

The Legal Framework for Carbon Tax: A Case of Cameroon

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Abstract. This article builds a case in favour of using carbon tax as a cost-effective tool for regulating greenhouse gas (GHG) emissions as part of the climate change mitigation solution in terms of discouraging further GHG emission. Drawing on existing primary and secondary data, the article makes an assessment of the Cameroon's legal environment for the design and implementation of carbon tax and articulates on the prospects and challenges of designing and implementing it. The article postulates that in spite of the promising opportunities that carbon tax offers for regulating GHG emissions, the potentials of this climate-smart fiscal policy tool has not yet been explored within the framework of climate governance in Cameroon. The article finds that while the spirit of carbon tax is underpinned by relevant environmental law principles, there is a timid legal framework both at the international and national levels for using carbon to regulate GHG emissions in Cameroon. The article concludes with a recommendation of the strong need for Cameroon to introduce a carbon-tax system as one of the cost-effective measures to reduce the country's GHG emissions by adopting a carbon tax legal instrument designed specifically to target major GHG emitters across dozens of economic sectors. The model of carbon tax proposed for Cameroon could be useful and replicable elsewhere.

Keywords: Cameroon, carbon tax, framework, greenhouse gas emissions, legal, regulating, etc

1. Introduction

As climate change and its associated impacts¹ continue to surge, countries continue to explore holistic and cost-effective solutions to reduce the emissions of greenhouse gases (GHGs) especially carbon dioxide (CO₂) and methane – the two principal GHGs that are responsible for climate change.² Carbon tax is one of the prominent policy instruments being largely promoted³ in many countries as a cost-effective tool for reducing GHGs worldwide in recent years. In fact, carbon tax as one of the carbon pricing instruments that put a price on

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- 1 Such impacts rising temperatures, heat waves, melting of ice, raising sea levels, boosting flood and storm intensity, shifting seasons and rainfall patterns, boosting droughts, dwindling crop yields, food insecurity, extinction of certain species of flora and fauna and general loss biodiversity, etc.
- 2 See IPCC, (2022), 'Climate Change 2022: Mitigation of Climate Change', Summary for Policymakers, Working Group III contribution to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change, p. 4. See also U.S. EPA's Inventory of U.S. Greenhouse Gas Emissions and Sinks: 1990-2020, <https://www.epa.gov/ghgemissions/inventory-us-greenhouse-gas-emissions-and-sinks>, (accessed 15 May 2022).
- 3 See The World Bank, (2021), 'State and Trends of Carbon Pricing 2021', International Bank for Reconstruction and Development / The World Bank, Washington DC, <https://openknowledge.worldbank.org/bitstream/handle/10986/35620/9781464817281.pdf>, accessed 15 May 2022. See also Carbon Tax Center, (2015), 'A Call to Paris Climate Negotiators: Tax Carbon', CTC's Paris-Summit Letter, <https://www.carbontax.org/ctcs-paris-summit-letter/>, accessed 15 May 2022. On 29 November 2015, the eve of the UN climate summit in Paris, the Carbon Tax Center publicly disclosed a letter signed by 32 notable individuals, calling on Paris climate negotiators to focus on national carbon taxes, both for their intrinsic value and as a gateway to a global carbon price. The Parliament of Canada passed the Greenhouse Gas Pollution Pricing Act (GHGPPA) towards the end of 2018 under Bill C-74 although the GHGPPA refers to charge or pricing instead of taxation. The charge which was expected to rise to \$50 per tonne of CO₂ by 2022, was to begin at CA\$20 in 2019 and increases by CA\$10 per year until 2022.

GHG emissions has become increasingly popular and is gaining traction as a market-based policy instrument to regulate GHG emissions.⁴ The surge in interest in carbon tax has come as countries have developed Nationally Determined Contributions (NDCs) under the Paris Agreement on Climate Change⁵ (herein after the Paris Agreement) and are in search of cost-effective solutions to achieve their GHG emissions reduction targets in order to slow the pace of climate change. The growing momentum for using carbon tax to tackle climate change in recent years has encouraged countries across the globe to adopt carbon tax legislation to guide the design and implementation of carbon taxes aimed at reducing GHG emissions. Although it is expected of the industrialised countries to take lead in reducing GHGs and in mobilising funds from a wide variety of sources, instruments and channels required to finance climate actions,⁶ non-industrialised countries such as Cameroon must also take significant steps in this regards. Indeed, carbon tax is an important component of the wider global climate financing landscape which can be implemented by non-industrialised countries such as Cameroon.

As expressed by the OECD,⁷ the challenges posed by climate change are so enormous that it is unlikely that they can be addressed unless countries design and implement cost-effective policy tools. One such cost-effective policy tools is carbon tax. It has been suggested by the David Suzuki Foundation⁸ and rightly so that putting a price on GHG emissions by means of a carbon tax is one of the most powerful regulatory incentives that governments can implement to encourage GHG emitting companies to emit less by investing in cleaner technologies and adopting greener practices. Many countries around the world have adopted and are implementing carbon tax legislation to reduce and even discourage GHG emissions and promote net-zero emissions investments.⁹ In the Global North for instance, the Swedish Ministry of Environment estimated that carbon tax led to an additional 20% emissions reduction (as opposed to solely relying on regulations), enabling the country to achieve its 2012 emission reduction target under the Kyoto Protocol (KP).¹⁰ The World Bank and Ecofys in a report¹¹ in 2018 presented 26 national examples of carbon tax practices around the world with promising opportunities for addressing climate change in terms of mitigation and adaptation. The relevance of carbon tax as a tool for mitigating GHG emissions after 30 years of the UNFCCC is therefore gaining grounds.

In spite of the promising opportunities that carbon tax offers for regulating GHG emissions, the potentials of this climate-smart fiscal policy tool is timidly explored within the framework of climate governance in countries in the Global South. South Africa happens to be the only country in which carbon tax is being implemented while it is still under consideration in Senegal and Côte d'Ivoire according to a recent World Bank publication.¹² Although Cameroon is characterised by a very low level of industrialisation and therefore a low emitter of GHGs, large-scale agriculture, forest exploitation, livestock rearing, fossil fuel production and use, etc., contribute to GHG emissions in various degrees no matter how small.¹³ Moreover, the government of Cameroon has committed to the ambitious goal of making the country an emerging economy by 2035, and industrial development and large-scale agricultural investments have major roles to play in achieving this ambitious goal as outlined in the Vision

4 Erik Haites, (2018), 'Carbon taxes and greenhouse gas emissions trading systems: what have we learned?', *Climate Policy*, Vol. 18 No. 8, p. 963, DOI: <https://doi.org/10.1080/14693062.2018.1492897> (accessed on 15 February 2021).

5 Adopted on 15 December 2015, signed in New York on 22 April 2016, entered into force on 04 November 2016.

6 Article 9(3) of the Paris Agreement.

7 OECD, (2013), 'Effective Carbon Prices', OECD Publishing, pp. 15 and 93, available at https://read.oecd-ilibrary.org/environment/effective-carbon-prices_9789264196964-en#page4 (accessed on 26 January 2021).

8 David Suzuki Foundation, 'Carbon tax or cap-and-trade?', available at <https://davidssuzuki.org/what-you-can-do/carbon-tax-cap-trade/> (accessed on 26 January 2021).

9 The World Bank, 2021, "State and Trends of Carbon Pricing 2021" (May), World Bank, Washington, DC., Doi: 10.1596/978-1-46481728-1. License: Creative Commons Attribution CC BY 3.0 IGO.

10 David Suzuki Foundation, op. cit.

11 World Bank and Ecofys, (2018), 'State and Trends of Carbon Pricing 2018 (May)', World Bank, Washington, DC, Doi: 10.1596/978-1-4648-1292-7, pp. 39-52.

12 The World Bank, 2021, op. cit., p. 10.

13 See the Intended Nationally Determined Contribution (INDC) of Cameroon, pp. 1, 4 to 6, available at <https://www4.unfccc.int/sites/ndcstaging/PublishedDocuments/Cameroon%20First/CPDN%20CMR%20Final.pdf>.

