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Improving Legal Structures and Policies to Address the Water Conflicts in the Volta River Basin: Lessons from the International Joint Commission

Ampofo-Boateng, Kwame

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Improving Legal Structures and Policies to Address the Water Conflicts in the
Volta River Basin in West Africa: Lessons from the International Joint
Commission

by

Kwame Ampofo-Boateng

A THESIS

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Abstract

The Volta River Basin (VRB) in West Africa is facing water conflicts that include water quantity, water quality, pollution, flooding, and competition for water for hydroelectric power generation and water for irrigation. The VRB's six riparian nations; Benin, Burkina Faso, Côte d'Ivoire, Ghana, Mali, and Togo, created a legal regime called the Volta Basin Authority (VBA) to address the water conflicts. However, the VBA has failed to address the water conflicts as it is plagued by deficiencies in its legal structures and policies. The International Joint Commission (IJC) on the other hand, has successfully addressed the boundary waters disputes between the United States and Canada. The IJC's success has been aided by its exercise of its Reference Jurisdiction mandate that has allowed it to use flexibility to investigate and report on questions referred to it by the governments of the United States and Canada. This thesis seeks to identify the factors that have assisted the IJC's successful use of flexibility under its Reference Jurisdiction mandate. It assesses the VBA as presently constituted and finds that it lacks an IJC-type independent fact-finding body that is equipped with flexible Reference Jurisdiction-type powers. The thesis suggests that incorporating an IJC-type structure with a flexible Reference Jurisdiction-type mandate into the VBA would assist the VBA to better address the water conflicts in the VRB. As well, the thesis recommends changes to the VBA's other legal structures and policies to assist it to better deal with the water conflicts in the VRB.

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I sincerely thank my wife, Jane, my children Kwame and Vicky, for their loving support and patient understanding for the many hours I spent away from home working on completing this thesis.

Finally, my deepest gratitude goes to Jehovah, my Lord, my Shepherd, for his little mercies and for his grace and support for all his creatures, both great and small. His reverence protects me on the troubled waters of what sometimes is an incomprehensible life.

Dedication

I dedicate this thesis in loving memory of my father, Mr. James Kwabena Ampofo-Asante.

You are with me - always.

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List of Abbreviations

| Abbreviation | Definition |
|---------------------|---|
| VRB | Volta River Basin |
| VBA | Volta Basin Authority |
| IJC | International Joint Commission |
| BWT | <i>Boundary Waters Treaty</i> |
| VBTC | Volta Basin Technical Committee |
| ECOWAS | Economic Community of West African States |
| ICJ | International Court of Justice |
| IWRM | Integrated Water Resources Management |
| IWC | International Waterways Commission |
| BC | British Columbia |
| ICPDR | International Commission for the Protection of the Danube River |
| MRC | Mekong River Commission |

Chapter 1: Introduction – Searching for a Legal Regime for the Volta River Basin

1.1 The Volta River Basin

Freshwater is a scarce natural resource in the world,¹ and there is competition for it among riparian nations² especially in international river basins.³ The competition leads to conflict⁴ that sometimes may be resolved with water treaties.⁵ This thesis concerns the Volta River Basin (VRB) (Figure 1), which is a transboundary river basin⁶ in West Africa.

¹ Arun P Elhance, “Conflict and Cooperation over Water in the Aral Sea Basin” (1997) 20 *Studies in Conflict and Terrorism* at 207 [Elhance, “Conflict and Cooperation”].

² Ludwik A Teclaff, “Fiat or Custom: The Checkered Development of International Water Law” (1991) 31 *Nat Resources J* at 67, where the author states that: [r]iparian states share common waters of a stream or rivers and are in a position of permanent physical dependence on each other (...) [so that] when a stream forms the frontier of two States (...) neither State may, on its own territory, utilize or allow the utilization of the water in such a way as to seriously interfere with its utilization by the other State or by individuals, corporations, etc., thereof (...) when a stream traverses successively the territories of two or more States (...) no establishment (...) may take so much water that the constitution, otherwise called the utilizable or essential character of the stream shall, when it reaches the territory downstream, be seriously modified.

³ Marty Rowland, “A Framework for Resolving Transboundary Water Allocation Conundrum” (2005) 5 *Ground Water* at 701.

⁴ JA (Tony) Allan & Naho Mirumachi, *Why Negotiate? Asymmetric Endowments, Asymmetric Power and the Invisible Nexus of Water Trade and Power that Brings Apparent Water Security* in Anton Earle, Anders Jägerskog & Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 22-23.

⁵ Douglas M Stinnett & Jaroslav Tir, “The Institutionalization of River Treaties” (2009) 14 *International Negotiations* at 231 [Stinnett & Tir, “The Institutionalization of River”]. See Jaroslav Tir & Douglas M Stinnett, “The Institutional Design of Riparian Treaties: The Role of River Issues” (2011) 55:4 *Journal of Conflict Resolution* at 607, where the authors note that: [e]mblematic of the trend toward increasing formal cooperation over shared water is the large number of river cooperation agreements [treaties] that have been signed in the last century. See Wendy Barnaby, “Do Nations go to War over Water?” (2009) 458 *Nature* at 282 [Barnaby], where the author notes that: [c]ountries do not go to war over water they solve their water shortages through trade and international agreements. Cooperation, in fact, is the dominant response to shared water resources. There are 263 cross-boundary waterways in the world. Between 1948 and 1999, cooperation over water, including the signing of treaties, far outweighed conflict over water and violent conflict in particular.

⁶ Carolin M Lorenz, Alison J Gilbert & Wim P Cofino, “Environmental Auditing Indicators for Transboundary River Management” (2001) 28 *Environmental Management* at 115, where the authors define a transboundary river as a river that crosses the borders of two or more states. See Molly Espey & Basman Towfique, “International Bilateral Water Treaty Formation” (2003) 40 *Water Resources Research* at 1, where the authors highlighted the international nature of transboundary river by commenting that it “flows through or forms the boundary between two or more countries.” See United Nations Convention on the Law of Non-navigational Uses of International Watercourses, 21 May 1997, 36 *ILM* 700 (1997) at art 2(b) [United Nations, “Convention”] where an international watercourse is defined as a river that flows through or forms a boundary between two or more countries. See Barnaby, *supra* note 5 at 282, where the author observes that there are approximately 263 transboundary watercourses in the world.

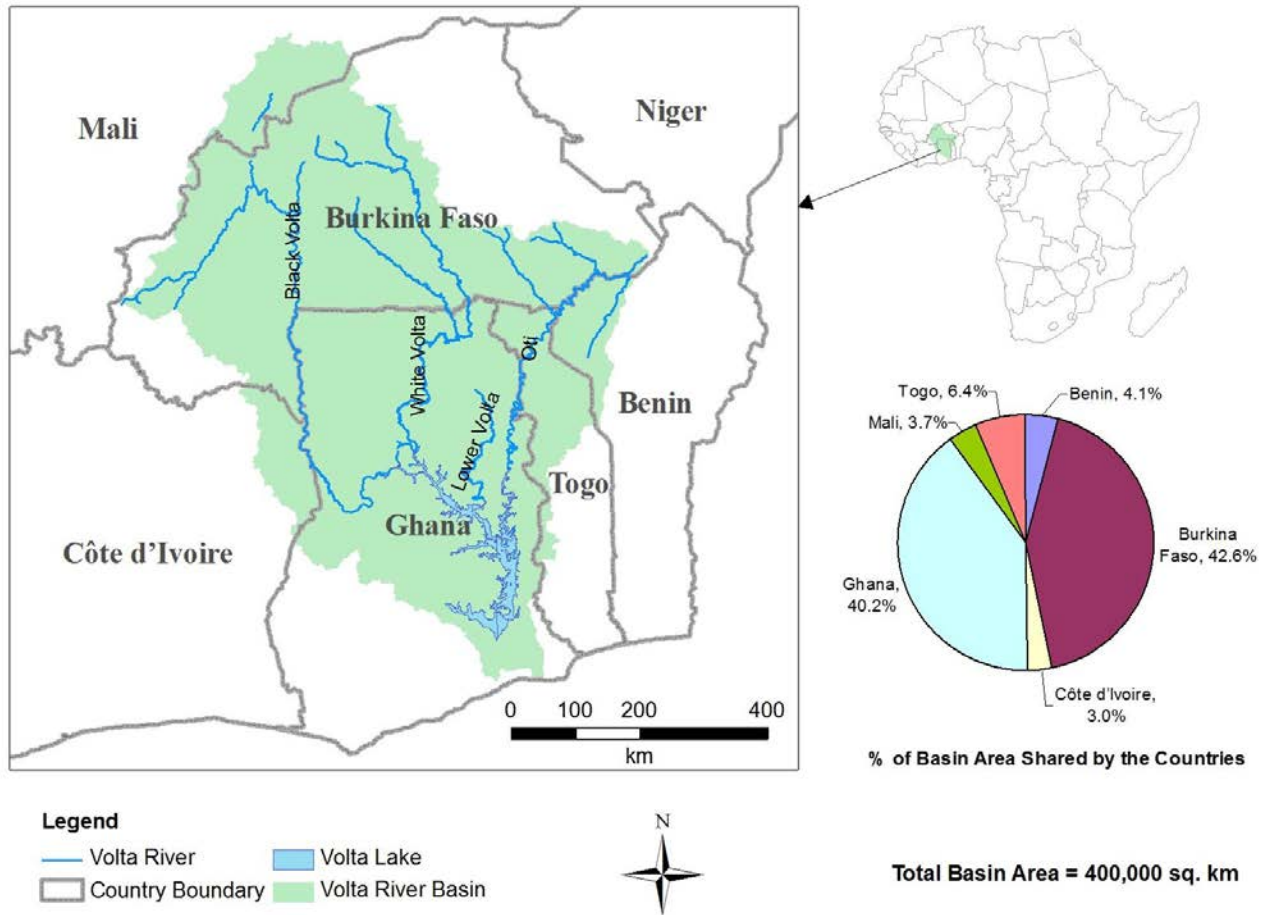


Figure 1. The Volta River Basin⁷

At the present time, the VRB is facing competition for water due to the VRB’s population which is approximately 18.6 million, and that “it is rapidly growing at a rate of approximately 2.5% per year, putting more pressure on the natural resources in the basin”⁸ especially water.⁹

