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Abstract: This paper explores the implications of Pillar 2 of the G20/OECD Inclusive Framework Blueprint for global tax reform on tax incentives and tax competition in the countries of Sub-Saharan Africa (SSA). It addresses both the impact of the minimum effective tax developed under the Global Anti-Base Erosion model rules, and of the Subject to Tax Rule for limited modification of existing bilateral tax treaties between SSA countries and various treaty partners. In the GloBE context the paper examines the interaction of the substance-based income exclusion, the qualified domestic minimum tax and existing domestic turnover based minimum taxes in the region, and the proposed qualified refundable tax credit rules. In regard to the Subject to Tax Rule it looks at the incentives, or lack thereof, for treaty renegotiation in the existing context of multi-national tax planning and income stripping. The paper concludes that SSA countries should, if Pillar 2 is ultimately implemented by a critical mass of advanced countries, adopt the qualified domestic minimum top up tax, as proposed in the December 2021 promulgation of the detailed GloBE rules. The benefits of other actions, such as the adoption of qualified refundable tax credits, or treaty renegotiation under the proposed STTR, are more ambiguous. Pillar 2 would introduce important fundamental changes to the international tax architecture, through agreement, at least, that there should be some limits on tax competition and profit shifting. It is, though, a far cry from the 15 percent minimum tax on corporate profits generally portrayed. The highly complex exceptions and structure explored in the paper illustrate both the technical and political difficulties involved in attempting to stem the erosion of the global corporate profits tax.

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Introduction

This paper explores the implications of the G20/OECD Inclusive Framework Blueprint for the Global Anti-Base Erosion Model Rules of October 2020^{1 2 3} (GloBE, or Pillar 2) for the use of tax incentives and the impact on tax competition in the countries of Sub-Saharan Africa (SSA). It addresses both the impact of the minimum effective tax rules of the GloBE, and of the Subject to Tax Rule (STTR) for limited modification of existing bi-lateral tax treaties between LICs and treaty partners. The paper concludes that SSA countries should avail themselves of the proposed qualified domestic minimum top up tax (QDMTT), although there remain many unanswered questions regarding the QDMTT and the GloBE.⁴ Adopting the QDMTT should not have investment disincentive effects, assuming that a substantial preponderance of investor countries adopt the Pillar 2 rules. The impact and potential benefit of the STTR is more ambiguous. If a country avails itself of the right to “top up” certain low withholding taxes under existing treaties, it can gain revenue. On the other hand, given the proposed structure and limitations of the STTR, to do so would equate to the withdrawal of existing tax incentives for

¹ OECD (2020), *Tax Challenges Arising from Digitalisation – Report on Pillar Two Blueprint: Inclusive Framework on BEPS, OECD/G20 Base Erosion and Profit Shifting Project*, OECD Publishing, Paris, <https://doi.org/10.1787/abb4c3d1-en>. (Hereinafter, the Blueprint).

² Pillar 2 is one part of a two-part proposal originally aimed at addressing the implications of the digital economy. That term has been used to mean the tax challenges created by the increased use of intangible assets in production, along with the decreased need for multinational enterprises (“MNEs”) to have a physical presence to create profits in any given jurisdiction. It should be noted, though, that a marked shift toward a service-based (non-physical presence) economy was already long in process in developed economies before the widespread advent of digital platforms. In any event, both Pillars have now extended their theoretical reach well beyond the confines of the ill-defined notion of “digital” companies or sectors. Pillar 1 aims at a reallocation of a (small) part of taxable profits of the world’s largest MNEs outside the parameters of the traditional tax architecture, to countries where customers are located rather than only the location of production. If ultimately successfully enacted by individual countries, both pillars would represent extraordinary transformations of the traditional international corporate tax architecture—going far beyond the loophole-closing of the original OECD Base Erosion and Profit Shifting (“BEPS”) project that was agreed to more than 6 years ago and which explicitly was not intended to address either the allocation of profits or minimum taxation.

³ The detailed structure of what would be the world’s first international global minimum tax was finally agreed on December 22, 2021, among representatives of the 141 member countries of the G20/OECD Inclusive Framework. The release of this proposal followed on from largely behind the scenes policy debate and technical work around a slightly earlier summary document that was made public in October, 2021—which itself followed from the October 2020 Blueprint endorsed by the G7 and the G20 countries in the summer of 2021. On March 14, 2022, an additional 225 pages of explanatory commentary, along with dozens of pages of examples, was published by the OECD staff. OECD (2022), *Tax Challenges Arising from the Digitalisation of the Economy – Commentary to the Global Anti-Base Erosion Model Rules (Pillar Two)*, OECD, Paris, <https://www.oecd.org/tax/beps/tax-challenges-arising-from-the-digitalisation-of-the-economy-global-anti-base-erosion-model-rules-pillar-two-commentary.pdf>. (Hereinafter, the Commentary). Further implementation guidelines are yet to come. Throughout the paper it is assumed that a sufficient critical mass of residence countries adopt the domestic rules to implement Pillar 2.

⁴ Not least is the interaction of the QDMTT with countries’ CFC regimes.

investment. On balance, the advantages may well outweigh the disadvantages, though even more unanswered questions remain here.

Source countries must determine what their goal is, in analyzing the impact of Pillar 2 on their tax revenues and their economies. *Does a country want to continue to engage in tax competition to the extent that remains possible, to take this opportunity to step back from and minimize that competition, or to adopt some intermediate course?* This paper will not repeat the many studies regarding the effectiveness or lack thereof of corporate income tax incentives in low-income countries at attracting foreign direct investment (FDI), and their costs in revenue.⁵ All source countries had, in the current pre-GloBE world, arrived at their own balance between encouragement of inward investment and generating tax revenue. The Pillar 2 GloBE regime itself does not necessarily change that desired trade-off by a country—but it will have a quite profound impact on the manner and the feasibility for the country to attain it.

The GloBE minimum tax rules aim at ensuring that MNE profits are taxed somewhere in the world at some minimum effective rate.⁶ Only MNE groups with more than 750 million Euro in annual turnover (and meeting certain within-country minimum thresholds) are within the scope of Pillar 2. And while some countries in SSA may not host investment from members of MNE groups that are in-scope, many will have at least one such investor and most may hope to do so in the future. Notably, countries with mining and petroleum investments, as well as those with foreign owned telecom investments, may find that those investors do belong to MNE groups that fall within scope for Pillar 2. A major question that must be addressed by each country is the extent of entities within their jurisdiction and their activities that do fall within scope, as the specific answers will determine the impact of the GloBE rules. There are no publicly available data that would permit such company-by-company calculations generally.⁷

While essentially all SSA countries have nominal headline rates of corporate income tax (CIT) well in excess of the 15 percent effective rate specified in Pillar 2, the existence of extensive tax incentives frequently bring the effective rate of CIT on in-scope MNE investor companies below the Pillar 2 GloBE rate—indeed, in the case of tax holidays, to zero. Thus, Pillar 2 may be of great relevance to SSA countries.