2035¹⁴ and the Growth and Employment Strategy Paper (GESP)¹⁵ that serve as the country's economic policy and compass for emergence by 2035. This government ambition of making Cameroon an emerging economy may mean increased pressure on carbon sinks and reservoirs¹⁶ with implications for high GHG emissions. This makes a strong case for the need to design and implement carbon tax in Cameroon that can contribute to reduce and even discourage investments that cause GHG emissions in order to enable the country to deliver on its NDC under the Paris Agreement on cutting emissions and slow the pace of climate change. Cameroon signed the Paris Agreement on 22 April 2016 and ratified it on 29 July 2016¹⁷ and, in terms of its NDC, pledged a 32% reduction in carbon emissions by 2035 compared to business-as-usual levels, taking 2010 as the reference year and conditional upon international support in the form of financing, capacity building and transfer of technology.¹⁸ Meeting this commitment requires robust GHG emissions reduction tools such as carbon tax.

As will be demonstrated in this article, despite the prospects or opportunities that carbon tax presents for reducing GHGs and slowing the pace of climate change, designing and implementing such a tax can be challenging.

The objective of this paper is to assess the suitability of Cameroon's legal environment for the introduction and implementation of a carbon tax for the purpose of regulating GHG emissions and slow the pace of climate change. The assessment seeks to outline the opportunities but also the challenges that can bedevil the design and implementation of a carbon tax in Cameroon.

In terms of methodology, the article uses a mix of empirical, doctrinal and analytical legal research methods to investigate and analyze both primary and secondary data as it relates to carbon tax in the context of combating climate change. These methods are employed to assess relevant international and national legal and policy instruments in order to establish whether such legal and policy instruments create an enabling legal environment for the design and implementation of a carbon tax as part of the climate change mitigation solution in terms of reducing GHG emissions in Cameroon.

In order to achieve the stated goal, this article is divided into 5 sections. After this introduction, section 2 makes a clarification of what a carbon tax is, section 3 makes an analysis of the relevant international and national laws, as well as policy instruments to assess the legal environment for the design and implementation of a carbon tax in Cameroon and section 4 engages with the prospects and challenges of implementing carbon tax in Cameroon. The article ends with section 5 that treats the conclusion and recommendations.

A starting point will be to understand what a carbon tax is.

2. Understanding a Carbon Tax

The United Nations defines a carbon tax as 'a policy option aimed at curbing carbon-based emissions responsible for climate change, in line with the commitments undertaken by countries under the Paris Agreement.'¹⁹ As a market-based mechanism and fiscal policy tool that can help regulate GHG emissions from sources, a carbon tax puts a price on the emission of greenhouse gases (GHGs), thereby motivating companies to invest in cleaner technology or switch to more efficient practices.²⁰ As one of the carbon pricing tools that put a price on GHG emissions, carbon tax encourages emitters to produce less of such gases.²¹ Thus, a carbon

14 See Cameroon, 2009, *Cameroon Vision 2035*, Ministry of Economic Planning and Regional Development, available at <http://www.lse.ac.uk/GranthamInstitute/wp-content/uploads/laws/1816.pdf>.

15 See Cameroon, 2009, *Growth and Employment Strategy Paper (GESP) – 2010/2020*, available at https://www.cameroonembassyusa.org/images/documents_folder/quick_links/Cameroon_DSCE_English_Version_Growth_and_Employment_Strategy_Paper_MONITORING.pdf.

16 Examples of carbon sinks and reservoirs include forests, soils, water bodies, etc.

17 The national instrument of ratification is Law No. 2016/008 of 12 July 2016.

18 See the objective of the INDC of Cameroon, 2015, p. 2.

19 United Nations, (2021), 'United Nations Handbook on Carbon Taxation for Developing Countries', United Nations, New York, USA, p. 3, available at <https://desapublications.un.org/file/918/download> (accessed on 26 May 2022).

20 *Ibid.*

21 Tax Policy Center, (2020), 'Tax Policy Center Briefing Book, Urban-Brookings Tax Policy Center, p. 1, available at <https://www.taxpolicycenter.org/briefing-book/what-carbon-tax> (accessed on 26 January 2021).

tax may be understood as a fee that a government imposes on any activity that causes the emission of GHGs. The fee or charge is intended to discourage activities that generate GHGs.

The purpose of a carbon tax is to return the cost of climate change to those responsible for causing same in line with the polluter pays principle and within the spirit of climate justice by ensuring that the emitters of GHGs pay for the costs they impose on society.²² To put it differently, carbon tax seeks to price GHGs by obliging the emitter to internalise the external costs of emitting GHGs that cause climate change, and contribute towards addressing the harm caused by such emissions.²³ It thus creates an appropriate incentive to stimulate changes in the behaviour of emitters.²⁴ Carbon tax therefore reflects the costs of emitting GHGs which are currently being borne by those who suffer from the effects of climate change such as the poor and vulnerable groups and smallholder farmers. As noted by Marron and others,²⁵ ‘a well-designed tax could efficiently reduce the emissions that cause climate change, encourage innovation in cleaner technologies’.

As a versatile instrument, carbon tax can be adapted to a wide range of policy goals and national contexts.²⁶ For example, the principal objective of implementing carbon tax in many countries is to stimulate cost-effective GHG emissions reduction, but also to stimulate low-carbon innovation as has been the case in Singapore.²⁷ A high carbon tax for instance, could push businesses to make more green investment choices, leading to a shift from high to low emission investments.²⁸ As highlighted by the International Monetary Fund (IMF),²⁹ carbon tax could form the centerpiece of efforts to cause high carbon emitters to cut down on their GHG emissions, while also raising sizable revenue for national climate finance.³⁰ Carbon tax can incentivise companies to innovate and bring about a low-carbon economy by undertaking low-carbon investments and producing low-carbon consumer products.³¹ This implies that carbon tax has a dissuasive effect on activities that cause the emission of GHGs. For instance, because carbon tax will increase the cost of GHG-based products such as fuels, it will motivate companies to switch to clean and sustainable energy sources such as wind and solar.³² Beyond GHG emission mitigation, carbon tax also has the potential of generating a number of benefits including revenue for the State, local environmental benefits and a high efficiency of the tax system.³³ In the case of Cameroon, revenues from carbon tax could be used to finance climate mitigation and adaptation actions and to subsidize smallholder farmers who are one of the most vulnerable groups to climate change.³⁴

- 22 National Treasury, Republic of South Africa, (2013), ‘Carbon Tax Policy Paper’, p. 46, available at <http://www.treasury.gov.za/public%20comments/Carbon%20Tax%20Policy%20Paper%202013.pdf> (accessed on 15 February 2021); Reuven S. Avi-Yonah and David M. Uhlmann, (2009), ‘Combating Global Climate Change: Why a Carbon Tax is a Better Response to Global Warming than Cap and Trade’, *Stanford Environmental Law Journal*, Vol. 28, No. 1, p. 7.
- 23 Ibid.
- 24 National Treasury, Republic of South Africa, *ibid.*, p. 46; Reuven S. Avi-Yonah and David M. Uhlmann, *op. cit.*, p. 7.
- 25 Donald Marron, Eric Toder and Lydia Austin, (2015), ‘Taxing Carbon: What, Why, and How’, Tax Policy Center: Urban Institute and Brookings Institution, p. 1, available at <http://dx.doi.org/10.2139/ssrn.2625084> (accessed on 26 January 2021).
- 26 Partnership for Market Readiness (PMR), (2017), ‘Carbon Tax Guide: A Handbook for Policy Makers’, World Bank, Washington, DC. <https://openknowledge.worldbank.org/handle/10986/26300> License: CC BY 3.0 IGO, pp. 9 and 41.
- 27 World Bank and Ecofys, *op. cit.*, p. 25; Erik Haites, *op. cit.*, p. 955.
- 28 Kyle Pomerleau and Elke Asen, (2019), ‘Carbon Tax and Revenue Recycling: Revenue, Economic, and Distributional Implications’, Fiscal Fact No. 674, Tax Foundation, p. 7, <https://files.taxfoundation.org/20191105134952/Carbon-Tax-and-Revenue-Recycling-Revenue-Economic-and-Distributional-Implications-PDF.pdf>, accessed 16 May 2022; Winkler H. and Marquard A., (2011), Analysis of the economic implications of a carbon tax, *Journal of Energy in Southern Africa*, Vol. 22 No 1, p. 55.
- 29 International Monetary Fund (IMF), (2019), ‘Fiscal Monitor: How to Mitigate Climate Change’, International Monetary Fund, Washington, p. 24.
- 30 Bowen A., (2015), ‘Carbon pricing: how best to use the revenue?’, Policy brief, Grantham Research Institute on Climate Change and the Environment and Global Green Growth Institute, p. 5.
- 31 National Treasury, Republic of South Africa, *op. cit.*, p. 30.
- 32 See Winkler H. and Marquard A., *op. cit.*, p. 55.
- 33 Partnership for Market Readiness (PMR), *op. cit.*, pp. 39 and 41; World Bank and Ecofys, *op. cit.*, p. 12; Reuven S. Avi-Yonah and David M. Uhlmann, *op. cit.*, pp. 7 and 40.
- 34 Nyong Princely Awazi, Martin Ngankam Tchambam, Lucie Felicite Temgoua, Marie-Louise Tientcheu Avana, (2020), ‘Appraisal of smallholder farmers’ vulnerability to climatic variations and changes in the Western Highlands of Cameroon’, *Scientific African*, Vol. 10, p. 1, <https://doi.org/10.1016/j.sciaf.2020.e00637> (accessed 16 May 2022); Clodine S. Mbuli, Lotsmart N. Fonjong, and Amber J. Fletcher, (2021), ‘Climate Change and Small Farmers’ Vulnerability to Food Insecurity in Cameroon’, *Sustainability*, 13(3), p. 1, <https://doi.org/10.3390/su13031523> (accessed on 16 May 2022); Celia A. Harvey, Milagro Saborio-Rodríguez, M.