⁷ Gao Yongxuan & Amy Margolies, “Transboundary Water Governance in the Volta River Basin” (2009) online: AquaPedia, Tufts University <<https://wikis.uit.tufts.edu/confluence/display/aquapedia/Transboundary+Water+Governance+in+the+Volta+River+Basin>> at 3.

⁸ *Ibid.*

⁹ C Rodgers et al, “GLOWA Volta Project: A Framework for Water Resources Decision-Making and Scientific Capacity Building in a Transnational West African Basin” (2007) 21 *Water Resources Management* at 295.

1.1.1 The Volta River Basin, its River Systems and the Significance of its Water Resources to its Riparian Nations

The VRB, covering an area 400,000 square kilometres large,¹⁰ is the ninth largest river basin in Africa, with over fifty ethnic groups.¹¹ Its major river systems are the Black Volta, the White Volta, the Lower Volta, and the Oti Rivers.¹² It “stretches from north (in Mali and Burkina Faso) to south (in Ghana), [and] it covers a distance of 1850 kilometres.”¹³ The VRB is shared by six countries.¹⁴ Ghana and Burkina Faso cover approximately 40 and 43 percent respectively of the VRB, making them the largest beneficiaries in respect of population, water use, and economic activity.¹⁵ The rest of the VRB is occupied by Togo (6.40 percent), Benin (4.10 percent), Mali (3.69 percent) and Côte d’Ivoire (2.99 percent).¹⁶ The obvious disparity in the proportion occupied by the six riparian countries cannot be overstated as it does not reflect its significance to the respective countries, as each nation’s part of the VRB makes a substantial contribution to each nation’s economic development.¹⁷ Maëlis Borghese highlights the VRB’s importance to each of the nations as follows:

The relative proportion of the basin area found within a country does not necessarily reflect the relative importance of that part of the basin in that country. While a country may only have a small percentage of the total basin within its borders, as in the case of Togo, this area might comprise a significant proportion of the

¹⁰ *Ibid.*

¹¹ Jonathan Lautze, Boubacar Barry & Eva Youkhana, *Changing Interfaces in Volta Basin Water Management: Customary, National and Transboundary* (Bonn: University of Bonn, ZEF – Working Paper Series, 2006) at 6.

¹² Gao & Margolies, *supra* note 7 at 3.

¹³ Volta Basin Authority (2008) online: GLOWA <http://www.glowa.org/eng/conference_eng/pdf_eng/VBA%20Flyer_eng.pdf> [VBA, “Flyer”] at 2.

¹⁴ Rodgers et al, *supra* note 9 at 296.

¹⁵ *Ibid* at 295.

¹⁶ Gao & Margolies, *supra* note 7 at 3.

¹⁷ B Barry et al, “Volta River Basin, Comprehensive Assessment of Water Resources in Agriculture, Comparative Assessment of Water Resources and Management” (2005) online: International Water Management Institute <http://search.yahoo.com/search;_ylt=A148w0.x7o1VIxBRqG8M0aWbvZx4?fp_ip=ca&p=Volta+River+Basin%2C+Comprehensive+Assessment+of+Water+Resources+in+Agriculture%2C+Comparative+Assessment+of+Water+Resources+and+Management&toggle=1&cop=mss&ei=UTF-8&fr=yfp-t-701> at 36-39.

entire country. Additionally, the area of the country within the basin might hold an abundance of natural resources with respect to the entire country, such as in the case of Mali, Burkina Faso, Ghana and Togo.¹⁸

1.2 The Water Conflicts in the VRB

There is competition for water in the VRB that is principally caused by water scarcity.¹⁹ The major strain on the VRB's water resources is between water for irrigation use in the northern and central areas of Burkina Faso that competes with water for hydro-electric power generation in the south of Ghana.²⁰ Ghana's major uses of water are "mainly to generate cheap hydropower to fuel industrial growth"²¹ to stimulate economic development mainly in its industrial and mining sectors,²² and for export to Togo and Benin.²³ By contrast, Burkina Faso, "one of the least urbanized countries in the world"²⁴ depends on water for irrigation for agricultural production, with approximately 90% of its population involved in the agricultural sector.²⁵ Burkina Faso's

¹⁸ Maëlis Borghese, "The Centrality of Water Regime Formation for Water Security in West Africa: An Analysis of the Volta Basin" in Hans Günter Brauch et al, ed, *Hexagon Series on Human and Environmental Security and Peace* (Berlin Heidelberg: Springer-Verlag, 2009) online: Springer Link <<http://www.springerlink.com/content/x35563r61k130476/fulltext.pdf>> at 691.

¹⁹ Gao & Margolies, *supra* note 7 at 1.

²⁰ Rodgers et al, *supra* note 9 at 295, 300, where the authors note that Ghana is but one of six riparian states sharing Volta waters. However, a significant proportion of Volta Lake inflow originates in the upstream countries of Burkina Faso and Togo. Efforts to develop water resources for hydropower production, irrigation and other purposes in these nations negatively impact storage in Volta Lake, although the impacts of climatic variability currently exceed the impacts of upstream abstraction. See Kwadwo Owusu, Peter Waylen & Youliang Qiu, "Changing rainfall inputs in the Volta basin: implications for water sharing in Ghana" (2008) 71 *GeoJournal* at 202, where the authors notes that due to the competition for water with Burkina Faso, Ghana has neither been able to meet industrial demand nor fulfill its international commitments to supply power Benin and Togo. Accusations of water withdrawals upstream in Burkina Faso, beyond Ghana's borders, causing reductions of flow in the lower basin have increased regional tensions and the potential for conflict.

²¹ Nick van de Giesen et al, "Competition for Water Resources of the Volta Basin" in *Regional Management of Water Resources*, Proceedings of a Symposium held during the Sixth IAHS Scientific Assembly (Maastricht, The Netherlands: IAHS Publication, 2001) at 201.

²² *Ibid.*

²³ A van Edig, S Engel & W Laube, "Ghana's Water Institutions in the Process of Reform: from the International to the Local Level" online: GLOWA <http://www.glowa-volta.de/fileadmin/template/Glowa/Downloads/van_edig_et_al_2003> at 33. See Owusu, Waylen & Youliang, *supra* note 20 at 202 where the authors confirm Ghana's international obligation to export energy.

²⁴ van de Giesen et al, *supra* note 21 at 202.

²⁵ *Ibid.*

“[e]conomic development depends on agriculture [as] no alternatives exist in other sectors.”²⁶

The absence of rain often greatly decreases agricultural production leading to financial losses on investments.²⁷ Therefore, Burkina Faso is compelled to rely on irrigation for sustained higher levels of agricultural production.²⁸

There are also water quality problems in the VRB that are caused by pollution²⁹ from the increased use of chemicals such as pesticides and chemical fertilizers.³⁰ Additionally, water flow problems exist due to the unregulated opening of the Bagrè Dam³¹ in Burkina Faso³² which resulted in flooding in Ghana, leading to loss of life, property and livelihoods.³³

Because of the foregoing, there are “competing claims for a limited quantity of water” and water quality issues in the VRB, which are also identified as “the most obvious reason for water-related conflict” worldwide.³⁴ It is predicted that an absence of an effective legal framework for

²⁶ Rodgers et al, *supra* note 9 at 300, where the authors highlight that “two major storage reservoirs have already been built in Burkina Faso: Bagrè (1.7 BCM live storage) on the White Volta and Kompienga (2.05 BCM). Three additional dams are planned. If the proposed hydropower dam in Bui Gorge on the Black Volta is built (6 BCM), it may further complicate efforts to maintain storage in Volta Lake in Ghana at optimal levels for hydropower production. The assertion that hydropower generation is a “non-consumptive” use of water means little when the point of generation lies downstream from competing, consumptive uses.”