The remainder of this paper is structured as follows. Section 2 examines the GloBE minimum effective tax in light of the scope of tax incentives in SSA countries, and existing domestic minimum taxes that may top up the otherwise applicable CIT on companies receiving those tax

⁵ See, for example, Michael Keen and Mario Mansour, “Revenue Mobilization in Sub-Saharan Africa: Challenges from Globalisation II—Corporate Taxation,” *Development Policy Review*, 2010, v.28, pp. 573-596; “Options for Low Income Countries’ Effective and Efficient Use of Tax Incentives for Investment,” IMF 2015, a report prepared for the G20 Development Working Group by the IMF, OECD, UN and World Bank, available at: <https://www.imf.org/external/np/g20/pdf/101515.pdf>; and sources cited in both.

⁶ The language describing Pillar 2’s purpose has varied over evolving versions from the Inclusive Framework, and in OECD explanatory documents and draft rules. Earlier formulations included phrases such as “put a floor under tax competition,” and have also referred explicitly to raising revenue.

⁷ Even BEPS 1.0 mandated country-by-country data will be insufficiently granular.

incentives. Section 3 examines the potential for SSA countries to benefit from the STTR in the revision of bi-lateral tax treaties. Section 4 addresses the implications of and potential for continued tax competition among low-income SSA countries. Section 5 concludes.

Section 2—the interaction of the GloBE minimum tax with tax incentives and domestic minimum taxes

In the October 2021 description of the Pillar 2 GloBE proposal, as well as in the 2020 Blueprint, the mandated top-up tax under Pillar 2 would apply with respect to the Pillar 2 undertaxed profit of an in-scope MNE group with one or more constituent entities in a country. Any such top-up tax was under those rules first allocated to the residence country (through the IIR), or to an intermediate parent company in the ownership chain, rather than to a source (host) country. While there would have been considerable indirect spillover benefit for source countries through the disincentives created for MNEs to push their effective tax rates in such countries below 15 percent, there would have been little if any *direct* revenue benefits.

In a major new development first made public in the version of the GloBE rules promulgated in December 2021, the potential direct benefit of additional Pillar 2 minimum tax can instead fall to source (host) countries rather than residence countries, if such host countries choose to put in place a QDMTT. The QDMTT would offset the top up tax to be allocated to the residence country through the IIR and would be collected by the source country. *A country need not adopt the Pillar 2 rules in order to implement such a qualifying QDMTT*, as long as the “tax is implemented and administered in a way that is consistent with the outcomes provided for under the GloBE rules and their Commentary...”⁸

The Substance-Based Income Exclusion (SBIE)

The rules adopt a “substance-based income exclusion” (SBIE) from the GloBE income that is otherwise subject to the effective minimum tax. The idea behind this is to limit the effective minimum tax to that portion of profits presumed to arise from mobile, especially intangible, factors of production, which most easily give rise to tax avoidance through profit shifting by MNEs. The SBIE is measured by adopting a presumed return on real, tangible, investment and labor costs by in-scope MNEs and excluding that from the effective minimum tax base.^{9 10}

⁸ OECD 2022, “*Tax Challenges Arising from the Digitalisation of the Economy—Commentary to the Global Anti-Base Erosion Model Rules (Pillar 2)*”, Paris, chapter 10, paragraph 116. The forthcoming Implementation Framework will “[Implement] a process to assist tax administration in determining whether a minimum tax is considered as a Qualified Domestic Minimum Top-up Tax.” Paragraph 118. It is quite unclear what this actually means, at present.

⁹ Covered MNEs may opt out from the carve out on a jurisdiction-by-jurisdiction basis, annually, though presumably since the SBIE reduces the amount subject to the top up tax this would only be done for reasons of complexity reduction in de minimis cases.

¹⁰ See IMF *Fiscal Monitor April 2022*, chapter 2, in which IMF staff authors find that the potential increase in global corporate income tax as a direct result of the Pillar 2 minimum tax is reduced from 7.6 percent of global CIT revenues to 5.7 percent by virtue of the inclusion of the SBIE in the rules.

<https://www.imf.org/en/Publications/FM/Issues/2022/04/12/fiscal-monitor-april-2022>

The effective minimum tax rate of 15 percent served to set a floor—including for countries that chose not to adopt Pillar 2—below which reductions in tax would not benefit the MNE groups exposed to this tax, but rather would be allocated to or across the governments of countries in which investment is made, through which profits are shifted, and/or the country of residence of the ultimate or intermediate parent of the group. Without the SBIE, this effective 15 percent floor would have applied to all taxable profits including an economic normal return to investment. Under the SBIE approach now adopted, countries will remain able to effectively compete for real investment through the tax system—though not for excess profits as defined for the SBIE. If the SBIE carve out equals or exceeds the total income of the MNE group in any particular host country, there would be no “excess profit” and thus no top up tax would apply to that country.¹¹

Adoption of the SBIE goes to the very heart of the intention behind Pillar 2 and an international minimum effective tax rate. Was the purpose to impose a basic, unavoidable, level of income taxation on international taxable profits wherever and however derived? Or rather, was it to adopt another post-BEPS, perhaps more effective, defense against artificial shifting of easily moved income? If the former, a substance based carve out does not make sense. If the latter, it may, as a simplified approach to determining something akin to the idea of economic rents (though not identical therewith), implicitly assumed to be derived largely from mobile factors of production—generally, intangible assets.