The operationalization of a carbon in Cameroon however requires the existence of a suitable legal framework that can guide and regulate its implementation.

3. Enabling Legal Environment Underlying the Institution and Implementation of Carbon Tax in Cameroon

Legislation and policy constitute springboards for driving environmental protection actions and therefore constitute the basis for instituting and implementing carbon tax for the purpose of regulating GHG emissions. In the same manner, environmental principles create an enabling environment, perhaps more so when they are constitutionalised, as part of the phenomenon of environmental constitutionality.³⁵

3.1. *Relevant Legal Instruments Providing Anchor Points for the Design and Implementation of Carbon Tax in Cameroon*

Both international and national legal instruments contain relevant provisions that lend support to the design and implementation of carbon tax for the purpose of regulating GHG emissions in Cameroon. An analysis of the international legal instruments that support the introduction of a carbon tax in Cameroon is therefore crucial.

3.1.1. *International Legal Instruments that Support the Introduction of a Carbon Tax to which Cameroon Subscribes*

It is surprising that the 1992 United Nations Framework Convention on Climate Change (UNFCCC),³⁶ the bedrock international legal instrument for combating climate change fails to take on-board carbon tax as a suitable tool for addressing climate change in terms of achieving cost-efficient GHG emission reductions. This is not only surprising, but disappointing especially considering the fact that climate change for the most part is caused by anthropogenic activities.³⁷ Levying carbon tax on such activities for causing GHG emissions in line with the spirit of the polluter-pay principle is important for regulating GHG emissions even though other regulatory mechanisms (such as bans coupled with incentives other than carbon tax) could also be effective. The omission

Ruth Martinez-Rodríguez, Barbara Viguera, Adina Chain-Guadarrama, Raffaele Vignola and Francisco Alpizar, (2018), 'Climate change impacts and adaptation among smallholder farmers in Central America', *Agriculture & Food Security*, 7:57, pp. 1 and 2, <https://doi.org/10.1186/s40066-018-0209-x> (accessed on 16 May 2022).

35 Environmental constitutionalism examines the development, implementation and effectiveness of incorporating environmental rights, procedures, and policies into Constitutions around the globe. See May J-R and Daly E., (2019), 'Judicial Handbook on Environmental Constitutionalism', United Nations Environment Programme (UNEP), Third Edition; Daly E., Kotzé L. and May J-R, (2017), 'Introduction to Environmental Constitutionalism', in Daly E., Kotzé L., May J., Soyapi C., Kreilhuber A., Ognibene L. and Kariuki A., *New Frontiers in Environmental Constitutionalism*, United Nations Environment Programme (UN Environment), p. 30; Ngwome G.F., "Environmental Constitutionalism in Cameroon: Measuring Progress towards its Implementation 20 Years since the 1996 Constitutional Amendment", in A.D. Olinga (dir.), *La Réforme Constitutionnelle du 18 Janvier 1996 au Cameroun 25 ans Après*, Afrédit, Collection Juridis, 2021, p. 406; Calzadilla P-V and Kotzé L-J, (2017), 'Environmental constitutionalism and the ecocentric rights paradigm: the rights of nature in Ecuador and Bolivia', in Daly E., Kotzé L., May J., Soyapi C., Kreilhuber A., Ognibene L. and Kariuki A., *New Frontiers in Environmental Constitutionalism*, United Nations Environment Programme (UN Environment);

36 United Nations Framework Convention on Climate Change 11771 UNTS 107 (1992) (UNFCCC).

37 See IPCC, (2022), Summary for Policymakers [Pörtner H.-O., Roberts D.C., Poloczanska E.S., Mintenbeck K., Tignor M., Alegría A., Craig M., Langsdorf S., Löschke S., Möller V., Okem A. (eds.)]. In: 'Climate Change 2022: Impacts, Adaptation, and Vulnerability,' Contribution of Working Group II to the Sixth Assessment Report of the Intergovernmental Panel on Climate Change [H.-O. Pörtner, D.C. Roberts, M. Tignor, E.S. Poloczanska, K. Mintenbeck, A. Alegría, M. Craig, S. Langsdorf, S. Löschke, V. Möller, A. Okem, B. Rama (eds.)]. Cambridge University Press. See also IPCC, (2007), 'IPCC Working Group I, Contribution to the Fourth Assessment Report of the IPCC: The Physical Science Basis', Summary for Policy Makers pp. 2, 5 and 10; Ngwome Gideon Fosoh, op. cit., p. 5; Risto Seppälä, Alexander Buck and Pia Katila (eds.), (2009), 'Adaptation of Forests and People to Climate Change', A Global Assessment Report, International Union of Forest Research Organisations (IUFRO), World Series Volume 22, Helsinki, p. 9; Tamasang C. F., (2009), 'The Clean Development Mechanism and Forestry Projects in Africa: The Case of Forestry Projects in Cameroon', in Mwebaza Rose and Kotzé Louis J., (dir.) *Environmental Governance and Climate Change in Africa: Legal Perspectives*, Institute for Security Studies, Pretoria, p. 172; Rachel Warren, Jeff Price, Bernardo Strassburg, Jason Lowe and Sarah Raper, (2013), 'Modeling the Role of Remaining Tropical Forests in Climate Change Mitigation', AVOID research programme, Met Office, Walker Institute, Tyndall Centre and Grantham Institute, p. 3.

is arguably understandable in the sense that it is only a framework Convention that sets out the main issues of the law and allows its enabling instruments³⁸ to address specific measures to tackle climate change. Carbon tax is one such specific measures that countries can implement at national levels to address climate change by way of regulating GHG emissions.

The gap has been availed by the Paris Agreement,³⁹ the only international climate legal instrument that explicitly lays the foundation for the development of carbon tax as a carbon pricing mechanism which is instrumental to achieving cost-efficient GHG emission reductions. By recognizing the importance of integrated, holistic and balanced carbon pricing or market-based mechanisms,⁴⁰ the Paris Agreement for the first time in the international climate change negotiation since the inception of the UNFCCC provides a springboard for an open commitment by countries to make use of market-based mechanisms such as a carbon tax in order to meet their commitments to reduce GHG emissions.

Furthermore, the UNFCCC COPs meetings provide appropriate high level political *fora* through which the COPs can explore the opportunities offered by carbon tax to address climate change through the UNFCCC COP decisions.⁴¹ One should therefore expect to see a UNFCCC COP decision that showcases the opportunities offered by carbon tax in regulating GHG emissions which countries can implement at the national levels to tackle climate change. This of course will require strong political will by states.

The international legal instruments that support the introduction of a carbon tax are complemented by domestic legal and policy instruments that are examined next.