²⁷ van de Giesen et al, *supra* note 21 at 202.

²⁸ *Ibid.*

²⁹ Barry et al, *supra* note 17 at 89-99.

³⁰ Green Cross International, “Transboundary Basin Sub-Projects: The Volta River Basin” online: <http://www.greencrossitalia.it/ita/acqua/wfp/pdf/greencrosswfp_volta.pdf> at 43.

³¹ Rodgers et al, *supra* note 9 at 300, where the authors note that “[t]he Bagrè Dam is one of two major storage reservoirs built in Burkina Faso: Bagrè (1.7 BCM live storage) on the White Volta and the other is the Kompienga Dam (2.05 BCM) on the Oti River.”

³² Gao & Margolies, *supra* note 7 at 11.

³³ The Globe and Mail, “48 Die of Cholera after Ghana Flooding” (Toronto, Ont.: The Global Mail, Sept 14, 1999) at S7, where it reports that in “ACCRA – Forty-eight people have died from cholera and some 9,000 others are homeless after 10 days of severe flooding in northern Ghana, relief workers said yesterday. The floods have mainly hit Builsa and Kassena Nankana districts, about 800 kilometres north of the capital. Authorities said the problem has been exacerbated by the opening of spillway outlets to relieve pressure in Burkina Faso's Bagrè dam.”

³⁴ Aaron T Wolf et al, “Managing Water Conflict and Cooperation” (2005) in Erik Assadourian, ed, *State of the World 2005 Redefining Global Security*, online: The WorldWatch Institute

managing the VRB's water resources, will worsen the conflicts over water.³⁵ Hence, the necessity for the VRB's riparian nations to have an effective legal framework for resolving and preventing conflicts.

1.3 Legal Arrangements in Place in the VRB to Address Water Conflicts

With the water conflicts in the VRB in mind, the question is: what legal arrangements, if any, are in place to address them? If such legal arrangements are in place, are they adequate in resolving the conflicts? The Volta Basin Authority (VBA) is a legal arrangement in place in the VRB but its efficacy to resolve conflicts, remains questionable due to its poor management structures.³⁶ This thesis later examines the deficiencies in the VBA, with the aim of offering suggestions for its reformation to equip it to better manage the water conflicts in the VRB.

1.3.1 The Creation of the Volta Basin Authority

The VBA was created in 2007 by the riparian states in the VRB, with a mandate to: promote consultation; implement integrated water resources management; authorize the development of infrastructure and projects with substantial impact on the water resources; and develop joint water-related projects and works.³⁷ This thesis argues that, the VBA, however, as presently constituted, suffers from a number of weaknesses that undermines its effectiveness. For example, this thesis argues that since it is not an independent body separate from the governments of the

<[http://tbw.geo.orst.edu/publications/abst_docs/wolf_sow_2005 .pdf](http://tbw.geo.orst.edu/publications/abst_docs/wolf_sow_2005.pdf)> at 81 [Wolf et al, "Managing Water Conflicts"].

³⁵ Gao & Margolies, *supra* note 7 at 6.

³⁶ *Ibid* at 7.

³⁷ Volta Basin Authority (VBA), "Mandate and Objectives" online: Volta Basin Authority <<http://abv-volta.org/>> [VBA, "Mandate"]. See VBA, "Flyer", *supra* note 13 at 2.

respective countries as it is comprised National Water Directorate representatives of the six countries in the VRB,³⁸ there can be undue governmental interference in its work. This thesis argues that if the VBA were an independent, impartial, and a non-political body,³⁹ there would be greater potential for it to be effective in managing the water resources of the VRB.

Furthermore, the thesis shows that the VBA does not have clear procedures for overseeing the “development of infrastructure and projects planned by the State Parties which (...) [could] have a substantial impact on the [VRB’s] water resources.”⁴⁰ This thesis sets out how the VBA has failed to meaningfully consult and negotiate with the riparian nations sharing the basin⁴¹ on the use of water resources in the VRB. For example, it has failed to “meet (...) with officials from Burkina Faso and Ghana [to] establish (...) mutually acceptable procedural steps for the opening of the Bagrè [Dam] floodgates” to prevent flooding in Ghana⁴² to avoid the loss of life and the destruction of property.

1.4 The Need for a Re-evaluation of Water Management in the VRB

The VBA’s creation was “a very important milestone in the development of transboundary governance in the [VRB],”⁴³ and its success was hailed as “essential to prevent potential conflicts over [the VRB’s] water resources.”⁴⁴ However, it has been noted that “having [the VBA] alone will not have a significant effect on [the VRB’s water] management” unless it is

³⁸ Gao & Margolies, *supra* note 7 at 10.

³⁹ Austen L Parrish, “Mixed Blessings: The Great Lakes Compact and Agreement, the IJC, and International Dispute Resolution” (2006) 1 Michigan St L Rev at 1307-1309 [Parrish, “Mixed Blessings”].

⁴⁰ Gao & Margolies, *supra* note 7 at 10.

⁴¹ *Ibid* at 11.

⁴² *Ibid*.

⁴³ *Ibid* at 12.

⁴⁴ *Ibid*.

equipped with appropriate mechanisms to resolve and prevent conflicts.⁴⁵ This thesis evaluates the VBA to assess how its management structures could be further strengthened to enable it to address current conflicts, avoid future conflicts, and best manage the water resources for the good of the entire VRB.

1.5 Aim of the Thesis: Addressing the Water Conflict Problem in the VRB

This thesis argues that to resolve existing and potential water conflicts in the VRB, the ability to resolve water management issues should reside in an entity that is independent of any of the particular countries in the VRB. This entity should incorporate a flexible approach in exercising its management powers. The thesis offers the International Joint Commission's (the IJC, the Commission) Reference Jurisdiction⁴⁶ functions and powers as a model to govern and address the water conflicts in the VRB. The Reference Jurisdiction is found under Article IX of the *Boundary Waters Treaty* of 1909 (the BWT), between the United States and Canada. The Reference Jurisdiction provides, *inter alia*, that:

The High Contracting Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier between the United States and the Dominion of Canada, shall be referred from time to time to the International Joint Commission for examination and report, whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred.⁴⁷

⁴⁵ *Ibid.*

⁴⁶ Throughout this thesis the Reference Jurisdiction is used synonymously with the Investigative Jurisdiction.

⁴⁷ *Treaty Between the United States and Great Britain Relating to Boundary Waters Between the United States and Canada, US-Gr Brit*, Jan 11, 1909, 36 Stat 2448 [*The Boundary Waters Treaty*, the BWT] at art IX. Article IX continues that: The International Joint Commission is authorized in each case so referred to examine into and report upon the facts and circumstances of the particular questions and matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference. Such reports of the Commission shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an

The text of Article IX shows that the IJC's Reference Jurisdiction's mandate is broad and it can cover many questions or matters of difference between the two countries, and their inhabitants. As well, Article IX may deal not only with water but also other environmental issues such as air pollution. This thesis argues that the broad mandate and the IJC's independence are the basis of the Reference Jurisdiction's appeal as a model for an adoption to resolve and prevent water conflicts in the VRB.⁴⁸

The thesis acknowledges that there are differences in the situations relating to the BWT and the VRB and this will influence the recommendations that the thesis makes for reformation of the VBA. For example, the VRB is unlike the BWT situation in that there are only a few boundary waters and a number of transboundary waters. The VRB's boundary waters involve two rivers -- the Black Volta and the River Oti. The Black Volta is boundary waters for Ghana, Côte d'Ivoire

arbitral award. The Commission shall make a joint report to both Governments in all cases in which all or a majority of the Commissioners agree, and in case of disagreement the minority may make a joint report to both Governments, or separate reports to their respective Governments. In case the Commission is evenly divided upon any question or matter referred to it for report, separate reports shall be made by the Commissioners on each side to their own Government. The thesis notes that there are other water commissions that the thesis could have chosen to serve as models for reforming the VBA. However, the thesis did not select them as models, because of their limited scope in comparison with the IJC's Reference Jurisdiction. See, Dante A Caponera, *Principles of Water Law and Administration: National and International* (Rotterdam: Netherlands: AA Balkema, 1992) at 206-207. The Central Commission on the Rhine, for example, was established by the Congress of Vienna, in June 9, 1815, but its scope was limited to the supervision of navigation of the Rhine. See, Aaron T Wolf & Joshua T Newton, "The Danube River Basin: Joint Responsibility for River Basin Management" in Anton Earle, Anders Jägerskog and Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 206-208 [Wolf & Newton, "The Danube River Basin"]. The Danube River is one of the largest rivers in Europe and it is managed by the International Commission for the Protection of the Danube River (ICPDR). The major focus of ICPDR's activities is the regulation of navigation of the Danube River. See, Aaron T Wolf & Joshua T Newton, "The Mekong River Commission" in Anton Earle, Anders Jägerskog and Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 212-214 [Wolf & Newton, "The Mekong River Commission"]. The Mekong River runs through China, Myanmar, Thailand, Laos, Cambodia and Vietnam. The riparians of the Lower Mekong, Thailand, Laos, Cambodia and Vietnam, established the Mekong River Commission (MRC) as a transboundary water organization for the sustainable development of the Mekong River Basin. However, MRC's effectiveness as a water commission is in doubt as the China and Myanmar the upstream riparians are not members. As a result, upstream development by China in particular may impact on the proposals of the downstream countries and would diminish the efficacy of the MRC.