Table 1 provides an example of the impact of the SBIE on total taxes paid by an in-scope MNE constituent entity.¹² First (as seen in the top part of Table 1), if there were no SBIE the total tax paid by the MNE with respect to the constituent entity featured will at least equal 15 percent (the Pillar 2 minimum effective rate) times the GloBE net income.¹³ The CIT is shown at varying rates in the source country. In no case is there an advantage in terms of tax competition for the source country to reduce its CIT rate below 15 percent. And, there would be no advantage for that country in failing to adopt a QDMTT. When a qualifying QDMTT is adopted the entire 15 percent tax falls to the source country—even if the CIT rate is lower. On the other hand, if there were no SBIE there would be no need for an LIC to explicitly adopt a QDMTT; the same result

¹¹ The SBIE is to be measured initially by 10 percent of payroll costs and 8 percent of the carrying value of “tangible” (as specifically defined) assets located in the jurisdiction, with the percentages of each declining to 5 percent over the next 10 years. This SBIE is then to be deducted from the previously calculated net GloBE income, and only that result is to be multiplied by the previously calculated effective tax rate for the company, to arrive (at last) at the amount of any applicable top up tax. It is impossible to determine the actual excess profit in any particular country without in-scope company by company data that would permit the measurement at this level of granularity—which then would be aggregated to arrive at the total net income for purposes of the Pillar 2 effective rate and top up tax calculations. In this paper hypothetical examples are given.

¹² Table 1 and this paragraph draw on “*What is the Substance-Based Carve-Out under Pillar 2? And How Will It Affect Tax Competition?*”, M. Devereux, M. Simmler, J. Vella and H. Wardell-Burrows, European Network for Economic and Fiscal Policy Research, EconPol Policy Brief 39/2021, November 2021, and conversations with the authors.

¹³ Essentially defined as financial accounting profit for constituent entities of the MNE in the country, with the addition of any taxes paid that constitute taxes falling within scope of the GloBE minimum tax (“covered taxes”).

could be achieved by simply applying a 15 percent rate to all profits of in-scope entities arising in the country.

Table 1. Impact of SBIE on Total Tax Due

	CIT rate 20 percent	CIT rate 10 percent	CIT rate 5 percent	CIT rate 0 percent
No SBIE				
Financial profit	1000	1000	1000	1000
[Profit s.t. SBIE] 1/	[n/a]	[n/a]	[n/a]	[n/a]
[Residual profit] 1/	[n/a]	[n/a]	[n/a]	[n/a]
Covered tax	200	100	50	0
Effective Tax Rate (“ETR”); covered tax divided by financial profit	200/1000 = 20%	100/1000 = 10%	50/1000 = 5%	0/1000 = 0%
Top up tax = (15 - ETR) x all financial profit (where no SBIE applicable)	None, not applicable	.05 x 1000 = 50	.10 x 1000 = 100	.15 x 1000 = 150
Total Tax	200	150	150	150
With SBIE				
Financial profit	1000	1000	1000	1000
Profit s.t. SBIE	400	400	400	400
Residual-profit	600	600	600	600
Covered tax	200	100	50	0
ETR	200/1000 = 20%	100/1000 = 10%	50/1000 = 5%	0/1000 = 0%
Top up tax ((15 - ETR) x residual profit only)	None, ETR exceeds 15 percent	.05 x 600 = 30	.10 x 600 = 60	.15 x 600 = 90
Total Tax	200	130	110	90

1/ Note that the delineation of residual profit is not relevant where there is no SBIE.

If on the other hand, as seen in the bottom part of Table 1, if the SBIE is carved-out from profits subject to a top-up tax, the effective floor on competition – the lower bound – becomes 15 percent of *residual (excess) profits only* (here, 90) rather than 15 percent of total profit (as above, 150). To the extent that the carve-out represents profit on “real” economic investments as measured by the proportion of tangible assets and labor input in total profit, up to that proportion (here 40 percent) of total potential source country tax is not subject to the GloBE effective minimum—and could therefore still be reduced by the host country as an incentive to

investment. Here, the sensible course for the source country is to implement a QDMTT to, in effect, allocate the top up tax on *residual profit* to itself, rather than leaving it to the residence/MNE parent country.¹⁴

Investment Incentives and Other Domestic Minimum Taxes

Nearly all Sub-Saharan African countries grant multiple investment incentives of various kinds, including both investment-based incentives such as accelerated depreciation or credits for investment, and profit-based incentives such as tax holidays or reduced tax rates.¹⁵ Some of these incentives are universally available, some target foreign investment, some are available through free zones, some otherwise regionally targeted, some have thresholds. Some incentives are available only through statute (including in investment codes); others involve discretion on the part of government agencies. Many are the result of intense tax competition for investment within the region or sub-regions. The variations are enormous, but proliferation has been rapid. One study found, for example, that fewer than half of SSA countries offered tax holidays in 1980, while in 2005 more than 80 percent did so; and in 1980 while only one country had an official free zone reducing CIT, by 2005 18 did so.¹⁶ Another more recent survey of 30 SSA countries (roughly two thirds) found that 60 percent of the 30 utilized tax holidays and exemptions, and nearly that many had some form of tax-free zones.¹⁷ The impact of tax incentives in general is to reduce the effective tax rate on investing entities—frequently below the GloBE 15 percent minimum ETR.¹⁸

However, 15 SSA countries presently also have domestic minimum taxes (DMTs) calculated based upon gross turnover (as opposed to on an asset base, or a financial income base.)¹⁹ Rates of these DMTs range from 0.5 percent of gross turnover up to 2.0 percent, with most centering around 1.0 percent. These DMTs offset existing tax incentives to one degree or another—though with considerable variation in degree and method.²⁰

¹⁴ It is important to recognize that some—perhaps many—existing incentives in LICs that reduce the effective tax rate are subject to tax stabilization agreements that typically would restrict the country from imposing a QDMTT—or other tax increase—with respect to the investing companies’ income. Given the fact that relevant MNEs would have to pay the GloBE top up tax elsewhere in the same amount, however, affected countries may be able to negotiate with the investors in order to impose the tax themselves through the QDMTT.

¹⁵ While nominal headline CIT rates have fallen, too, in SSA countries, they remain quite high by global standards, mostly between 25 and 30 percent, with some higher.

¹⁶ Keen and Mansour, fn 3 above. [

¹⁷ Sebastian James, “*Tax and Non-Tax Incentives and Investments: Evidence and Policy Implications*,” World Bank 2013. Notably, that survey found that nearly 50 percent of surveyed SSA countries had discretionary tax incentives—by far the largest proportion of any world region.

¹⁸ For GloBE purposes, the impact of purely timing-based incentives (ie., accelerated depreciation) does not have this effect.

¹⁹ Aqib Aslam and Maria Coelho, “*Characteristics and Impact of Corporate Minimum Taxation: A Firm Lower Bound*,” IMF WP/21/161.

²⁰ In all these cases, statutory headline CIT rates are between 25 and 30 percent. Country information collated by this author on rates, design of DMTs, and types of incentives.