3.1.2. *Domestic Legal and Policy Instruments that Support the Introduction of a Carbon Tax in Cameroon*

At present, Cameroon has no legislation specifically adopted to address climate change with the effect that there is not climate law that lays the basis for the operationalization of a carbon tax in the country. Unlike some Parties to the UNFCCC such as Argentina, Mali and Uruguay that did not initially mention carbon tax in their Intended Nationally Determined Contribution (INDC) but have now done so in their first Nationally Determined Contribution (NDCs),⁴² Cameroon's INDCs⁴³ which became its NDC upon the signing of the Paris Agreement does not make provision for carbon tax. This, as a matter of course does not augur well for effective GHG emissions reduction because the NDC which is the Paris Agreement's implementation strategy to reduce GHG emissions⁴⁴ has not taken on-board the lofty carbon tax as a tool for reducing GHG emissions. At a time when countries are exploring different cost-effective measures such as carbon tax to reduce GHG emissions, one would have expected the government of Cameroon to join the trend. A possible explanation why Cameroon has not opted for a carbon tax is that as highlighted in its NDC, its sectoral climate mitigation actions are conditioned on the support of the international community in the form of financing, enforcement of capacity and transfer of technology.⁴⁵ This is clear indication that Cameroon initially did not prioritize carbon tax as a tool for reducing GHGs and meeting its pledge under the Paris Agreement.

38 The enabling instruments of the UNFCCC are the Paris Agreement and the Conference of Parties (COP) Decisions.

39 Article 6(8) of the Paris Agreement.

40 Article 6(8) of the Paris Agreement.

41 Representing all the countries that are Parties to the UNFCCC, the Conference of the Parties (COPs) is the "supreme body" and highest decision-making authority of the UNFCCC that is responsible for stimulating international efforts to address climate change. In this regard, the COPs review the implementation of the UNFCCC by Parties (the national communications and emission inventories submitted by Parties) in light of the Convention's its objective, with a focus on experience gained in implementing climate change policies. Based on the information, the COPs assess the effects of the measures taken by Parties and the progress made in achieving the ultimate objective of the Convention. Thus, the COP is a body that is tasked with implementing obligations and even, in some cases, proposing new or expanded obligations over time. See Secretariat of the UNFCCC, (2002), 'A Guide to the Climate Change Convention Process', Bonn, available at <https://unfccc.int/resource/process/guideprocess-p.pdf> and Legal Response Initiative, (2011), The Status of UNFCCC COP and other Treaty Body Decisions under US Law, Briefing paper, available at <https://legalresponse.org/wp-content/uploads/2013/09/BP35E-Briefing-Paper-Status-of-COP-Decisions-under-US-Law-23-November-2011.pdf>.

42 World Bank and Ecofys, op. cit., pp. 8 and 34.

43 Intended Nationally Determined Contribution (INDC) of Cameroon, available at <https://www4.unfccc.int/sites/ndcstaging/PublishedDocuments/Cameroon%20First/CPDN%20CMR%20Final.pdf>.

44 Article 4(9) of the Paris Agreement.

45 See the Intended Nationally Determined Contribution (INDC) of Cameroon, p. 2.

However, Cameroon's National REDD+ Strategy, 2018 makes reference to the need to implement carbon tax as a measure to discourage forest conversion.⁴⁶ The Strategy envisages carbon tax in the following words: 'implement tax measures to discourage forest conversion (carbon tax)'. Carbon tax is therefore recognised as one of the governance tools to reduce GHGs in the context of REDD+ implementation in Cameroon. There is good reason to commend the intentions of the government regarding this recommendation as forest conversion is responsible for high level of GHG emissions in Cameroon caused mainly by agriculture and land use changes.⁴⁷ This analogy notwithstanding, carbon tax is yet to be designed and implemented as a policy tool to discourage GHG emissions within the framework of climate change governance in Cameroon. Moreover, reference to carbon tax in the National REDD+ Strategy is not only made in a non-legally binding instrument, but also in a general manner without further details on how to design and implement it. The opportunities that carbon tax offers in regulating GHG emissions is therefore not yet explored within the framework of climate change governance in Cameroon.

In addition to the legal and policy instruments that support the introduction and implementation of a carbon tax for the purpose of regulating the emission of GHGs in Cameroon, some environmental law principles offer a theoretical foundation or basis for the design and implementation of carbon tax.

3.2. Principles of Environmental Law that Underpin the Institution and Implementation of Carbon Tax for Regulating GHG Emissions

Two fundamental principles of environmental law notably, the polluter-pays principle and the principle of liability underpin the design and implementation of carbon tax for the purpose of regulating GHG emissions in Cameroon. In other words, the polluter-pays principle and the principle of liability offer the theoretical foundation for the implementation of carbon tax for the purpose of combating climate change. Cameroon's Constitution⁴⁸ guarantees to every person a right to a healthy environment and imposes state and individual environmental duties to protect the environment in its preamble, which is part and parcel of the Constitution by virtue of Article 65 of the same. These provisions of the preamble may be interpreted to mean the indirect constitutionalization of the polluter-pays principle and the principle of liability in Cameroon on which carbon tax could be anchored.

3.2.1. The Polluter-Pays Principle as a Basis for Instituting and Implementing Carbon Tax

The 1992 Rio Declaration on Environment and Development⁴⁹ (herein after the Rio Declaration) is the international 'soft law' instrument that lay the foundation for the development, domestication and implementation of the polluter-pays principle. The Declaration clearly captures the polluter-pay principle in the following words:

National authorities should endeavour to promote the internalization of environmental costs and the use of economic instruments, taking into account the approach that the polluter should, in principle, bear the cost of pollution, with due regard to the public interest and without distorting international trade and investment.⁵⁰

In the simplest form, carbon tax requires emitters to pay for the emissions they fail to avoid and the cost of reducing emissions by others thereby reflecting the polluter-pays principle in approach and spirit.⁵¹ The

46 See Ministry of Environment, Protection of Nature and Sustainable Development, National Strategy for Reducing Emissions from Deforestation and Forest Degradation, Sustainable Management of Forests, Conservation of Forest and Enhancement of Carbon Stocks, Final Version, 2018, Annex 1, p. 69, <https://www.undp.org/content/dam/cafi/docs/Cameroon%20documents/STRATEGIE%20NATIONALE%20REDD%20DE%20LA%20R%20c3%89PUBLIQUE%20DU%20CAMEROUN%20-%20JUIN2018.pdf> (accessed on 15 December 2021).

47 See *ibid.*, pp. 13 and 15. See also the Readiness Preparation Proposal (R-PP) of Cameroon, January 2013, prepared under the supervision of the Forest Carbon Partnership Facility (FCPF) and United Nations Collaborative Programme on Reducing Emissions from Deforestation and Forest Degradation in Developing Countries (UN-REDD), p. 37, available at <https://www.forestcarbonpartnership.org/system/files/documents/Cameroon%20final%20R-PP-English-January%202013.pdf>.

48 Law No. 96/06 of 18 January 1996 to amend the Constitution of 2 June 1972 amended and supplemented by Law No. 2008/001 of 14 April 2008.

49 Rio Declaration on Environment and Development, UN Doc. A/CONF.151/26 (Vol. I), 13 June 1992.

50 Principle 16.

51 Partnership for Market Readiness (PMR), *op. cit.*, p. 39.

expression “the polluter should, in principle, bear the cost of pollution, with due regard to the public interest and without distorting international trade and investment” is a progressive provision for instituting and levying carbon tax for the purpose of fighting climate change. In fact, in the context of fighting climate change, carbon tax acts as a signal to GHG emitters (polluters) that net-zero emissions or low-carbon investments are critical for the present and future generations and allows such emitters to decide for themselves whether to discontinue or reduce their emissions or to continue emitting and pay for them in tax accordingly.