⁴⁸ The VRB conflict involves multiple issues of water scarcity because of competing irrigation and hydropower, water quality and quantity issues, and flooding, and would require a flexible legal regime to manage and resolve them.

and Burkina Faso. The River Oti is boundary waters for Ghana and Togo, and it is also boundary waters for Togo and Benin, and it is also boundary waters for Burkina Faso and Benin. The transboundary waters involve three rivers; the White Volta, the Black Volta and the River Oti. The White Volta is transboundary waters between Ghana and Burkina Faso. The Black Volta is transboundary waters between Ghana and Burkina Faso. Additionally, the Black Volta is transboundary waters between Burkina Faso and Mali. The Oti River is transboundary waters between Togo and Burkina Faso, and it is also transboundary waters between Benin and Burkina Faso. With this mix of the VRB's boundary and transboundary waters, there can be issues that would seem only to concern two nations, whereas others would concern the entire basin. To this end, the thesis acknowledges that many issues are different between the BWT situation -- two countries, numerous watersheds, and treaty mainly covers boundary waters -- (except for water quality and transboundary waters), and the VRB situation -- six countries, one large watershed, and situation where some issues may be more relevant to some countries more than others. As such, any lessons that the thesis proposes from the IJC's exercise of its Reference Jurisdiction powers to address the water conflicts in the VRB, will take these differences into account. As well, the thesis notes that as the VRB is one large watershed with a mixture of boundary and transboundary waters, the recommendations for the VRB will include issues of watershed management. With this in mind, the thesis aims to create a path to address the water conflicts in the VRB by examining other weaknesses in the current VRB management framework. The thesis offers recommendations for legal and policy change to address the weaknesses. These include:

- clarifying the ability of the VBA to actively carry out effective management of the VRB with respect to decision making processes and the requirement to take action

- incorporating rules and procedures, based on the IJC Rules and Procedures to facilitate effective assessment and approval of water-based projects
- facilitating the sharing of data on use of water resources among the VRB riparian nations
- incorporating an independent body with effective regulatory powers
- enabling and facilitating effective public and shareholder participation
- the policies and tools the thesis offers also include issues pertaining to watershed management as the VRB comprises a single river basin.

1.6 Theoretical Perspective

The thesis applies the theory of flexibility as it relates to the legal governance of international watercourses. The flexibility theory is one of the offshoots of the resilience theory.⁴⁹ The thesis analyzes the efficacy of a flexible Reference Jurisdiction in resolving boundary waters conflicts, and its eventual application to the VRB. Flexibility “refers to the capacity of a regime to be adaptable to changing circumstances including changes in substantive problem(s) and in the

⁴⁹ Barbara A Cosens, “Transboundary River Governance in the Face of Uncertainty: Resilience Theory and the Columbia River Treaty” (2010) 30 J Land Resources & Envtl L at 230-233, where the author explains “[r]esilience as applied to ecological systems addresses the ability of the system to continue to provide, or return to a state in which it will provide, a full range of ecosystem services in the face of change. When applied to the coupled human ecological system (i.e. a social-ecological system), it provides an umbrella theory for integration of concepts of natural resource management with ecological response to achieve sustainability. Achieving the goal of sustainability in a river basin is complicated by uncertainty in the drivers of change and the fragmentation of jurisdictions. Research to translate resilience theory into specific administrative actions may provide a road map to improving our ability to foster sustainability in our response to change in transboundary river basins.” See also Brian Walker et al, “Resilience, Adaptability and Transformability in Social-Ecological Systems” (2004) 9 (2) Ecology and Society online: <<http://www.ecologyandsociety.org/vol9/iss2/art5>> where the authors define “[r]esilience is the capacity of a system to absorb disturbance and reorganize while undergoing change so as to still retain essentially the same function, structure, identity, and feedbacks”. See Sandra B Zellmer & John M Anderies, “Wilderness Preserves: Still Relevant and Resilient after all these Years” (2011) online: Social Science Research Network <<http://papers.ssrn.com/sol3/results.cfm?RequestTimeout=50000000>> at 10 who comment that “scientists have begun to emphasize resilience—the capacity of an ecosystem to tolerate and adapt to disturbances without collapsing into a qualitatively different state—as a replacement for our present stationarity-based approaches that assume that natural systems fluctuate in a predictable way and that strive to keep ecosystems within the historic range of variability.”

interests of the parties involved.”⁵⁰ This is important as a “lack of adaptive capacity is bound to impair performance.”⁵¹ Flexibility’s importance emerges when there are “sudden changes in the physical environment, [and] when existing institutions are not sufficiently resilient and flexible to deal with that change.”⁵²

Thomas Dietz, Elinor Ostrom & Paul C. Stern emphasise the importance of flexibility of water institutions as follows:

Water [i]nstitutions must be designed to allow for adaptation because some current understanding is likely to be wrong, the required scale of organization can shift, and biophysical and social systems change. Fixed rules are likely to fail because they place too much confidence in the current state of knowledge, whereas systems that guard against the low probability, high consequence possibilities and allow for change may be suboptimal in the short run but prove wiser in the long run.⁵³

Stefan Lindemann adds that:

Flexible regimes include institutional mechanisms that allow adapting to changes in the problem structure. A lack of flexibility is likely to lead to reduced regime effectiveness since the existing problem solving strategy may prove inadequate to cope with changing circumstances.⁵⁴

According to Thomas Bernauer, flexibility is important in international river management as it helps with adapting to “new scientific evidence, new management problems, and changing

⁵⁰ Frank Marty, *Managing International Rivers: Problems, Politics and Institutions* (Bern: Peter Lang AG, European Academic Publishers, 2001) at 47.

⁵¹ *Ibid.*

⁵² Mark F Giordano, Meredith A Giordano & Aaron T Wolf, “International Resource Conflict and Mitigation” (2005) 42:1 *J of Peace Research* at 57.

⁵³ Thomas Dietz, Elinor Ostrom & Paul C Stern, “The Struggle to Govern the Commons” (2003) 302 *Science* 1907 at 1909.

⁵⁴ Stefan Lindemann, “Explaining Success and Failure International River Basin Management—Lessons from Southern Africa” in the Proceedings 6th *Open Meeting of the Human Dimensions of Global Environmental Change Research Community Global Environmental Change, Globalization and International Security: New Challenges for the 21st Century* (Germany: University of Bonn, 2005) at 7.

interests of riparian countries.”⁵⁵ Another important aspect of flexibility is its potential role in dispute resolution in international watercourses. For example, Article 33 of the *United Nations Convention on the Law of Non-navigational Uses of International Watercourses* (the Convention) provides an illustration of the use of flexibility in the context of the availability of the different methods for dispute resolution in international watercourses⁵⁶ According to Stephen

⁵⁵ Thomas Bernauer, “Explaining the Success and Failure in International River Management” (2002) 64 *Aquatic Sciences* at 16.

⁵⁶ United Nations, “Convention”, *supra* note 6 at art 33, which provides under its Settlement of Disputes that:

1. In the event of a dispute between two or more Parties concerning the interpretation or application of the present Convention, the Parties concerned shall, in the absence of an applicable-agreement between them, seek a settlement of the dispute by peaceful means in accordance with the following provisions.

2. If the Parties concerned cannot reach agreement by negotiation requested by one of them, they may jointly seek the good offices of, or request mediation or conciliation by, a third party, or make use, as appropriate, of any joint watercourse institutions that may have been established by them or agree to submit the dispute to arbitration or to the International Court of Justice.

3. Subject to the operation of paragraph 10, if after six months from the time of the request for negotiations referred to in paragraph 2, the Parties concerned have not been able to settle their dispute through negotiation or any other means referred to in paragraph 2, the dispute shall be submitted, at the request of any of the parties to the dispute, to impartial fact-finding in accordance with paragraphs 4 to 9, unless the Parties otherwise agree.

4. A Fact-finding Commission shall be established, composed of one member nominated by each Party concerned and in addition a member not having the nationality of any of the Parties concerned chosen by the nominated members who shall serve as Chairman.

5. If the members nominated by the Parties are unable to agree on a Chairman within three months of the request for the establishment of the Commission, any Party concerned may request the Secretary-General of the United Nations to appoint the Chairman who shall not have the nationality of any of the parties to the dispute or of any riparian State of the watercourse concerned. If one of the Parties fails to nominate a member within three months of the initial request pursuant to paragraph 3, any other Party concerned may request the Secretary-General of the United Nations to appoint a person who shall not have the nationality of any of the parties to the dispute or of any riparian State of the watercourse concerned. The person so appointed shall constitute a single member Commission.