How will such turnover based DMTs interact with the GloBE to change the impact of tax incentives? This, as shown in Table 2, depends upon whether such DMTs are considered to be covered taxes for purposes of Pillar 2; the answer is not clear. The issue is dealt with in paragraphs 27-32 of the March 2022 Commentary on Article 4.2 of the December 2021 Model Rules. “Simplified methods” that serve as taxes “in lieu of” generally applicable CITs will count, where they operate as substitutes; this would appear to cover presumptive taxes levied on small businesses, for example. And net income-based taxes operating in addition to the regular CIT such as resource rent taxes on extractive industries (specifically cited) also count as covered taxes. However, a tax “imposed on an alternative basis that applies in addition to, and not as a substitute for, a generally applicable income tax ... would not fall under the “in lieu of” test for Covered Taxes.”²¹ This seems to cover, and possibly is aimed at, digital services taxes. But if interpreted literally, it would also cover turnover based add-on minimum taxes.

In the examples in Table 2,²² it is assumed that the DMT is such an add-on minimum tax—implemented by calculating the turnover tax, calculating the regular corporate tax taking into account the tax incentive reductions to the rate or base, and adding any positive excess of the DMT over the CIT. Thus the CIT is charged, and the excess of the DMT over that amount is added on to the total tax bill. This appears to be the most common approach in effect in SSA countries using such turnover based minimum taxes.²³

The illustrative DMT rate is 1 percent of turnover. The statutory CIT rate is 25 percent; 760 of otherwise chargeable taxable profit of 1000 is for purposes of illustration subject to a tax holiday (effective rate of 0 percent). The first column gives a base case, in which there is no DMT and Pillar 2 does not apply; the second column shows a case where there is a 1 percent of gross turnover add-on minimum tax, and the third column shows the case with the Pillar 2 GloBE minimum tax but no DMT turnover tax. The last two columns show the case where both are applicable. In the penultimate column the DMT does constitute a covered tax; in the last, it does not.

The MNE constituent entity would in the covered tax case be subject to the same amount of total tax with or without the DMT; the difference in otherwise applicable tax would be made up by the GloBE top up tax—whether picked up as an offset to the GloBE tax by the source country through a QDMTT (in addition to the DMT), or by the residence parent country through an IIR.

But there is a large difference in the total tax burden if the DMT is not a covered tax. In that case, GloBE Net Income would exclude the DMT of 40, as would the measurement of covered

²¹ Paragraph 32, Commentary (March 2022) on Article 4.2.1, p. 93.

²² This example abstracts from an SBIE for purposes of illustration.

²³ It should be noted, though, that in some cases, the turnover based minimum tax is only applied if the company in question has an actual tax loss for the year in question, rather than simply a reduction in its otherwise-applicable tax bill. From an economic standpoint, this doesn’t make a great deal of sense.

taxes. In the example, the source country retains 34 of the 40 in DMT added tax,²⁴ rather than having it all be offset through the GloBE calculation. Presumably, if a country had implemented a domestic turnover based add on tax already, it would want to continue it in this case— although just as before it would decrease the competitive effect of the existing tax incentives.

Table 2. Interaction of GloBE and a 1 Percent Domestic Turnover-Based Minimum Tax (DMT)

	No GloBE and no DMT (base case)	DMT and no GloBE	GloBE and no DMT	Both GloBE and DMT; DMT is a covered tax	Both GloBE and DMT; DMT is not a CT
Turnover	10000	10000	10000	10000	10000
Financial accounting profit ignoring taxes	1000	1000	1000	1000	1000
Profit subject to CIT statutory rate = 25 percent	240	240	240	240	240
<i>tax</i>	60	60	60	60	60
Profit subject to Tax Holiday: rate = 0 percent	760	760	760	760	760
<i>tax</i>	0	0	0	0	0
DMT = 1 percent of turnover (less CIT paid)	<i>n/a</i>	40	0	40	40
Financial accounting profit after taxes	940	900	940	900	900
Globe net income	<i>n/a</i>	<i>n/a</i>	1000	1000	960
Covered tax	<i>n/a</i>	<i>n/a</i>	60	100	60
ETR	<i>n/a</i>	<i>n/a</i>	60/1000= 6%	100/1000=10%	60/960 = 6.25%
Top up tax	<i>n/a</i>	<i>n/a</i>	.09 x 1000 = 90	.05 x 1000 = 50	.0875x960= 84
TOTAL tax	60	100	150	150	184

²⁴ Note that 34 is equal to 85 percent of the otherwise available DMT of 40; only 15 percent (the minimum tax rate on excess profits) of the DMT is offset by the GloBE where the DMT is not a covered tax.

Qualified Refundable Tax Credit (QRTC)

The Pillar 2 rules provide, in addition to the SBIE, another means of continuing to compete through tax incentives, through qualified refundable tax credits (QRTCs). In order to be qualified, a credit must be designed in such a way that it is refundable within 4 years of the entitlement having arisen, if it has not already been offset against income by then. While the regime cannot be designed such that it is impossible or unlikely that entitlement to a cash refund will ever arise, if that test is met it is not necessary that refunds generally be paid out.²⁵ The goal apparently is to protect the impact of certain existing incentives (largely in developed countries) particularly, but not limited to, research and development credits.²⁶

The regime works by treating QRTCs as GloBE income in the year the entitlement to the credit arises, rather than as a reduction in covered taxes²⁷—in other words, as if they were direct grants from government to taxpayers. Conversely, non-qualified refundable (or non-refundable) tax credits are treated like other tax incentives—not included in GloBE income and excluded from covered taxes. The example in Table 3 below abstracts from the SBIE and assumes that all financial income here constitutes residual profit for GloBE purposes. *The net result can be an effective tax rate falling below 15 percent of residual profits, as shown.*

²⁵ Commentary, paragraph 135.

²⁶ The United States is apparently working with the OECD to clarify which of its many tax credits will be in effect thus excluded from the minimum tax calculations. See, Tax Notes International, May 6, 2022.

²⁷ December 2021 Rules for the GloBE, Article 3.2.4; March 2022 Commentary, Article 3.2.4 paragraphs 110-114; Article 10 paragraphs 134-138.

