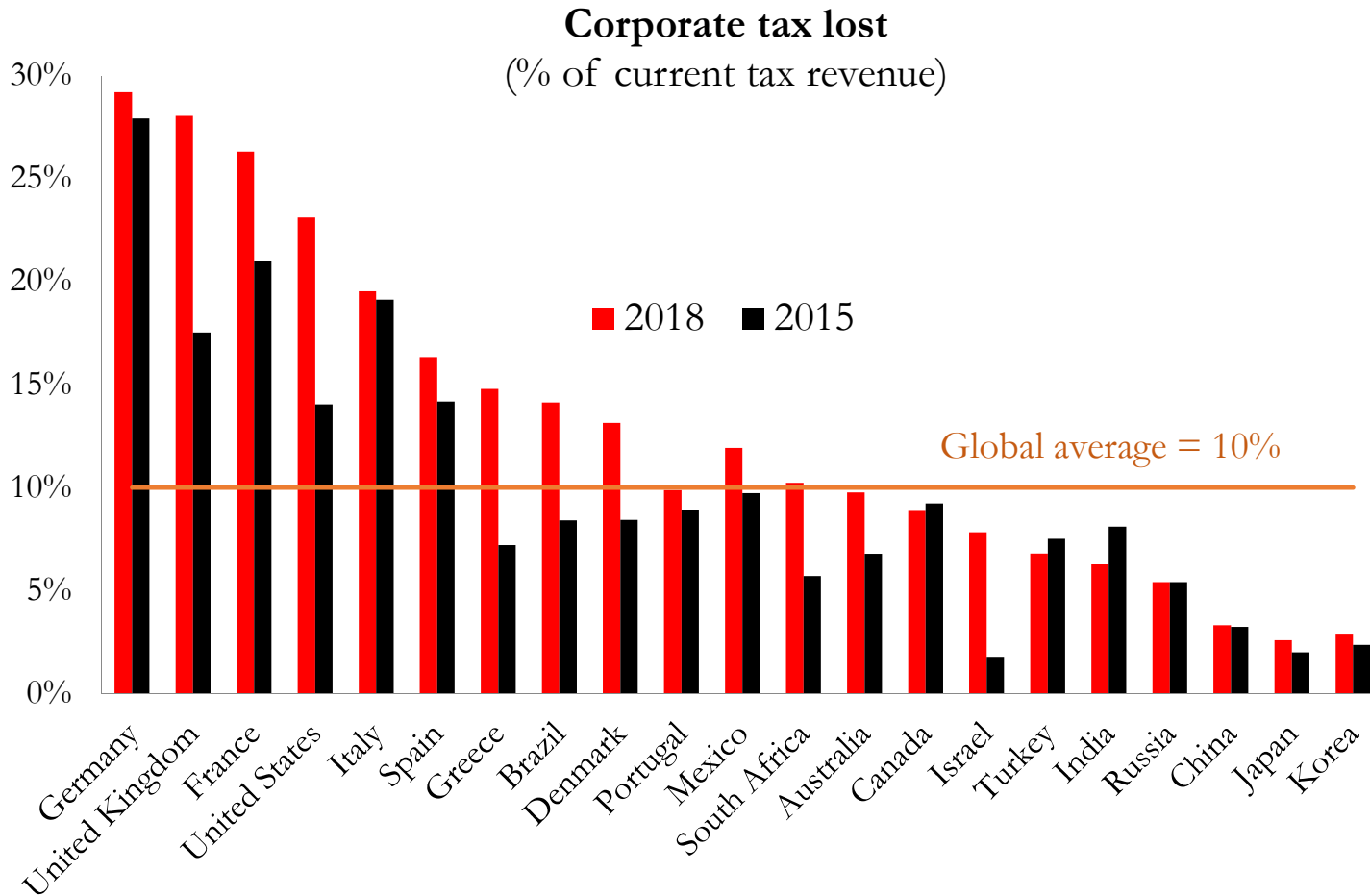
Notes: the bar shows the ratio of pre-tax corporate profits (net of interest and depreciation) to compensation of employees. The black bar shows the ratio for local firms only—defined as firms that are less than 50% owned by foreigners—and the pink bar for foreign firms only. Source: 2015 figures: Tørsløv et al. (2018) appendix table A7 and C4D / 2018 figures: TWZ2021.xls backup table U1 and C4D

Figure 2: Profitability in Foreign Firms 2015 vs 2018



Notes: the bar shows the ratio of pre-tax corporate profits (net of interest and depreciation) to compensation of employees. The black bar shows the ratio for local firms only—defined as firms that are less than 50% owned by foreigners in 2018. The pink bar for foreign firms only in 2015. The light blue bar for foreign firms only in 2018. Source: 2015 figures: Tørsløv et al. (2018) appendix table A7 / 2018 figures: TWZ2021.xls backup table U1

Figure 3: Taxes lost in non-havens 2015 vs 2018



Notes: the bar shows the corporate taxes lost as a share of current corporate tax revenue The black bar shows the estimated loss in 2015 and the red bar shows the loss in 2018. The light blue bar for foreign firms only in 2018. Source: 2015 figures: Tørsløv et al. (2018) appendix table C4D / 2018 figures: TWZ2021.xls backup table C4D