Inspired by the Rio Declaration, Cameroon’s Constitution indirectly accommodates the polluter-pay principle in a bit to guarantee to everyone a right to a healthy environment by providing in its preamble that ‘the protection of the environment shall be the duty of every citizen. The State shall ensure the protection and improvement of the environment’. This provision in away connotes or implies that every citizen be it a physical person or moral person must desist from all activities that pollute the environment and in the event that they pollute, must pay for such pollution. Thus, this Constitutional provision reflects the spirit of the polluter-pay principle and could serve as a basis for operationalizing carbon tax by requiring anyone who causes GHG emissions to pay for such emissions. Cameroon also enacted the 1996 Framework Law on Environmental Management⁵² domesticating the polluter-pays principle which can also lend support to the institution and implementation of carbon tax in Cameroon. The relevant provision of the 1996 Framework Law provides that:

Within the framework of the laws and regulation in force, rational environmental and natural resource management are based on... the pollute and pay principle according to which charges resulting from measures aimed at preventing, reducing and fighting against pollution and the rehabilitation of polluted areas shall be borne by the polluter.⁵³

The excerpt from the above provision that “charges resulting from measures aimed at preventing, reducing and fighting against pollution and the rehabilitation of polluted areas shall be borne by the polluter” could serve as a basis for instituting and implementing carbon tax in Cameroon. It would appear no tax in Cameroon has been introduced on the basis of the polluter-pays principle apart from pecuniary sanctions in accordance with Articles 79 to 87 of the Framework Law on Environmental Management. In the context of combating climate change, the charges can be borne by GHG emitters, imposed through a carbon tax. Carbon tax therefore reflects the spirit of the polluter-pays principle. Indeed, in line with the polluter pays principle according to which those who pollute should bear the costs of managing and preventing further damage to human health and the environment, carbon tax, is the embodiment of this principle. The tax can be structured in such a way that those who emit GHGs above a fixed threshold should be liable to pay carbon tax for such emissions. The South African example is much similar to this. According Mason and De Jager, the tax, which is set out in the Carbon Tax Bill, has been structured in such a way that those taxpayers that emit carbon dioxide and its equivalents (CO₂e) will be liable for an additional tax.⁵⁴

Carbon tax also embodies and reflects the spirit of the principle of liability.

3.2.2. *The Principle of Liability as the Basis for Instituting and Implementing Carbon Tax*

The 1972 Stockholm Declaration on the Human Environment⁵⁵ (herein after the Stockholm Declaration) and the Rio Declaration lay the foundation for the development of the principle of liability which could constitute another basis for instituting and implementing carbon tax. In this regard, the Stockholm Declaration although crafted in a ‘soft law shell’, employs a ‘hard law’ choice of word – ‘shall’ in Principle 22, obliging States to “cooperate to develop further the international law regarding liability and compensation for the victims of pollution and other environmental damage caused by activities within the jurisdiction or control of such States to areas beyond their jurisdiction.” Although no country has so far introduced carbon tax on the basis of the principle of liability, States could establish liability schemes such as carbon tax through which the costs of global warming which are currently being borne by those who suffer from the effects of climate change, are returned to

52 Law No. 96/12 of 5 August 1996 relating to the framework law on environmental management.

53 Article 9(c) of the 1996 Framework Law on Environmental Management.

54 See Jenna Mason & Nicole De Jager (TaxTalk Magazine), (2019), The True Cost of a Carbon Tax, available at <https://www.thesait.org.za/news/450494/The-True-Cost-of-a-Carbon-Tax.htm> (accessed on 31 May 2022).

55 Declaration of the United Nations Conference on the Human Environment, Stockholm, 16 June 1972.

the their producers (emitters of GHGs) by ensuring that they pay for such costs through carbon taxes. Revenue from carbon tax could therefore be used to fund climate change mitigation and adaptation projects in areas suffering from the impacts of climate change. This can go a long way to helping Cameroon meet its obligations under the Paris Agreement and its NDC.⁵⁶

On its part, the Rio Declaration in Principle 13 calls on States to

... develop national law regarding liability and compensation for the victims of pollution and other environmental damage, but to also cooperate in an expeditious and more determined manner to develop further international law regarding liability and compensation for adverse effects of environmental damage caused by activities within their jurisdiction or control to areas beyond their jurisdiction.

The first part of Principle 13 of the Rio Declaration that requires States to “develop national law regarding liability and compensation for the victims of pollution and other environmental damage”, lays the foundation for developing and domesticating the principle of liability. This could serve as a basis for instituting and implementing a carbon tax in Cameroon. To put it differently, the principle of liability offers a basis for instituting and implementing carbon tax which is a tool to engage the liability of emitters of GHGs that cause climate change and its associated impacts even though countries that are already implementing carbon tax have not expressly stated that they do so on the basis of the principle of liability. Indeed, in line with the principle of liability which holds that any person who, through his actions, creates conditions likely to endanger human health and the environment shall eliminate or cause the said condition to be eliminated in such a way as to avoid the said effects, the carbon tax, is the embodiment of this principle. The tax can be structured in such a way that those who emit GHGs above a fixed threshold (which can be likened to conditions likely to endanger human health and the environment) will be liable to pay carbon tax for such emissions. Revenue from carbon tax can then be used to compensate victims of climate change through adaptation projects in and beyond Cameroon in line with the second part of the Rio Declaration and the Paris Agreement⁵⁷ requiring States to “cooperate in an expeditious and more determined manner to develop further international law regarding liability and compensation for adverse effects of environmental damage caused by activities within their jurisdiction or control to areas beyond their jurisdiction.”

Inspired by the relevant provisions of the Rio and the Stockholm Declarations that provide international policy guidelines for the development and implementation of the principle of liability, Cameroon also domesticated the principle of liability in the Constitution and in the 1996 Framework Law on Environmental Management. The relevant provision of this law provides that:

... any person who, through his actions, creates conditions likely to endanger human health and the environment shall eliminate or cause the said condition to be eliminated in such a way as to avoid the said effects.⁵⁸

In laying down the principle of liability, the 1996 Framework Law on Environmental Management provides a legal basis for the institution and implementation of carbon tax which can be levied on any person (for example, an emitter of GHGs) who, through his actions (for instance, activities that cause GHG emissions), creates conditions likely to endanger human health and the environment (for example, climate change). Revenue from the carbon tax could be used to fight against climate change by funding climate change mitigation and adaption projects.

Having made an analysis of the legal and policy framework, including the environmental law principles that support the introduction and implementation of carbon tax in Cameroon, it very important to examine and outline the prospects or opportunities but also the challenges that may hinder the design and implementation of a carbon tax in Cameroon.

56 Cameroon’s obligations under the Paris Agreement as stated in its NDC is to achieve a 35% GHG reduction by 2030 compared to 2010, including an unconditional contribution of 12%. The NDC also reflects Cameroon’s vision for adaptation, including the goal to turn climate-related challenges into development solutions in the five agro-ecological zones of the country in the areas of Agriculture, Forestry and Other Land Use; Energy; Waste; Industry. Through the implementation of its NDC, Cameroon is aiming at reducing the vulnerability of local populations and achieving sustainable development for all.

57 See Articles 6(1) and (2); 7(6) and (7); 11(3); and 12 of the Paris Agreement.

58 Article 9(d) of the 1996 Framework Law on Environmental Management.

4. The Prospects and Challenges of Implementing Carbon Tax in Cameroon

4.1. *The Prospects of Implementing Carbon Tax in Cameroon*

Carbon tax is widely recognised⁵⁹ as an opportunity and the most cost-effective policy instrument to reduce GHG emissions, slow the pace of climate change and stir economies towards a low-carbon emission path compared to other measures such as subsidies and other regulatory instruments. This is probably why an increasing number of countries are implementing carbon tax to meet their emission reduction targets under the international climate change regime.⁶⁰ In fact, since 1990 when the first carbon taxes⁶¹ were implemented, the number of countries⁶² in which carbon tax is in operation and under consideration has increased steadily in recent years. In Africa, apart from South Africa in which carbon tax is being implemented and Senegal and Côte d'Ivoire in which carbon tax is still under consideration,⁶³ countries of the global South including Cameroon have not yet joined the train.