Table 3. Impact of QRTCs; CIT rate of 10 percent before credits ²⁸

	Base Case (no credit)	QRTC = 50	Non-qual credit = 50
Financial acc't profit	1000	1000	1000
Tax paid pre-credit	100	100	100
Credit	n/a	50	50
GloBE income	1000	1050	1000
Covered tax	100	100	50
Effective tax rate as defined for GloBE calculation (ETR)	10 %	9.5 %	5 %
Top up tax	$(.05 * 1000) = 50$	$(.055 * 1050) = 55$	$(.10 * 1000) = 100$
Total tax paid	$(100 + 50) = 150$	$(100 - 50 + 55) = 105$	$(100 - 50 + 100) = 150$
Overall tax paid as percentage of residual profit	$150 / 1000 = 15 \%$	$105 / 1000 = 10.5 \%$	$150 / 1000 = 15 \%$

Refundable CIT credits are perhaps the one approach not frequently used now as an incentive in low-income countries. The reluctance encountered in paying VAT refunds in many LICs would likely apply equally to CIT credit refunds—systems that require in effect writing checks by government are (sometimes rightly) viewed as ripe for evasion and corruption.

Given the clear, and apparently intended, possibility that QRTCs will permit effective tax rates on residual profits after the SBIE carve outs to fall below 15 percent, however, it seems likely if undesirable that SSA governments will feel themselves under pressure to design incentives to take advantage of this route. The Commentary hints at some hesitancy regarding the potential of QRTCs to undercut the goal of setting a floor under tax competition. It notes that “...if those jurisdictions adopting the common approach identify risks associated with the treatment of tax credits and government grants that lead to unintended outcomes” further conditions or alternative rules can be explored. ²⁹

Section 3—the Subject to Tax Rule (STTR)

Background

Pillar 2 includes, in addition to the GloBE rules, a provision known as the subject to tax rule (STTR), intended to benefit lower income source countries. The provision was included in the

²⁸ While SSA countries normally have statutory nominal tax rates above 10 percent, effectively the tax on a company’s overall profit (as discussed above) can fall well below the nominal rate.

²⁹ Commentary, Article 10, paragraph 138.

October 2020 Blueprint³⁰ and described again in the October 2021 summary document—but its parameters are not fully worked out and it was not addressed at all in the December 2021 rules or subsequent March commentary. The STTR is to be implemented through treaty provisions, to be adopted using an instrument akin to a second multilateral instrument (MLI) similar to the MLI under the first BEPS agreement. According to the schedule put out by the OECD in October 2021, a draft of this instrument should have been promulgated by March 2022, and should be finalized by mid-2022; no evidence has yet been forthcoming, however, of draft provisions.

The STTR was originally included as a benefit to lower income source countries. Before the QDMTT made its sudden public appearance in December 2021 the entire direct benefit of the GloBE effective minimum taxes was likely be realized by residence countries,³¹ with the UTPR (formerly known as the “undertaxed payments/profits rule”)—which could produce at least some direct allocation of revenue to source countries—designed only to be a fall-back provision. Some observers have criticized the STTR on grounds that it will have little actual effect. An examination of the present SSA treaty network indicates that the STTR could apply in a number of SSA countries should they choose to use it—and should it actually be finalized. The impact on SSA countries will, though, also depend in turn on behavioral changes in the treaty partner countries, that is, whether countries with lower than 9 percent nominal tax rates on interest and royalty payments are induced by the STTR to increase those rates in order to pick up the increased tax themselves.³²

How the STTR works

The STTR will allow lower income countries³³ that have relatively low rates of gross withholding through existing bi-lateral treaties on interest and royalties (and other payments to be specified later) to require bi-lateral treaty partners to revise their treaties to permit the payor country meeting certain rules to top up those rates to 9 percent, on a payment-by-payment basis. That is, unlike the GloBE top up tax, no overall effective rate is calculated. The STTR is to apply where: (i) the payee is a “connected person,” defined in relation to the OECD and UN model treaty definition of “closely related” parties; (ii) the *nominal rate* of tax applicable to the payment in the hands of the payee is less than 9 percent;³⁴ and (iii) some threshold is met. The last is not yet specified; the Blueprint notes that its design is to be studied and may involve payment size, MNE scale, or other more complex parameters.

³⁰ October 2020 Blueprint, Chapter 9.

³¹ In the absence of possible unilateral changes to domestic rates and rules by source countries.

³² One example already in process is the proposed adoption by the UAE of a corporate income tax, with an ostensible minimum rate of 9 percent. Much uncertainty surrounds this, however, particularly in the context of the UAE’s numerous “free zones” and treatment of foreign businesses. See for example, Tax Notes International, “UAE Will Introduce Corporate Tax and Transfer Pricing,” May 20, 2022.

³³ Defined as countries with a GNI per capita of 12,535 or less US dollars. OECD, October 2021.

³⁴ The specific rate of 9 percent was also introduced in the October 2021 document.

This rule is specifically *not* intended to “[revisit] the current allocation of taxing rights between jurisdictions.”³⁵ Rather:

“[I]t is based on the rationale that a source jurisdiction that has ceded taxing rights [under a treaty] should be able to apply a top up tax to the agreed minimum rate, where, as a result of BEPS structures...the income that benefits from treaty protection is not taxed or is taxed at below the minimum rate in the [payee jurisdiction.]”

In other words, the idea is to reduce related party profit shifting using treaties with low tax countries—and to throw the resulting additional tax back to the source countries, as another type of “top-up” tax. The payments to be covered are those that relate to “mobile capital, assets, or risk.” Note, though, that depending upon one’s definition of “allocation,” this means that some taxing rights that were given up to intermediate countries are in fact being reallocated back to lower income countries, if they so choose. The prevalence of treaties across SSA which would fall under the parameters described is not trivial. Table 4 includes SSA country treaties: (i) with nine countries that frequently serve as tax planning hubs; and (ii) that include either or both an interest or royalty withholding rate below 9 percent.

Table 4. SSA Countries’ Treaty Networks with Planning Hub Countries: Interest/Royalty rates

³⁵ The OECD description of the STTR specifically contrasts its intent – to reduce profit shifting – with that of the recent UN Model treaty article 12A which is designed to apply cross border gross withholding taxes to many service payments between both related and unrelated parties, and thus explicitly to allocate a greater proportion of tax to source countries.