6. The Commission shall determine its own procedure.

7. The Parties concerned have the obligation to provide the Commission with such information as it may require and, on request, to permit the Commission to have access to their respective territory and to inspect any facilities, plant, equipment, construction or natural feature relevant for the purpose of its inquiry.

8. The Commission shall-adopt its report by a majority vote, unless it is a single-member Commission, and shall submit that report to the Parties concerned setting forth its findings and the reasons therefor and such recommendations as it deems appropriate for an equitable solution of the dispute, which the Parties concerned shall consider in good faith.

9. The expenses of the Commission shall be borne equally by the Parties concerned.

10. When ratifying, accepting, approving or acceding to the present Convention, or at any time thereafter, a Party which is not a regional economic integration organization may declare in a written instrument submitted to the Depositary that, in respect of any dispute not resolved in accordance with paragraph 2, it recognizes as compulsory ipso facto and without special agreement in relation to any Party accepting the same obligation:

(a) Submission of the dispute to the International Court of Justice;

and/or,

(b) Arbitration by an arbitral tribunal established and operating, unless the parties to the dispute otherwise agreed, in accordance with the procedure laid down in the annex to the present Convention.

A Party which is a regional economic integration organization may make a declaration with like effect in relation to arbitration in accordance with subparagraph (b). See Patricia Wouters, “The Legal Response to International Water

C. McCaffrey, Article 33 of the Convention provides for the potential dispute resolution through various dispute resolution mechanisms, where the parties cannot arrive at an agreement by negotiation.⁵⁷ Surya P. Subedi concurs with this and remarks that Article 33 of the Convention puts more emphasis on diplomatic means of settling disputes, rather than on their adjudication.⁵⁸ This is done first, by negotiation and then by good offices, mediation and conciliation through the involvement of a third party.⁵⁹ Second, it involves using “any joint watercourse institutions that may have been established by the [Parties],” and third, it involves the submission of “the dispute to arbitration or to the International Court of Justice.”⁶⁰ Hence, Article 33 also recognizes the importance of joint water course institutions in settling conflicts. The nations that create a joint water institution, also decide its level of independence.

Alena Drieschovaa, Mark Giordanoa, & Itay Fischhendler also view “flexibility and enforceability in rules regulating transboundary waters” as important “positive attributes for

Scarcity and Water Conflicts: The UN Watercourses Convention and Beyond” (1999) online: <https://discovery.dundee.ac.uk/bitstream/handle/10588/595/The%20Legal%20Response%20to%20International%20Water%20Conflicts_Post%20Print.pdf?sequence=1> at 1, where the author notes that [t]he United Nations Watercourses Convention, adopted in May 1997, and ratified to date by [as of May 2012, by 25] Parties [and an additional 5 nations that had signed but not yet ratified the treaty while it requires thirty five ratifications in order to come into force], is a global framework agreement with the goal to ensure the utilisation, development, conservation, management and protection of international watercourses and the promotion of their optimal and sustainable utilisation for present and future generations. In line with this, the Convention requires that an international watercourse shall be used and developed by watercourse States with a view to attaining optimal and sustainable utilisation thereof and benefits there from, taking into account the interests of the watercourse States concerned, consistent with adequate protection of the watercourse.

⁵⁷ Stephen C McCaffrey, “Water Disputes Defined: Characteristics and Trends for Resolving Them” in Seminar Papers on *Resolution of International Water Disputes* (The Netherlands: Kluwer Law International, 2003) at 107 online: <<http://ucalgary.summon.serialssolutions.com/search?s.q=Stephen+C+McCaffrey%2C+%E2%80%9CWater+Disputes+Defined+Characteristics+and+Trends+for+Resolving+Them%E2%80%9D+>>>. See United Nations, “Convention” *supra* note 6 at art 33, for details of the various dispute resolution mechanisms.

⁵⁸ Surya P Subedi, “Resolution of International Water Disputes: Challenges for the 21st Century” in Seminar Papers on *Resolution of International Water Disputes* (The Netherlands: Kluwer Law International, 2003) online: <<http://ucalgary.summon.serialssolutions.com/search?s.q=Stephen+C+McCaffrey%2C+%E2%80%9CWater+Disputes+Defined+Characteristics+and+Trends+for+Resolving+Them%E2%80%9D+>>> at 34.

⁵⁹ *Ibid.*

⁶⁰ United Nations, “Convention”, *supra* note 6 at art 33.

governing shared water resources.”⁶¹ However, they contend that flexibility can be problematic as it “can reduce the certainty around the actual flows of water parties will receive from an agreement.”⁶² But, they also show support of flexibility as follows:

Flexibility in treaties does not necessarily prove a lack of commitment to the treaty regime, but can actually be a measure undertaken in order to allow sufficient scope for action in the event of an unpredictable change of circumstances.⁶³

Gabriel Eckstein, points out that “joint water management organizations [such as the IJC] require a flexible mandate that allows them to adapt their operations, planning, and implementation activities to changing conditions.”⁶⁴ This will permit “[water] institutions to adapt their mechanisms, activities, and policies in response to changes on the ground.”⁶⁵ Clearly, “for [water] institutions to be effective in the long run, (...) they must be able to adapt not only to variations in the resources themselves, but also to the changing knowledge base and social systems of the resource users.”⁶⁶

1.7 Research Methodology

The thesis adopts a doctrinal research methodology. Doctrinal research involves a detailed analysis of existing legal doctrine, literature, statutes and cases.⁶⁷ The start of doctrinal research involves an assessment of the “existing or proposed legislation and the decisions by the highest

⁶¹ Alena Drieschovaa, Mark Giordano & Itay Fischhendler, “Governance Mechanisms to Address Flow Variability in Water Treaties” (2009) 18 *Global Environmental Change* at 293.

⁶² *Ibid.*

⁶³ *Ibid* at 292.

⁶⁴ Gabriel Eckstein, “Water Scarcity, Conflict, and Security in a Climate Change World: Challenges and Opportunities for International Law and Policy” (2009) 27: 3 *Wisconsin International Law Journal* at 447.

⁶⁵ *Ibid* at 448.

⁶⁶ Giordano, Giordano & Wolf, *supra* note 52 at 58.

⁶⁷ Sanne Taekema, “Relative Autonomy: A Characterisation of the Discipline of Law” (2010) online: Social Science Research Network <http://papers.ssrn.com/soL3/papers.cfm?abstract_id=1579992> at 1-19.

courts, which form the core of the positive law.”⁶⁸ Scholars “reconstruct the legal doctrine contained in these rules,”⁶⁹ by systematizing them “into a coherent whole and evaluate trends in legislation and adjudication in terms of the doctrine they have reconstructed.”⁷⁰ Since the legal materials might not be well organized, it requires the use of standards of “coherence, legal certainty and the rule of law” to evaluate them.⁷¹ The thesis uses doctrinal research methodology to examine the legal framework for managing water in the VRB, by evaluating its strengths and weaknesses to discover how it might benefit from a reformation. Doctrinal research is also used to assess the literature on the IJC’s use of its Reference Jurisdiction to identify the factors underling its successful management of boundary waters between the United States and Canada. The factors will be used to evaluate the VBA to identify areas that require reformation.

1.8 Thesis Structure

The thesis is divided into five chapters. Chapter one sets the background and the context of the research problem for the thesis.

Chapter two further describes the VBA – the nations that created it, the reasons behind its creation, its mandate, and how it exercises its mandate. Additionally, it examines whether the VBA, as presently constituted, is able to resolve the water conflict in the VRB. The chapter points out a number of weaknesses in the current constitution of the VBA that make it difficult for the VBA to effectively manage water in the VRB and to actively resolve water conflicts. One of the weaknesses is that the VBA presently lacks an IJC-type structure with a Reference-

⁶⁸ *Ibid.*

⁶⁹ *Ibid.*

⁷⁰ *Ibid.*

⁷¹ *Ibid* at 10.

Jurisdiction-type mandate. The chapter discusses whether the VBA's management structure could be strengthened with an IJC-type structure and Reference Jurisdiction-type powers to assist it to better manage the water resources of the VRB to the benefit of its riparian nations.

Chapter three focuses on the IJC's Reference Jurisdiction as the mechanism needed to strengthen the VBA. It does this by explaining its mandate and how it investigates references and makes recommendations. Flexibility is examined as a key factor that helps the IJC's use of the Reference Jurisdiction. Additionally, it examines which factors have aided the IJC's use of flexibility.

Chapter four sets out numerous recommendations for the reformation of the VBA including the incorporation of an IJC-type structure with a Reference Jurisdiction-type mechanism in order to better manage the water resources in the VRB to prevent and resolve conflicts.

Chapter five provides a summary and conclusion for the thesis.