Falcão⁶⁴ has argued that existing non-tax climate change policies are unable to result in a reduction of carbon emissions due to among other factors, administrative complexity, mismatched policies in different countries, burdensome methods for measuring emissions, too much tax holidays in the form of exemptions, subsidies, credits, etc., all of which can be blamed on politics. Furthermore, Avi-Yonah and Uhlmann⁶⁵ note that while regulatory tools can help reduce carbon emissions as part of a broad-based approach to tackle climate change, majority of the debate among scholars and policymakers has favoured market-based approaches to limit carbon emissions and that a market-based instrument may be the best approach to address all sources of GHGs. Ngwome⁶⁶ notes that public fund and markets-based financing of climate actions from industrialised countries are unlikely to meet the regular and long-term funding needed by so-called developing countries to effectively mitigate climate change and improve livelihoods. Internal funding sources through carbon tax for example, are therefore crucial for bridging the financial gap. Within the context of implementing the REDD+ initiative for instance, countries such as Costa Rica and Mexico had long established mechanisms through taxation to generate internal funds to finance the initiative.⁶⁷ Cameroon and other countries in the global South could replicate these countries' examples. In fact, many countries have implemented carbon tax with positive outcome from which Cameroon can replicate. For example, in 2013, Britain imposed a carbon tax of \$25 per metric ton of CO₂ and in 2019 Canada imposed a national carbon tax of \$16 per ton of CO₂.⁶⁸ Other examples are Alberta and British Columbia in Canada that use carbon taxes as part of their strategies to reduce emissions and encourage investments in energy-efficiency and

59 Reuven S. Avi-Yonah and David M. Uhlmann, op. cit., p. 6; OECD, op. cit., p. 13; Torbjörn Schiebe, (2019), 'Should every country on earth copy Sweden's carbon tax?', Carbon Pricing Leadership Coalition, available at <https://www.carbonpricingleadership.org/blogs/2019/10/18/should-every-country-on-earth-copy-swedens-carbon-tax>, accessed 26 January 2021; World Bank and Ecofys, op. cit., pp. 12 and 25; Partnership for Market Readiness (PMR), op. cit., pp. 33 and 41; Erik Haites, op. cit., p. 955; Gbenga Akinwande, (2014), 'The Prospects and Challenges of the Proposed Carbon Tax Regime in South Africa: Lessons from the Nigerian Experience', AFE BABALOLA University: *Journal of Sustainable Development Law and Policy*, 3:1, p. 177.

60 The World Bank, 2021, op. cit., pp. 10, 23, 28.

61 Erik Haites, op. cit., pp. 956 and 959.

62 Some of the Countries in which carbon tax is in operation or under consideration around the world include: Mexico, British Columbia and Alberta in Canada, Manitoba, Colombia, Costa Rica, Chile, Brazil, Newfoundland and Labrador, Japan, Republic of Korea, India, Singapore, South Africa, Cote d'Ivoire, Switzerland, Iceland, Norway, Estonia, Sweden, France, Ireland, United Kingdom, Denmark, Portugal, Latvia, Poland, Slovenia, Australia, etc. See Partnership for Market Readiness (PMR), op. cit., pp. 9 and 77 and The World Bank, 2021, op. cit., pp. 10, 23, 28.

63 The World Bank, 2021, op. cit., p. 10.

64 Tatiana Falcão, (2019), 'A Proposition for a Multilateral Carbon Tax Treaty', IBFD, Amsterdam, the Netherlands, p. 2.

65 Reuven S. Avi-Yonah and David M. Uhlmann, op. cit., pp. 28 and 30.

66 Ngwome Gideon Fosoh, (2018), 'The Contribution of Forest to Climate Change Mitigation under the REDD+ Initiative in Cameroon: The Search for an Appropriate Legal Framework', Ph.D Thesis, University of Yaounde II, p. 317.

67 Isilda Nhantumbo and Marisa Camargo, (2015), 'REDD+ for profit or for good? Review of private sector and NGO experience in REDD+ projects', *Natural Resource Issues*, No. 30. IIED, London, p. 59.

68 Kimberly Amadeo and Eric Estevez, (2020), 'Carbon Tax, Its Purpose, and How It Works', available at <https://www.thebalance.com/carbon-tax-definition-how-it-works-4158043#citation-31> (accessed on 26 January 2021).

renewable energy.⁶⁹ Cameroon and other countries of the global South can replicate and adapt these best practice examples and introduce carbon tax which can reduce the emission of GHGs, spur innovation and a transition to a low-carbon economy and ultimately, to meet their pledges under the Paris Agreement.

The carbon heavy or carbon intensive sectors in Cameroon that would be subject to a carbon tax are many and therefore necessitate the institution of such a tax in the country. They include but are not limited to the forestry and land-use change, agricultural, energy, waste, and industrial sectors. A breakdown of GHG emissions in Cameroon shows that land-use change contributes about 51,51% to the total amount of the country's GHG emissions, followed by the agricultural sector with 37,37%, the energy sector with 7,7%, the waste sector with 4,4% and lastly, the industrial sector with 1,1%.⁷⁰ The introduction of a carbon tax in Cameroon would help them to reduce their amount of GHG emissions but would also incentivize them to innovate.

A concern that requires some clarification is whether the global North models of carbon tax can easily be transplanted in the global South such as in Cameroon. The United Nations Handbook on Carbon Taxation for Developing Countries⁷¹ helps sheds some light. The Handbook notes that 'countries in every region and at all levels of development can take action to reorient their domestic tax policies to raise revenues' and that 'multilateral solutions and international cooperation can amplify and support these individual endeavours'.⁷² This implies that the global North models of carbon tax need not be transplanted to the global South such as in Cameroon as, with the support of multilateral solutions and international cooperation, they can take advantage of their existing fiscal infrastructure to design and implement carbon tax. In replicating the global North Model of carbon tax, Cameroon and other countries of the global South will have to build on its existing tax infrastructure to design and implement their own country specific carbon taxes. Countries of the global South can design and implement according to their different needs and priorities.⁷³

The economies of many industrialised countries that have used carbon taxes to discourage GHG emissions and promote green investments, remain solid, watering down the concern raised by the David Suzuki Foundation that carbon tax would damage economies.⁷⁴ A good example in this regard is Sweden that introduced carbon tax to reduce GHG emissions since 1991 and since then, its economy has grown by more than 100%.⁷⁵ In fact, the Swedish Ministry of Environment estimated that although a suite of other policies were also used, carbon tax reduced emissions by an additional 20% (as opposed to solely relying on regulations), enabling the country to achieve its 2012 target under the Kyoto Protocol.⁷⁶ Cameroon can emulate these good examples and introduce carbon tax to help meet its carbon cut commitment under the Paris Agreement. However, Cameroon is not an industrialized country and since no country in the global South has recorded a success story regarding the implementation of carbon tax to cut its GHGs, whether or not it will work in the global South such as in Cameroon is still to be ascertained.

Appropriate governance structures are critical for administering carbon tax, performing effective monitoring, reporting and verification (MRV) of emissions and ensuring compliance with tax obligations.⁷⁷ One of the advantages of implementing carbon tax in Cameroon is that the country already has a tax collection framework and a tax administration in place, and can therefore align the administration of carbon tax with the existing taxation framework and administration.⁷⁸ The government can rely on existing taxation framework to tax GHG emitters. Since designing effective administrative arrangements requires establishing the actions needed to oversee and implement the tax, the government will need to map the various functions that need to be carried

69 Partnership for Market Readiness (PMR), op. cit., p. 110.

70 See the R-PP of Cameroon, op. cit., p. 37.

71 United Nations, op. cit., p. 3.

72 Ibid., p. 2.

73 Ibid., p. 3.

74 David Suzuki Foundation, op. cit.

75 Partnership for Market Readiness (PMR), op. cit., p. 110. See also Torbjörn Schiebe, op. cit.; World Bank and Ecofys, (2018), "State and Trends of Carbon Pricing 2018 (May)", World Bank, Washington, DC., p. 20, Doi: 10.1596/978-1-4648-1292-7. License: Creative Commons Attribution CC BY 3.0 IGO; Bowen A., op. cit., p. 16.

76 David Suzuki Foundation, op. cit.

77 Partnership for Market Readiness (PMR), op. cit., p. 132.

78 United Nations, op. cit., p. 3.

out in administering the carbon tax.⁷⁹ This will enable the government to determine whether to adapt the existing taxation framework and administrative services or to create additional procedures and bodies.

Another opportunity for the administration of carbon tax in Cameroon is that it can be levied at the source, allowing the government to tax the full carbon-emission potential of any source. In the case of the energy sector for instance, carbon tax can be levied whenever energy is generated at the source. On this note, carbon tax appears simple to implement and more transparent. Another prospect of carbon tax is that it is simple to implement in the sense that it can be imposed at a fixed rate per ton of carbon content on the main sources of CO₂ emissions. Monitoring of the carbon content and sources can be performed by independent certified bodies working in partnership with the Secretariat of the UNFCCC. Carbon tax is also simple to administer or implement because it could be levied “upstream” (e.g., during logging and clearing or conversion of forest to agricultural lands, during energy production) as opposed to midstream (e.g., wood and agricultural products transformation, oil refineries) and “downstream” (e.g., energy use),⁸⁰ i.e., at the genesis of emission such as clearing of forest, or importation of products with high carbon content such as fertilizer. It is even simpler because there are few large or high GHGs emitters. E.g., there are few logging companies, few large-scale agricultural investors, few importers of high carbon content fertilizer, few energy production companies, etc.