	Mauritius	Seychelles	UAE	Qatar	Netherlands	Luxembourg	Ireland	Switz.	Singapore
Angola			8/8						
Botswana	12/12.5	7.5/10			7.5/7.5		7.5/7.5		
Cameroon			7/10						
Cape Verde									
Comoros			7/10						
Cote D'Ivoire								15/0	
Eswatini	5/7.5	7.5/10							
Ethiopia		5/5	5/5		10/5		5/5		5/5
Ghana					8/8			10/0	7/7
Guinea			0/0						
Kenya		10/10	10/10	0/10	10/10				
Lesotho	10/10								
Madagascar	10/5								
Malawi					10/5			0/0	
Mauritania			0/0						
Mauritius	XXX	0/0	0/0	0/5		0/0			0/0
Mozambique	8/15		0/5						
Namibia	10/5								
Niger			0/10						
Nigeria					12.5/12.5				7.5/7.5
Rep of Congo	5/0								
Rwanda	10/10								10/10
Senegal	0/0		5/5	0/0		0/0			
Seychelles	0/0	XXX	0/5	0/5		0/0			12/8
South Africa	10/5		10/10		0/0	0/0	0/0	5/0	7.5/5
Uganda	10/10				0/10				
Zambia	10/5	5/10					10/10	10/0	
Zimbabwe	10/15		0/9		0/10				

Source: author's calculations.

Memorandum: a few of these treaties are signed but not ratified

For the 26 SSA countries that have treaties to which the STTR could apply,³⁶ 36 treaties include a reduced withholding rate for interest of less than 9 percent (of which 15 have a rate of zero percent), and 32 include royalty withholding rates of less than 9 percent (of which 13 have a zero percent rate). Nine treaties include zero rates on both interest and royalties. Mauritius and Seychelles treaties also typically provide very low or zero rates with other countries—as they are countries that serve as planning hubs themselves. Some of these treaties are old, and some quite new (eg, with the UAE); many do not have anti-abuse provisions.

There are two issues. First, a mandatory increase in previously negotiated low or zero withholding rates under the STTR will – unlike the QDMTT case – result in a higher tax burden on investment subject to the provisions. If the payor (source) country does not choose to

³⁶ Excluding Mauritius and the Seychelles, themselves tax planning hubs frequently used in connection with investment into other SSA countries.

impose higher withholding tax through the STTR, neither would higher taxes be paid elsewhere. This is a tax competition issue. Unlike the GloBE minimum tax, the STTR provisions would apply to all covered payments; they would apparently not be limited to constituent entities of in-scope MNEs. This means that if adopted there could be higher impact on revenues of the payor country. In essence, this gives source countries that are parties to covered treaties the opportunity for reconsideration and mandatory revision of those treaties—again, should they so choose.

Second, though, withholding payments under the STTR will constitute covered taxes for purposes of the GloBE minimum tax rules, where the entities involved do fall within scope.³⁷ Where that is the case, the resulting interaction of these provisions is shown in Table 5 below. The direct net impact on investors in any specific payment case depends upon the relative sizes of otherwise covered taxes, and the added withholding taxes under the STTR. Essentially, if the added withholding tax pushes the covered tax ETR above 15 percent, just as in any other case in which the ETR goes above 15 percent, at the margin all additional taxes will then fall on the investor and will be subject to tax competition not blocked by the Pillar 2 minimum top up taxes.

Table 5. Impact of STTR Additional Withholding – Columns 3 and 5³⁸

	<i>Interest payment = 200 No withholding</i>	<i>Interest payment = 200 9 percent w/h</i>	<i>Interest payment = 400 No withholding</i>	<i>Interest payment = 400 9 percent w/h</i>
Gross income	1200	1200	1400	1400
Taxable income	1000	1000	1000	1000
Of which taxed @ 25%	500	500	500	500
Of which taxed @ 0 %	500	500	500	500
Gross withholding	0	18	0	36
Covered tax	$500 \times .25 = 125$	$125 + 18 = 143$	$500 \times .25 = 125$	$125 + 36 = 161$
ETR	12.5 %	14.3 %	12.5 %	16.1 %
Top up tax	$.025 \times 1000 = 25$	$.007 \times 1000 = 7$	$.025 \times 1000 = 25$	n/a
Total tax	150	150	150	161

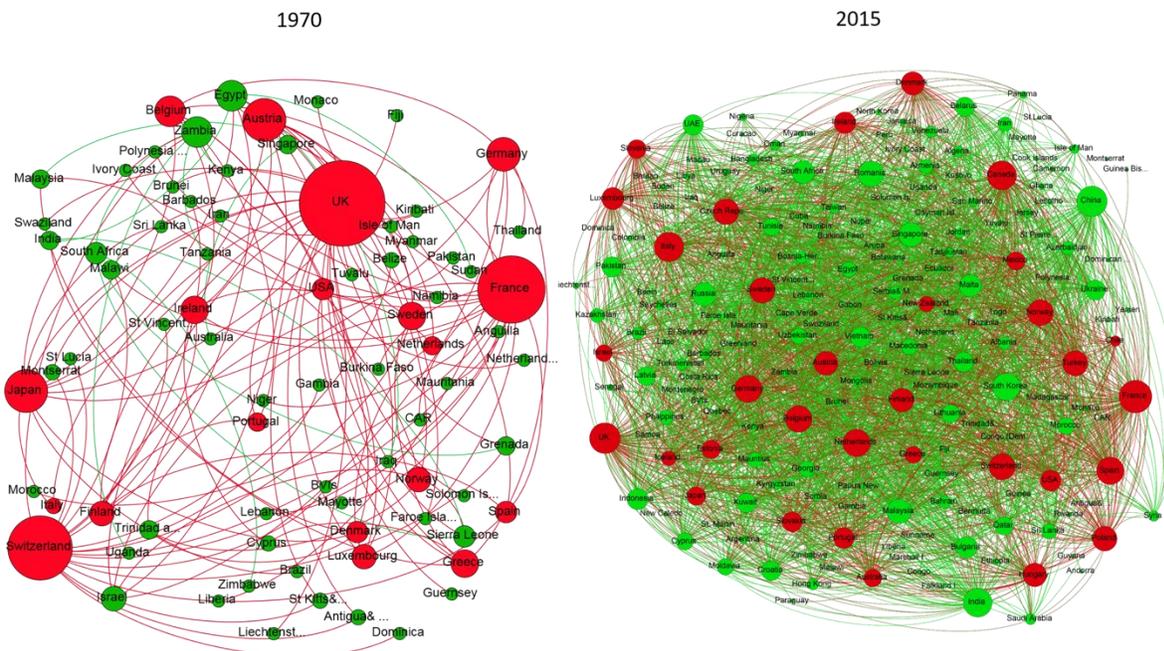
³⁷ OECD (2022), *Tax Challenges Arising from the Digitalisation of the Economy – Commentary to the Global Anti- Base Erosion Model Rules (Pillar Two)*, OECD, Paris, <https://www.oecd.org/tax/beps/tax-challenges-arising-from-the-digitalisation-of-the-economy-global-anti-base-erosion-model-rules-pillar-two-commentary.pdf>, Chapter 4, paragraph 31.