Chapter 2: The VBA – Its Origins, Statutes, Strengths and Its Weaknesses

2.1 Introduction: The Origins of the VBA

Chapter two examines the VBA, the nations that created it, the reasons behind its creation, its mandate, how it exercises its mandate, and whether or not it fulfills its mandate. It aims to identify the VBA's weaknesses and how best to address them to allow it to better carry out its mandate. The discussions between Ghana and Burkina Faso to create a formal legal arrangement to manage the water resources in the VRB gained momentum in April 2004, when the Ministers responsible for their water resources, signed the *Ghana-Burkina Joint Declaration*, which accepted Ghana and Burkina Faso's common water and environmental issues.⁷² Ghana and Burkina Faso also made a commitment to collaborate on the management of their shared water resources through the auspices of the Volta Basin Technical Committee (VBTC).⁷³ The VBTC involved all the six riparian countries -- Benin, Burkina Faso, Côte d'Ivoire, Ghana, Mali, and Togo -- in the VRB.⁷⁴ Next, a meeting for all the representatives of the VRB's six riparian countries convened in Ouagadougou, Burkina Faso, in July 2004.⁷⁵ During the meeting, they developed and accepted a mandate for the VBTC, and also acknowledged the need for the creation of a transboundary water management institution, and set a timeline for its creation.⁷⁶

⁷² Yaw Opoku-Ankomah et al, "Hydro-Political Assessment of Water Governance from Top Down and Review of Literature on Local Level Institutions and Practices in the Volta River Basin" (2006) International Water Management Institute, Working Paper 111 online: GOOGLE BOOKS <http://books.google.ca/books?id=_M_K9J4ITwIC&printsec=frontcover&source=gbs_ge_summary_r&cad=0#v=onepage&q&f=false> at 19.

⁷³ The VBTC members were appointed by the VRB's riparian countries, and while the literature does not specify whether or not they were scientists or career politicians, it could be assumed that they were all affiliated with the Ministries of Water Resources in their respective countries. It is also likely that they were lawyers as they were appointed to prepare for the creation of the VBA, which is a legal entity.

⁷⁴ Opoku-Ankomah et al, *supra* note 72 at 19.

⁷⁵ *Ibid.*

⁷⁶ *Ibid.*

The VBTC's mandate was to "prepare for the establishment of a Volta Basin organization."⁷⁷ The VBTC's work resulted in the signing of a "Memorandum of Understanding to establish a [VBA]" among the Ministers responsible for water for Benin, Burkina Faso, Côte d'Ivoire, Ghana, Mali, and Togo in December 2005, in Ouagadougou, Burkina Faso.⁷⁸ Subsequently, the Ministers met in July 2006, in Lome, Togo, to approve a *Convention*⁷⁹ and *Statutes*⁸⁰ for the VBA, with its headquarters in Ouagadougou, Burkina Faso.⁸¹ The Ministers appointed an Interim Executive Directorate to run the VBA.⁸² In January 2007, the *VBA Convention* (see Appendix I for a copy of the *VBA Convention*) was signed in Ouagadougou, Burkina Faso, during the first Assembly of the Heads of State of the six riparian countries in the VRB.⁸³ This was followed by the first meeting of the Council of Ministers -- who are Ministers in charge of water resources in the six riparian nations in the VRB -- in November 2007, during which the *VBA Statutes* was signed⁸⁴ and it entered into force on the same day⁸⁵ (see Appendix II for a copy of the *VBA Statutes*). The foregoing shows that the VBA had its origins in the creation of the VBTC.⁸⁶

⁷⁷ Volta Basin Authority (VBA),"Review" online: Volta Basin Authority <<http://www.abv-volta.org>>. [VBA, "Review"].

⁷⁸ Opoku-Ankomah et al, *supra* note 72 at 19.

⁷⁹ Convention as used here means a treaty signed by the VRBs riparian nations to manage their shared water resources. The thesis later will provide additional clarifications regarding the specific nature of the *VBA Convention*.

⁸⁰ "Statutes" means the mandate signed by the Ministers in charge of water resources or their representatives in the VRB riparian nations on 16 November 2007, in Ouagadougou in Burkina Faso. The mandate that they signed was titled "*Statutes of the Volta Basin Authority (VBA)*." The mandate aimed to regulate the VRBs riparian nations' shared water resources. Statute as used here differs from the conventional meaning of statute which is an Act of Legislature. While, the VRBs' six riparian nations gave the mandate to the Ministers, the "Statutes" the Ministers signed, was not an Act of Legislature. An Act of Legislature is a law passed by a Parliament of a sovereign nation.

⁸¹ VBA, "Review", *supra* note 77.

⁸² *Ibid.*

⁸³ *Ibid.*

⁸⁴ Volta Basin Authority, "*VBA-statutes-en-version*" online: Volta Basin Authority <<http://abv-volta.org>> at art 15 [VBA Statutes].

⁸⁵ *Ibid* at art 15. Article 15 provides that the *VBA Statutes* shall enter into force as of the date signed by all members of the Council.

⁸⁶ VBA, "Review", *supra* note 77.

2.1.1 The State Parties Signing of the VBA Statutes and the Ratification of the VBA Convention

As mentioned earlier, the Council of Ministers signed the *VBA Statutes* in November 2007. Article 18 of the *VBA Convention* provides that it “shall be ratified by the Parties [the VRB’s riparian countries] in conformity with their constitutional rules and procedures.”⁸⁷ The *VBA Convention* came into force on August 2009. The VRB’s riparian countries ratified the *VBA Convention* as follows: Burkina Faso, on October 30, 2007, in Ouagadougou; Mali on April 24, 2008, in Bamako; Togo on April 30, 2009, in Lome; Ghana on November 5, 2008, in Accra; and Benin on June 2009, in Porto Novo.⁸⁸ This leaves the Côte d'Ivoire as the only country yet to ratify the *VBA Convention*, and this is mainly due to the civil war that has crippled the country.

2.1.2 The Relationship between the VBA Statutes and the VBA Convention

The *VBA Statutes* and the *VBA Convention* are international treaties entered into by the VRB’s riparian nations to govern their common water resources.

2.1.2.1 The VBA Statutes

The *VBA Statutes* provides for the establishment of the VBA, its rules, procedures, and the operation of its major organs. Additionally, the *VBA Statutes* explains, *inter alia*, the VBA’s objectives, the nature of its legal authority, the functions of its organs, and its use of national focal bodies to coordinate the activities of the VBA at the national level (see Appendix II for a

⁸⁷ Volta River Basin, “*VBA Convention-en-version*” online: Volta Basin Authority < <http://abv-volta.org/> > [*VBA Convention*] at art 18.

⁸⁸ VBA, “Review”, *supra* note 77.

copy of the *VBA Statutes*). The thesis later will explain the major provisions of the *VBA Statutes* and whether they are effective mechanisms to manage and address the VRB's water conflicts.

2.1.2.2 The *VBA Convention*

The *VBA Convention* on the other hand, provides further explanation of the functions of the VBA. It does this by first, relating the VBA to other analogous international treaties and organizations in its preamble (see Appendix I for a copy of the *VBA Convention*). Article 3 of the *VBA Convention* provides that the VBA was created to foster international cooperation to achieve sustainable management of the water resources in the VRB.⁸⁹ Article 4 provides the principles to aid the sustainable development of the water resources in the VRB and they include: the need for an equitable and reasonable utilization of the VRB's water resources; an obligation to cooperate among the VRB's riparian nations in using the VRB's water resources; the regular exchange of information among the State Parties; the State Parties' notification, negotiation and consultation of planned activities that can have negative effects on the water resources in the VRB; the need for the State Parties to exercise precaution in the use of VRB's water resources; the need for the protection of ecosystems; the need to notify State Parties in the VRB of emergency situations; and the freedom of navigation in the VRB.⁹⁰

Article 6 of the *VBA Convention* covers the mandate and jurisdiction of the VBA⁹¹ and it provides that the VBA is to: promote permanent consultation among the State Parties for the development of the VRB; to promote the implementation of Integrated Water Resources

⁸⁹ *VBA Convention, supra* note 87 at art 3.

⁹⁰ *Ibid* at art 4.

⁹¹ *Ibid* at art 6.

Management (IWRM) and the equitable distribution of benefits resulting from it; to authorize the development of infrastructure projects planned by the stakeholders and which could have a substantial impact on the water resources in the VRB; to develop joint projects; and to promote sustainable development. The *VBA Convention* can be amended by two-thirds majority of the State Parties,⁹² and disputes arising from the *VBA Convention* can be resolved through the auspices of the Economic Community of West African States (ECOWAS), the African Union and thereafter to the International Court of Justice (ICJ).⁹³

2.1.2.3 The Relationship between the *VBA Convention* and the *VBA Statutes*

The objectives of the VBA, as provided under the Article 6 of the *VBA Convention*, cover some of the objectives of the VBA as provided under Article 2 of the *VBA Statutes*⁹⁴ which the thesis later will examine in detail. As well, Article 9 of the *VBA Convention* provides that “[t]he Council of Ministers shall define in the Statutes of the Authority [the *VBA Statutes*] the specific objectives and the rules relating to the operation of its organs.”⁹⁵ The cross-referencing between the *VBA Statutes* and the *VBA Convention*, and the analogous objectives of the VBA as provided under the *VBA Convention* and the *VBA Statutes* indicate that two legal documents are meant to be read jointly.