In order to take full advantage of the opportunities of a carbon tax, and replicate favourable experiences elsewhere in the world, the challenges of implementing carbon tax in Cameroon will need to be addressed. These challenges are discussed next.

4.2. *The Challenges of Implementing Carbon Tax in Cameroon*

Although carbon tax could be helpful in combating climate change, in the words of Marron and others,⁸¹ ‘moving a carbon tax from the whiteboard to reality is challenging. A tax that works well in principle may stumble in practice. A real carbon tax will inevitably fall short of the whiteboard ideal’. Thus, despite the opportunities that carbon tax presents for tackling climate change in Cameroon, its implementation in the country could be hampered by some difficulties. The major challenges of designing and implementing carbon tax in Cameroon which require close attention include: absence of legislation or legislative provision that can provide a springboard for its design and implementation; how to levy it and the cost or tax rate; when to levy it – whether or not it will be an upfront tax; who should be taxed; the socio-economic costs associated with its implementation – whether it will have any negative impact on the population and the economy as a whole. These are crucial questions that require clarifications on how carbon tax can be designed and implemented in Cameroon.

As with any tool for combating climate change, legislation serves as the bedrock of actions to reduce GHG emissions. At present, Cameroon disappointingly has no carbon tax legislation with the effect that the opportunities offered by carbon tax are not being tapped in the country. As argued in the case of Chile,⁸² legislation is needed to: identify establishments subject to carbon tax; quantify emissions subject to taxation; establish emissions declaration rules; tax calculation and payment; etc. Such legislation constitutes a spring board for the design and implementation of carbon tax in Cameroon. It would appear the prospects of such legislation being introduced in Cameroon are far-fetched as the country has not enacted any climate change related legislation so far. Moreover, the government of Cameroon relies heavily on the 2018 REDD+ Strategy⁸³ to tackle climate change.

79 Partnership for Market Readiness (PMR), op. cit., p. 132.

80 Pew Center on Global Climate Change, (2008), ‘Tax Policies to Reduce Greenhouse Gas Emissions’, *Congressional Policy Brief*, Arlington, pp. 1 and 8.

81 Donald Marron, Eric Toder, and Lydia Austin, op. cit., p. 1.

82 Partnership on Transparency in the Paris Agreement, ‘Chile’s Carbon Tax: An Ambitious Step towards Environmentally Friendly Policies and Significant Greenhouse Gas Emission Reductions’, available at https://www.transparency-partnership.net/system/files/migrated_document_files/190927_gpd_chile_carbontax_web.pdf, (accessed 15 February 2021).

83 See Ministry of Environment, Protection of Nature and Sustainable Development, National Strategy for Reducing Emissions from Deforestation and Forest Degradation, Sustainable Management of Forests, Conservation of Forest and Enhancement of Carbon Stocks, Final Version, 2018, <https://www.undp.org/content/dam/caf/docs/Cameroon%20documents/STRATEGIE%20NATIONALE%20REDD%20DE%20LA%20R%20PUBLIQUE%20DU%20CAMEROUN%20-%20JUIN2018.pdf>, (accessed 15 December 2021).

As to the challenge of who should be taxed, the Partnership for Market Readiness⁸⁴ noted that carbon tax can be applied to a wide range of different actors along the value chain, from producers and importers (upstream) to distributors (midstream) and consumers (downstream). Norway and the Canadian provinces of Alberta and British Columbia are standout countries for upstream carbon taxes while; President Joe Biden's green agenda is making upstream carbon tax operations in the US more likely.⁸⁵ This researcher is inclined to reason with Avi-Yonah and Uhlmann who are of the opinion that an upstream carbon tax is the most straightforward approach to tackle climate change because its implementation at the upstream level ensures that the tax covers all emissions because it is levied at the point that GHG emissions are provoked.⁸⁶ Another argument in favour of an upstream carbon tax is that with such an approach, there would be a limited number of taxpayers, which would reduce the rate of tax evasion and compliance costs, resulting in higher tax system efficiency.⁸⁷ That said, legislation could establish a tax-free threshold target beyond which emitters of GHGs across sectors should be taxed. In this regard, sources of GHG emissions that can potentially attract carbon tax in Cameroon are: CO₂ emissions from the forestry sector; methane leakage during the extraction, processing, and transportation of oil and gas; CO₂ emissions from the production of clinker (limestone) for cement production; agricultural and livestock based GHGs, which include nitrous oxide emissions from soil and fertilizer practices, methane emissions from cows, and CO₂ emissions from forest clearance and burning for agriculture);⁸⁸ etc. In the forestry sector for instance, the government could tax forest owners and logging permit holders who store less carbon on their property relative to storage in a baseline year and gives rebates to those who increase carbon storage.⁸⁹ With respect to methane emissions during the extraction, processing, and transport of oil and gas, technologies for monitoring methane emissions are still evolving, but as the IMF⁹⁰ noted, in the meantime methane leakage could be taxed in proportion to a default leakage rate, with rebates for companies that demonstrate emission rate below the default rate. Regarding CO₂ emissions released during the production of clinker for cement production, carbon tax could be levied on clinker production in proportion to a default emission rate as proposed by the IMF.⁹¹ With respect to agricultural and livestock-based GHGs, which include nitrous oxide emissions from soil degradation and fertilizer practices, methane emissions from cows, and CO₂ emissions from forest clearance for agriculture, the IMF⁹² noted that carbon taxes could be imposed per head of cattle, on fertilizer inputs, and on profits for farming involving deforestation and that carbon taxes, however, might be limited to large-scale agricultural investments.⁹³

With respect to the challenge of establishing a tax rate, an important element of designing carbon tax is setting the tax rate. Legislation could establish a minimum emission tax threshold above which a carbon tax should be imposed on any emitter and upon a liability assessment report to be made by an independent assessor. Any emission below the minimum threshold will not trigger the responsibility of an emitter to pay carbon tax. The establishment of a minimum threshold aims at reducing the costs of administering the tax so that the cost of administration is not more than the amount recovered in tax in line with the taxation principle of efficiency.⁹⁴ A threshold is also important because the government will have to deal with a relatively high number of emitters with a significant variation in the rates of emissions across dozens of economic sectors.⁹⁵ In this regard, it would be wise for the government to consider the need to establish two thresholds, one for small emitters (who may

84 Partnership for Market Readiness (PMR), op. cit., p. 74.

85 Wood Mackenzie, (2021), Carbon pricing plans 'could transform upstream oil and gas economics', available at <https://www.woodmac.com/press-releases/carbon-pricing-plans-could-transform-upstream-oil-and-gas-economics/> (accessed on 28 May 2022).

86 Reuven S. Avi-Yonah and David M. Uhlmann, op. cit., p. 31.

87 Izlawanie M., (2022), 'Carbon tax as the most appropriate carbon pricing mechanism for developing countries and strategies to design an effective policy', *AIMS Environmental Science*, Vol. 9, Issue 2: 145-168, doi: 10.3934/environsci.20220012

88 International Monetary Fund (IMF), op. cit., p. 24.

89 Ibid.

90 Ibid.

91 Ibid.

92 Ibid.

93 In the context of this discussion, 'large-scale' agricultural investments as opposed to 'small-scale' agricultural investments are those involving the use of larger cultivated areas intensive chemical inputs that have high GHG emission potentials.

94 Partnership for Market Readiness (PMR), op. cit., p. 84.

95 Ibid.

be many in number) and another for big emitters. With regard to the small emitters, a relatively low threshold may be needed to ensure that, in totality, a significant proportion of GHG emissions are covered.⁹⁶ Thus, there will be two emission tax thresholds representing two different tax rates. Denmark's carbon tax rate varies with the GHG type.⁹⁷ In countries such as Singapore, Canada, Argentina, Iceland, the tax rates increase over time⁹⁸ while there is also the possibility of a static carbon tax rate according to which the carbon tax remains constant over time.⁹⁹ Cameroon could build on these experiences in setting a rate that works best for the country, taking into consideration social, economic, technological, and political context and of course if it eventually decides to establish a carbon tax system.