³⁸ This assumes for simplicity that the tax rate on this interest in the payee country is 0 percent.

Use of treaties by LICs more generally

As has frequently been said, a country's treaty network is only as strong as its weakest (most disadvantageous) treaty.³⁹ In other words, any good MNE tax planning advisor could utilize a single treaty with low interest or royalty withholding to structure those payments ultimately to any country—further treaties needn't exist in the payor country. Further, to exacerbate this effect, some non-hub bi-lateral treaties entered by SSA countries include “most favored nation” clauses. This could mean that if a treaty between a country in SSA and an advanced country included a 20 percent interest withholding rate but also a most favored nation clause, and if the SSA country also entered another treaty elsewhere that included a zero percent withholding rate, payees in the first advanced country would be entitled to claim that zero rate as well. And the network of treaties among and including developing countries has exploded in the past few decades, as illustrated in Figure 1. Red bubbles and lines are OECD countries; green bubbles and lines show non-OECD country treaty networks, in which one or both partner countries are non-OECD members. Bubble sizes indicate relative scope of a country's treaty network.

Figure 1. Bi-lateral double tax treaty networks over time



Source: IMF calculations

³⁹ See for further discussion: IMF Selected Issues Paper, “International Taxation Issues in Kenya,” 2018, available at: <https://www.elibrary.imf.org/view/journals/002/2018/296/article-A004-en.xml>; Platform for Collaboration on Tax, “Toolkit on Tax Treaty Negotiations,” https://www.tax-platform.org/sites/pct/files/publications/The%20Toolkit%20on%20Tax%20Treaty%20Negotiations%20Toolkit_Updated%20052021.pdf.

For countries that are source only—that is, the recipients of foreign investment but not the residences of outbound investors—entry into reduced rates of taxation through bi-lateral tax treaties is a one-way transaction. These gross withholding provisions were originally designed with two-way capital flows in mind. Any benefits must thus be weighed against the revenue losses from reducing statutory rates of taxation on interest, royalties, and any other covered gross payments. This is exactly the same sort of calculus that should be undertaken in determining the advantages and disadvantages of granting other sorts of tax benefits to investors; it constitutes a negotiated investment incentive structure. Thus, to remove these advantages through the STTR, if the resultant direct tax increase exceeds the otherwise applicable top up tax under Pillar 2, will be the equivalent of withdrawing a current or future tax incentive. This is an incentive that takes the form of permitted income stripping into low tax countries. Withdrawing this incentive, though not phrased as such, is exactly what the STTR is designed to allow low-income countries now to do; the question they will have to answer is whether the benefits in added revenue will be worth this disincentivization.

Problems and potential of STTR provisions as currently envisioned

There are a number of potential limiting factors and weaknesses in the STTR provisions, as they have been described to date. On the one hand are criticisms that might be called “rage against the machine”— problems that stem directly from the agreed policy design of the concept. It is argued by some LIC representatives and their advocates that the STTR adjustments should be broader—that they should not be restricted (as so far) to interest and royalties, nor to related parties, and that the minimum rate should be higher than 9 percent—the goal being exactly to shift more taxation back to source countries and not simply to minimize opportunities for excess profit shifting to low or no tax jurisdictions.

Taking as given that the purpose is limited to the stated anti-profit shifting rationale, however, there are issues to be resolved. The use of a nominal taxation test in the hands of the immediate payee only, while understandable from the point of view of simplicity, will need anti-avoidance provisions in order to be effective. It would be possible for example to achieve an effective rate of zero where the nominal rate applicable to the payee in the payee country is above 9 percent, by the simple device of setting up back-to-back related party loans from a low tax jurisdiction to the entity in the payee country.

Several important features of the proposed STTR plans explicitly remain to be studied and resolved.⁴⁰ Perhaps most important is whether payments for management and technical services from the entity in the low-income country to a connected entity in the payee country will be covered in such a way that gross withholding can be increased to 9 percent—or more likely can be introduced—in existing treaties. Such payments have been an increasing source of concern as a means of income stripping from SSA countries, so much so that the UN Model Treaty was amended in 2018 to include a new Article 12A to include withholding on such

⁴⁰ October 2020 Blueprint, paragraphs 569, 596.

payments for services provided from abroad.⁴¹ If it is to be effective the STTR should certainly be expanded to cover these high-risk service payments.

Second, it is intended that a threshold will be included below which the STTR changes would not be available. Several possible approaches were set out in the October 2020 Blueprint.⁴² Much of the discussion there turns on the burdens for MNEs. That should not be the issue; rather, the significance of aggregate potentially covered payments *in relation to the tax base of the low-income country in question* should be the test. Typical MNEs have both greater capacity and resources to address this issue than the low-income source countries in which they have invested, and have themselves created the complex structures that give rise to the underlying profit shifting problem.

Finally, and importantly, the Blueprint indicates that “further consideration” will be given to whether the STTR may also apply to “gains that would otherwise be taxable in the source state and are shifted into the residence jurisdiction in order to escape taxation.”⁴³ And it is suggested that the STTR should cover such payments in relation to capital gains even where made between unrelated parties. The intention here is not entirely clear from the brief description in the Blueprint. Capital gains provisions in bi-lateral tax treaties do not fall under the provisions governing gross withholding payments on interest, dividends, royalties and the like, but rather under Article 13 of the OECD and UN model treaties, which allocate the tax base on gain resulting from various transactions between the treaty partners. Amendments to the relevant provisions through the STTR would therefore appear to extend its coverage beyond the 9 percent minimum withholding rate on related party payments. This would be a positive result for many low income SSA countries, possibly particularly those with natural resource production.

The impact of so-called “offshore indirect transfers of interest” – used to shift gains away from source countries to generally low-taxed foreign jurisdictions – has been discussed and addressed extensively.⁴⁴ In short, this is accomplished by trading corporate shares, or other interests, farther up the chain of ownership and outside the jurisdiction wherein the resources and their government granted license rights are located. Presumably the cryptic reference in the Blueprint relates to such transfers. Existing treaties frequently do not allocate the gains from such indirect transfers to the source country.⁴⁵ The first BEPS project addressed this issue only through the inclusion in the Multi-Lateral Instrument (MLI) for treaty revisions of a non-mandatory clause, in section 9, that would if agreed by both treaty partners include the more

⁴¹ As noted above, the UN model treaty provision would go well beyond related party payments, but an STTR provision that covered only payments to connected entities would nonetheless help to stem income stripping.

⁴² Blueprint paragraphs 623-636: “materiality considerations.”