⁹² *Ibid* at art 10.

⁹³ *Ibid* at art 14.

⁹⁴ *VBA Statutes*, *supra* note 84 at art 2.

⁹⁵ *VBA Convention*, *supra* note 87 at art 9.

2.1.3 The Status of the VBA, the VBA Statutes, and the VBA Convention

The VBA has the status of an international organization as it is equipped with the privileges of an international organization⁹⁶ through its signing into law under the *VBA Statutes* and its ratification by the member states in the VRB under the *VBA Convention*. Furthermore, the *VBA Statutes* and the *VBA Convention* are treaties signed among the six riparian nations of the VRB, to manage their shared water resources.⁹⁷ The next section addresses whether there are enforcement mechanisms for the *VBA Statutes* and the *VBA Convention* and whether they are binding on the VRB's states.

2.1.4 The Effect of the VBA Convention and the VBA Statutes

The *VBA Convention* has mechanisms to address disputes among the VRB's riparian nations through Article 13(2) which provides that “[a]ny dispute arising among the Parties from the interpretation and enforcement of the [VBA] Convention shall be resolved through conciliation and mediation within the authority.”⁹⁸ If this fails, the Parties have recourse, first, to the ECOWAS or the African Union, and second, to the ICJ.⁹⁹ While the decisions of the courts of

⁹⁶ *Ibid* at art 3 (2).

⁹⁷ *Ibid* at art 21 which provides that: the *VBA Convention* shall be forwarded to the United Nations Secretariat for registration after it enters into force in conformity with Article 102 of the United Nations Charter. See the “Charter of the United Nations” online:<http://www2.spbo.unibo.it/adon/files/uncharter_en.pdf> at Chapter XVI, art 102, which provides that: 1. Every treaty and every international agreement entered into by any Member of the United Nations after the present Charter comes into force shall as soon as possible be registered with the Secretariat and published by it.

2. No party to any such treaty or international agreement which has not been registered in accordance with the provisions of paragraph I of this Article may invoke that treaty or agreement before any organ of the United Nations.

⁹⁸ *VBA Convention, ibid* at art 13 (2). However, the *VBA Convention* does not indicate the mechanisms the VBA uses for the conciliation and mediation.

⁹⁹ *Ibid* at art 13 (3). While the *VBA Convention* provides for disputes to be sent to the ECOWAS, the African Union and the International Court of Justice for conciliation and mediation, it does to explain how this should be done. Additionally, it does not specify whether the outcomes of the conciliation and mediation are binding on the VRBs riparian nations. See ECOWAS CJJ “Community Court of Justice, ECOWAS (The Economic Community of West

ECOWAS and the African Union are binding on the VRB's member states, there are presently no mechanisms to enforce the judgements of the two courts against member states.¹⁰⁰ The lack of enforcement of the courts' decisions is not good for the management of the VRB's water resources and it needs to change. Although it will not be pursued in this thesis, the VRB riparian nations could consider imposing economic sanctions on member states who fail to obey the judgements of the courts.

It follows from the foregoing that the *VBA Convention* and the *VBA Statutes* are binding by the VRB's riparian nations against each other, though enforcement mechanisms are lacking. Four things support the conclusion that they are binding; first, Article 3 of the *VBA Statutes* vests the VBA with legal authority to execute its mandate and achieve its objectives.¹⁰¹ As well, Article 3 provides the VBA with the legal status and the capacity to enter into contracts¹⁰² on behalf of the State Parties. The VBA can enter into contracts: "to acquire and dispose of goods, [either]

African States) Rules of the Community Court of Justice of the Economic Community of West African States (ECOWAS)" online: ECOWAS <http://www.aict-ctia.org/courts_subreg/ecowas/documents/ECOWASrules_of_procedure.pdf> at art 62 which provides that "the judgement of [Court] shall be binding [on the parties] from the date of delivery" of the judgement in an open court. However, it is not clear how the binding decisions are enforced. See African International Court and Tribunals "Protocol of the Court of Justice of the African Union" online: <http://www.africaunion.org/Official_documents/Treaties_%20Conventions_%20Protocols/Protocol%20to%20the%20African%20Court%20of%20Justice%20-%20Maputo.pdf> at art 37, which provides that [t]he judgments of the Court shall be binding on the parties and in respect of that particular case. But, the court does not specify how its binding decisions will be enforced.

See The International Court of Justice "Statute of the Court" online: International Court of Justice <<http://www.icj-cij.org/documents/index.php?p1=4&p2=2&p3=0>> at art 59, which provides that: [t]he decision of the Court has no binding force except between the parties and in respect of that particular case. While the decisions of the Community Court of Justice of the Economic Community of West African States (ECOWAS), and the Court of Justice of the African Union are binding on the parties, they do not specify how the judgements would be enforced against the parties. This is not a good policy that needs to change. The VRB's riparian nations could consider imposing economic sanctions on member states who fail to obey the judgements of the courts but this would not be pursued by thesis.

¹⁰⁰ *Ibid.*

¹⁰¹ *VBA Statutes*, *supra* note 84 at art 3.

¹⁰² *Ibid.*

movable [or] immovable; to receive gifts, grants, legacies and other bequests; [and] to sue and be sued.”¹⁰³

Second, Article 5 of the *VBA Statutes* provides that the decisions of the Assembly of Heads of State and Government are binding on the VBA and the member states.¹⁰⁴

Third, Article 6 (8) of the *VBA Statutes* provides that the decisions of the Council of Ministers shall be binding on all State Parties.¹⁰⁵ The Assembly of the Heads of State and Government and the Council of Ministers in charge of Water Resources in the member states of the VRB are two of the permanent organs of the VBA.¹⁰⁶ The *VBA Convention's* ratification also indicates the willingness of the Parties to be bound, by it for three reasons. First, the *VBA Convention* was ratified by State Parties in accordance with their constitutional rules and procedures.¹⁰⁷ Second,

¹⁰³ *Ibid.*

¹⁰⁴ *Ibid* at art 5.

¹⁰⁵ *Ibid* at art 6 (8).

¹⁰⁶ *Ibid* at art 4 where it provides that the main permanent organs of the VBA are; the Assembly of Heads of State Government, the Council of Ministers in Charge of Water Resources, the Forum of the Parties involved in the development of the Volta basin, the Committee of Experts, and the Executive Directorate of the Authority. The VBA is assisted by the permanent organs to work to achieve its main objectives.

¹⁰⁷ *VBA Convention, supra* note 87 at art 18. See *The Constitution of the Republic of Ghana 1992* online: Government of Ghana <http://www.judicial.gov.gh/constitution/second_schedule/home.htm> Chapter 006 at art 40 and Chapter 008 at art 75 [Ghana's Constitution]. Article 40 gives the mandate to the government of Ghana to sign international treaties. Article 40 provides that: In its dealings with other nations, the Government shall

(a) promote and protect the interests of Ghana;

(b) seek the establishment of a just and equitable international economic and social order;

(c) promote respect for international law, treaty obligations and the settlement of international disputes by peaceful means;

(d) adhere to the principles enshrined in or as the case may be, the aims and ideals of-

i) the Charter of the United Nations;

ii) the Charter of the Organisation of African Unity;

iii) the Commonwealth;

iv) the Treaty of the Economic Community of West African States; and

v) any other international organisation of which Ghana is a member. While Article 75 provides for the President to sign treaties, agreements or conventions in the name of Ghana, subject to the ratification by Parliament. Specifically, Article 75 provides that:

(1) The President may execute or cause to be executed treaties, agreements or conventions in the name of Ghana.

(2) A treaty, agreements or conventions executed by or under the authority of the President shall be subject to ratification by- (a) Act of Parliament; or (b) a resolution of Parliament supported by the votes of more than one-half

the *VBA Convention* and its ratification instruments were filed with the Government of Burkina Faso to be deposited at the VBA's headquarters in Burkina Faso's capital of Ouagadougou.¹⁰⁸ Finally, the *VBA Convention* came into force thirty days after the ratification instruments were deposited by the fourth state of the VRB.¹⁰⁹ The *VBA Statutes* came into force when it was signed by all the members of the Council of Ministers.¹¹⁰ According to Articles 11¹¹¹ and 12¹¹² of the *Vienna Convention on the Law of Treaties*, the signing of an international treaty by a representative of a State indicates the intention of the State to be bound by the Treaty. The *VBA Convention* came into force after its ratification by the State Parties.¹¹³ According to Article 14 of the *Vienna Convention on the Law of Treaties*, the State Parties' ratification of a treaty indicates their willingness to be bound by it.¹¹⁴

of all the members of Parliament. However, no information was available on the Act of the Ghanaian Parliament that ratified the *VBA Statutes* and the *VBA Convention*.

¹⁰⁸ *VBA Convention*, *ibid* at art 19.

¹⁰⁹ *Ibid* at art 20.

¹¹⁰ VBA, "Review", *supra* note 77.