The tax rate chosen, together with the extent of coverage have implications on the amount of emissions abatement achieved, the revenue raised, and the economic impact of the tax.¹⁰⁰ Ideally, it is important that the amount in tax should be high enough to keep global temperature rise to the safer 1.5°C target as set by the Paris Agreement.¹⁰¹ Although the tax rate should be high enough to discourage activities that generate excessive levels of GHG emissions, it should not be too high as to discourage any investments. Thus, to implement a carbon tax, the government will need to determine the cost or price for each ton of GHG emissions which of course presents some challenges because scientists and economists need to first agree on which assumptions to use.¹⁰² To overcome this challenge, the tax could be levied at a default rate per ton of GHG emissions in line with the taxation principle of certainty. In this regard, it is crucial to provide certainty with respect to the price or tax rate because a stable rate for emissions is important for investment decisions such as shifting to low emission technologies and innovations.¹⁰³ The government may however, need to consider the need to design a flexible tax rate in order to take care of changing circumstances such as inflation.¹⁰⁴ For instance, Iceland's carbon tax rate rises by at least the rate of inflation.¹⁰⁵ As proposed by the Draft Explanatory Memorandum for the South Africa Carbon Tax Bill,¹⁰⁶ targeted emitter could be accorded tax-free allowances in the implementation of carbon tax in order 'to provide for a smooth transition to a low carbon economy and to take into account international competitiveness.' Such allowances include:¹⁰⁷ basic allowance,¹⁰⁸ fugitive emissions allowance,¹⁰⁹ trade exposure allowance,¹¹⁰ performance allowance,¹¹¹ carbon budget allowance,¹¹² and offset allowance.¹¹³

Regarding the challenge of when to levy carbon tax, whether or not it will be an upfront tax, it is important that carbon tax should be applied after emissions have occurred. However, to guarantee effectiveness, legislation could oblige potential emitters to pay some cautions into the public treasury to guaranteed payment of tax when

96 Ibid.

97 World Bank and Ecofys, *op. cit.*, pp. 22 to 23.

98 Ibid., pp. 27, 39, 47, 48.

99 Partnership for Market Readiness (PMR), *op. cit.*, p. 89.

100 Ibid., p. 90.

101 Article 2(1)(a).

102 Kimberly Amadeo and Eric Estevez, *op. cit.*

103 Partnership for Market Readiness (PMR), *op. cit.*, p. 39; Gbenga Akinwande, *op. cit.*, p. 179; Reuven S. Avi-Yonah and David M. Uhlmann, *op. cit.*, p. 42.

104 Partnership for Market Readiness (PMR), *ibid.*, p. 84.

105 Ibid., p. 95.

106 See Draft Explanatory Memorandum for the South Africa Carbon Tax Bill, 2015, p. 21.

107 Ibid., pp. 5, 22-25 and Draft South Africa Carbon Tax Bill, p. 1, 7-13.

108 A basic tax-free allowance of a certain percentage for fuel combustion emissions and a certain percentage for process emissions (GHG emissions "other than combustion emissions occurring as a result of intentional or unintentional reactions between substances or their transformation . . .").

109 Fugitive emissions allowance is an additional percentage allowance for sectors with fugitive emissions ("emissions that occur from the release of GHG during extraction, processing and delivery of fossil fuels"), including coal mining and oil and gas production.

110 Trade exposure allowance is an additional percentage allowance for entities exposed to international competition, including those in the petroleum refining, iron and steel, and food processing industries.

111 Performance allowance is an additional allowance of up to a certain percentage available to entities that have implemented proactive measures to reduce their GHG emissions.

112 Carbon budget allowance is an additional allowance of up to a certain percentage available to entities that comply with reporting requirements for the purpose of the carbon budgeting process.

113 Offset allowance is an additional percentage allowance, depending on the industry, for entities that buy carbon offsets to reduce their tax liability.

they exceed the tax-free emission threshold. The upfront payment approach could work well although there is no evidence that such an approach is in practice anywhere in the world at the moment.

Another challenge is the socio-economic costs associated with the implementation of carbon tax. There is concern that carbon tax will lead to socio-economic costs by adding significant costs to businesses, high prices for consumers, reducing global competitiveness, weakening profit margins and consequently, will negatively impact the economy.¹¹⁴ This concern is particularly raised within the context of the South African Carbon tax system which may not be different if carbon tax is eventually introduced in Cameroon. To overcome this challenge, legislation could make provisions that allow for the tax to be implemented at a moderate rate and in a phased approach that provide for a transitional tax period in order not to add economic costs on businesses and social costs on consumers and employees as a result of increase in the prices of products on which carbon tax are levied for generating GHGs. This approach is present in the South African carbon tax regime.¹¹⁵ The implementation of carbon tax could also place a burden on workers with fixed income especially low income earners and on investors of carbon-intensive undertakings or activities. To avail this challenge, the carbon tax design should be accompanied by a general reduction of some taxes (such as personal income taxes) to ensure that carbon tax is revenue-neutral and does not disproportionately affect consumers of products offered by the major GHG emitters.¹¹⁶ This method has been adopted and tested successfully in British Columbia in which there are personal tax reductions such as the Low Income Climate Action Tax Credit, which reduces the first two personal income tax rates by 5 percent.¹¹⁷ This way, the government is able to reduce GHG emissions while maintaining economic growth and social welfare. However, it has been noted that while ‘such tax shifts may be appropriate for high income countries with high levels of income tax, they may be less relevant – and less advisable – for developing countries with comparatively low overall tax-to-GDP ratios and low levels of income taxation.’¹¹⁸ This hypothesis has not yet been tested in less income countries where carbon tax applies. Notwithstanding the preceding argument, for this to work, revenues from carbon tax should be used to invest in alternative carbon-free or low-carbon products and services, but also to invest in climate adaptation activities as it obtains in British Columbia.¹¹⁹

In all, there are a number of caveats that should be kept in mind when designing a carbon tax in Cameroon. The government will need to determine the scope of the tax with regard to the types of GHGs to target; the choice of economic sectors and activities that the tax will cover; the possible thresholds for the application of the tax and at what point in the value chain to levy the tax for the purpose of determining emitters that will be targeted and therefore liable to pay across dozens of economic sectors; whether emissions below a certain threshold will be excluded from carbon tax; the socio-economic impacts of carbon tax; etc. Deciding on these caveats has crucial implications not only for the social and political acceptability of the tax, but also for administrative considerations and the overall effectiveness of the tax in reducing GHGs.

5. Conclusion and Recommendations

The discussion in this article supports an argument in favour of using carbon tax to regulate the emission of GHGs in Cameroon. The article argues that the design and implementation of carbon tax in Cameroon could play a pivotal role as part of the climate change mitigation solution in terms of discouraging further GHG emissions as it obtains in other countries or jurisdictions around the world. In support of the above argument, the article holds that carbon tax is one of the most cost-effective means of reducing GHG emissions, and should be a major government policy tool to tackle climate change because it can lead to a change of behaviour towards carbon neutral investments or at least towards reduced emissions of GHGs. Without a carbon tax in Cameroon, the role of

114 See National Treasury, Republic of South Africa, op. cit., p. 15.

115 Ibid., p. 10.

116 United Nations, op. cit., pp. 158 and 194.

117 Partnership for Market Readiness (PMR), op. cit., p. 120; Duff D.G., (2008), “Carbon Taxation in British Columbia”, *Vermont Journal of Environmental Law*, Vol. 10 : 1, p. 99.

118 United Nations, op. cit., p. 158.

119 Duff D.G., op. cit., p. 100.

major emitters of GHGs in the fight against climate change will continue to be ignored, thwarting efforts towards transition to a net-zero emissions economy and meeting the country's commitments in its NDC and under the Paris Agreement. Having established the centrality of carbon tax in regulating GHG emissions, the article makes an assessment of both international and national legal instruments including some environmental law principles that support the introduction and implementation of a carbon tax in Cameroon. The analysis reveals that while carbon tax is the embodiment of the polluter-pays principle and the principle of liability reflects their spirit, the opportunity offered by the tax to regulate the emission of GHGs is yet to be explored by Cameroon. The article further articulates on the prospects and challenges of introducing and implementing carbon tax in Cameroon and how such challenges may be overcome.

Against this backdrop, the article strongly recommends that Cameroon should follow the international trend on carbon tax and introduce a carbon-tax system as one of the cost-effective measures to reduce the country's GHG emissions and perhaps, raise additional government revenue. This can be done by adopting a carbon tax legal instrument designed specifically to target big GHG emitters across dozens of economic sectors in the country. This important market and fiscal policy tool should be given close consideration by policy makers in the context of fighting climate change in Cameroon.