⁴³ Blueprint paragraph 569.

⁴⁴ See e.g., “*The Taxation of Offshore Indirect Transfers—A Toolkit*”, Platform for Collaboration on Tax, June 2020, https://www.tax-platform.org/sites/pct/files/publications/PCT_Toolkit_The_Taxation_of_Offshore_Indirect_Transfers.pdf

⁴⁵ Note too that the source country must have in place domestic legislation that would reach such transfers, in order to take advantage of the allocation of rights under treaty provisions.

expansive—source country advantaged—version of Article 13. While potentially very valuable for low-income countries, the majority of advanced treaty partner countries did not agree to include the provision during the MLI negotiation process. *A significant benefit of including coverage of these transfers under the STTR would be that this would become mandatory where covered lower income countries requested their treaty partners to include the provision.*

It is therefore clear that the STTR could result in potentially significant increases in revenue – particularly if withholding on management and service fees and capital gain taxation on indirect transfers are covered. Again, however, and as the provisions are aimed at reducing tax avoidance through profit shifting, this would represent a withdrawal by the SSA country of a form of current or future tax incentive.

Section 4—competition after the GloBE

The GloBE effective minimum tax provisions ostensibly set a floor under the ability of source countries to engage in tax competition. But there are many caveats. Exceptions and allowances for certain tax incentives have made their way into the Pillar 2 structure as designed so far, and depending upon behavioral responses, the exceptions may nearly swallow the rule. Before even arriving at that point, though, it must be noted that the practice of transfer mis-pricing remains unaffected by Pillar 2. The financial accounting income that forms the basis for calculating GloBE net income is itself determined using the arm’s length method for the transactions that go into it. Such mispricing is a source of income stripping from LICs now, and nothing in Pillar 2 changes this, although to the extent that such mispricing by companies results in the transfer of taxable profits in excess of SBIE carveouts to intermediate low tax jurisdictions, the incentive for them to do so will arguably be reduced. Here again, though, the remaining profits beyond the SBIE—and, importantly, with respect to out-of-scope MNEs—will remain subject to those incentives.⁴⁶

The intention of the SBIE carve out is that reductions in effective corporate tax rates below 15 percent of GloBE excess profits will not benefit in-scope MNEs—and thus be deterred. However, competition for “real” activity—that is, in regard to any corporate profit taxes above that level—will still be effective. Competition by various other means is unaffected by the GloBE top up tax provisions, even with regard to excess profits as calculated under the GloBE Pillar 2 rules. This could include competition by means of direct expenditures—such as improvements in infrastructure designed to benefit investors; this is all outside the scope and intended purview of the Pillar 2 project. But such competition could also, as described above, take place through the operation of QRTCs as presently provided under the GloBE rules. The question is how far this route will be pursued by MNEs, their advisors, and SSA (and other source) countries.

⁴⁶ “Part B” of Pillar 1, if ultimately adopted, would create a safe harbor for certain marketing and distribution functions that could reduce the complexity of policing transfer pricing for many LICs. *LICs could benefit further from additional safe harbors for other transactions.*

In addition to direct expenditures to lure investment, and the provisions of Pillar 2, other aspects of the tax system, such as offering payroll tax reductions for MNE employers in conjunction with the adoption of a QDMTT by a country, could result. Exploration of the implications of such changes goes beyond the scope of this paper, but should not be disregarded.⁴⁷

Finally, both the fate of the STTR in the international negotiations and rule drafting, and its implication for lower income SSA countries, remain to be seen. Under current circumstances, many of those countries could gain at least some revenue by adopting—and causing their treaty partners to agree to—the envisioned changes in treaty withholding tax rates. On one hand, though, the results will be heavily or entirely dependent upon the behavioral responses of the treaty partners. Perhaps more important however is the very fact that the STTR changes to treaty withholding as envisioned were aimed, again, at reducing opportunities for profit shifting. If that unrolls as planned, this means that adopting SSA countries are in effect reducing or eliminating one significant means of tax competition; these affected treaties themselves constitute incentives for investing MNEs that utilize, or may utilize, those treaties to minimize their taxes through complex planning structures.

Section 5—conclusions

Low-income SSA countries should unambiguously adopt QDMTTs. There is no apparent downside to doing so, and to the extent that any top up taxes under the GloBE are incurred, the source country can through this means appropriate that tax to itself without any disincentives to investment. Low-income countries should take advantage of the option to collect those taxes rather than leaving them to other countries' treasuries. Beyond that, though, responses in reaction to Pillar 2 will be dependent upon a country's analysis of its economic position, and its attitude toward continuing, expanding or limiting tax competition for foreign investment.

The advent of Pillar 2 affords the opportunity to reconsider aspects of both a country's tax system and its treaty network in regard to international tax competition and, conversely, the protection of its tax base. Other than excess profit minimum tax under a QDMTT, all of these considerations present trade-offs. The STTR case will depend upon the nature and scale of investment within the source country, and upon the ultimate drafting (if any) of the STTR provisions—in particular, for resource countries, whether the provisions do encompass the ability to revise the rules regarding gains on offshore indirect sales of interests.

⁴⁷ Such a shift could actually be beneficial. The effective minimum tax floor on “excess profits” arguably proxies for a tax on economic rents—a non-distortive tax compared to taxes on normal returns to capital, or to taxes on labor. Thus, a shift to a tax on GloBE excess profits, in exchange for a tax reduction on labor, would be more economically efficient. Further, to the extent that some portion of the incidence falls on labor, such a reduction shifts part of the burden of taxation offshore, to foreign investors, and away from domestic employees in the low-income country. That shift would generally be progressive.

SSA countries should be especially careful in regard to QRTCs. They must ask themselves, if faced with pressures to provide incentives in such form, whether they really are willing to pay out cash refunds to investors—in some cases, these could constitute very large refunds. This is a political as well as a fiscal issue. And even if the answer is yes, they must ask further whether the government has the administrative capacity to monitor such credits.

Pillar 2 would introduce important – fundamental—changes in the international tax architecture, through multinational agreement that in principle some floor should be set under international tax competition and the erosion of the corporate tax base. This, if actually enacted by a sufficient body of countries, would benefit the countries of Sub-Saharan Africa. Yet Pillar 2 as presently envisioned is a far cry from the adoption of a global minimum tax of 15 percent, as it is frequently portrayed in the popular press. The inclusion of highly complex exceptions and work-arounds as described here illustrate the difficulties not only at the political, but the technical, level in attempting to stem the erosion of the global corporate profits tax.