¹¹¹ United Nations, "*Vienna Convention on the Law of Treaties*" (1969) online:<http://untreaty.un.org/ilc/texts/instruments/english/conventions/1_1_1969.pdf> at art 11. [United Nations, "*Vienna Convention*"]. Article 11 provides that: *Means of expressing consent to be bound by a treaty*. The consent of a State to be bound by a treaty may be expressed by signature, exchange of instruments constituting a treaty, ratification, acceptance, approval or accession, or by any other means if so agreed.

¹¹² *Ibid* at art 12. Article 12 provides that: *Consent to be bound by a treaty expressed by signature*.

1. The consent of a State to be bound by a treaty is expressed by the signature of its representative when:

(a) the treaty provides that signature shall have that effect;
(b) it is otherwise established that the negotiating States were agreed that signature should have that effect; or
(c) the intention of the State to give that effect to the signature appears from the full powers of its representative or was expressed during the negotiation.

2. For the purposes of paragraph 1:

(a) the initialling of a text constitutes a signature of the treaty when it is established that the negotiating States so agreed;
(b) the signature ad referendum of a treaty by a representative, if confirmed by his State, constitutes a full signature of the treaty.

¹¹³ VBA, "Review", *supra* note 77.

¹¹⁴ United Nations, "*Vienna Convention*", *supra* note 111 at art 14.

2.1.5 The Objectives of the VBA Statutes

The purpose of the *VBA Statutes* “is to provide for the specific objectives, rules and procedures for the operation of the organs of the “Authority” [the VBA].¹¹⁵ In addition, Article 2 of the *VBA Statutes* provides for ten objectives for the VBA.¹¹⁶ The objectives are: to consult and reinforce consultations among the riparian countries and partners interested in developing its natural resources and in particular water; to harmonize water policies in the VRB countries through IWRM; to mobilize the resources for research for sustainable development of water resources; to coordinate studies and research activities for water resources development such as irrigation, livestock, fish farming, and the preservation of aquatic ecosystems; to improve data collection and dissemination of data necessary for scientific research, planning, development and the management of the VRB’s natural resources, particularly water; to create institutional mechanisms for the efficient and sustainable management of water resources; to initiate other common interest policies for sustainable development; to promote cooperation between the VBA and similar authorities; to authorize infrastructure and projects with a substantial impact on the water of the basin; and to develop joint projects.¹¹⁷

¹¹⁵ *VBA Statutes*, *supra* note 84 at art 1.

¹¹⁶ *Ibid* at art 2.

¹¹⁷ *Ibid*.

2.1.5.1 The Significance of the VBA's Objectives

The importance of the VBA's objectives is that they deal with riparian cooperation,¹¹⁸ IWRM¹¹⁹ preservation of aquatic ecosystems,¹²⁰ and sustainable management¹²¹ all of which are important for the management of shared international watercourses¹²² as they seek to encourage riparian nations to work together in the use of their shared water resources for their mutual benefit. There is a question, however, of whether the VBA can ever achieve these important objectives in the VRB. The prognosis so far, is not encouraging, as the VBA's water management capabilities are inadequate.¹²³ This thesis later examines these inadequacies in detail. This thesis argues that the VBA as presently constituted likely will not succeed but the incorporation of an independent investigative body with a Reference Jurisdiction-type mechanism would better enable its potential success in managing the water resources in the VRB.

¹¹⁸ United Nations, "Convention", *supra* note 6 at art 8 s (1). The UN Watercourses Convention gives credence to the legal status of cooperation by defining legal cooperation in international watercourses under its General Obligation to Cooperate under its Article 8 (1) as "[w]atercourse States shall cooperate on the basis of sovereign equality, territorial equality, territorial integrity, mutual benefit and good faith in order to attain optimal utilization and adequate protection of an international watercourse." See Sergei Vinogradov, Patricia Wouters & Patricia Jones, *Transforming Potential Conflict into Cooperation Potential: The Role of International Water Law* (Paris: UNESCO, 2003) at 54, online: University of Dundee Discovery Research Portal <<https://discovery.dundee.ac.uk/bitstream/handle/10588/1121/Transforming%20Potential%20Conflict%20into%20Cooperation%20Potential%20-%20The%20Role%20of%20IWL.pdf?sequence=1>> where the authors highlight that "[c]ooperation is the necessary basis for the proper functioning of all procedural rules and mechanisms" and that "the ultimate goal of practically any international treaty is to encourage and promote cooperation between its parties".

¹¹⁹ Global Water Partnership (GWP) "What is IWRM?" online: Global Water Partnership <<http://www.gwp.org/en/The-Challenge/What-is-IWRM/>> [GWP], GWP defines Integrated Water Resources Management (IWRM) as "a process which promotes the coordinated development and management of water, land and related resources in order to maximise economic and social welfare in an equitable manner without compromising the sustainability of vital ecosystems and the environment". The concept of IWRM is based on the Dublin Principles, so called as they were adopted from the 1992 International Conference on Water and the Environment in Dublin.

The Dublin Principles include:

Principle No. 1 –Fresh water is a finite and vulnerable resource, essential to sustain life, development and the environment.

Since water sustains life, effective management of water resources demands a holistic approach, linking social and economic development with protection of natural ecosystems. Effective management links land and water uses across the whole of a catchment area or groundwater aquifer.

Principle No. 2 - Water development and management should be based on a participatory approach, involving users, planners and policy-makers at all levels.

The participatory approach involves raising awareness of the importance of water among policy-makers and the general public. It means that decisions are taken at the lowest appropriate level, with full public consultation and involvement of users in the planning and implementation of water projects.

Principle No. 3 - Women play a central part in the provision, management and safeguarding of water

This pivotal role of women as providers and users of water and guardians of the living environment has seldom been reflected in institutional arrangements for the development and management of water resources. Acceptance and implementation of this principle requires positive policies to address women's specific needs and to equip and empower women to participate at all levels in water resources programmes, including decision-making and implementation, in ways defined by them.

Principle No. 4- Water has an economic value in all its competing uses and should be recognised as an economic good. Within this principle, it is vital to recognise first the basic right of all human beings to have access to clean water and sanitation at an affordable price. Past failure to recognise the economic value of water has led to wasteful and environmentally damaging uses of the resource. Managing water as an economic good is an important way of achieving efficient and equitable use and of encouraging conservation and protection of water resources.

¹²⁰ Cate Brown & Jackie King, "Environmental Flows in Shared Watercourses: Review of Assessment Methods and Relevance in the Transboundary Setting" in Anton Earle, Anders Jägerskog & Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 108, where the authors note that "[f]reshwater ecosystems are the foundation of every country's social, cultural and economic well-being. Healthy freshwater ecosystems — rivers, lakes, floodplains, wetlands and estuaries — provide clear water, food, fibre, energy and many other benefits that support economies and livelihoods around the world. They are essential to human health and wellbeing." See the Brisbane Declaration, "World Leaders Sign Brisbane Declaration to Protect the Planet's Freshwater Systems" (2007) online: <<http://www.prweb.com/releases/2007/11/prweb566994.htm>>. It reinforces the urgent need for a global consensus to address the growing crisis of poor water management. Recent droughts across the U.S. and around the world have highlighted the tensions that can exist between allocating water for people and water for nature. But the first step to improved water management is understanding where and when water is available, and ensuring river systems have adequate water flows (known as environmental flows) to support both people and nature. Environmental flows describe the quantity, timing, and quality of water flows required to sustain freshwater and estuarine ecosystems and the human livelihoods and well-being that depend on these ecosystems". See the United Nations, "Convention", *supra* note 6 at art 20, which provides that "[w]atercourse States shall, individually and, where appropriate, jointly, protect and preserve the ecosystems of international watercourses."

¹²¹ Marwa Daoudy, "Getting Beyond the Environment – Conflict Trap: Benefit Sharing in International River Basins" in Anton Earle, Anders Jägerskog & Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 44, where the author writes that "[i]t is well established that unregulated access to common pool resources results in unsustainable use, to the final disadvantage of all." See also Garrett Hardin "Tragedy of the Commons" (1968) 162 *Science* at 1243-1248 [Hardin] where Hardin in this seminal paper, theorized about the eventual overexploitation and degradation of all resources that are used in common to draw attention to overpopulation and its eventual consequence of resource depletion. See David Feeny et al, "The Tragedy of the Commons: Twenty-Two Years Later" (1990) 18 *Human Ecology* at 1-4 [Feeny et al] where the authors espouse how Hardin's theory has been extended to cover common-property resource (CPR) management which is a class of resources for which exclusion is difficult and joint use involves subtractability -- which is the potential of reducing the resource of other users.

¹²² Anton Earle, Anders Jägerskog & Joakim Öjendal, "Introduction: Setting the Scene for Transboundary Water Management Approaches" in Anton Earle, Anders Jägerskog & Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 1-10.

¹²³ Gao & Margolies, *supra* note 7 at 9-10.

2.1.6 The Purpose and Principles of the VBA Convention

As mentioned earlier, the *VBA Convention* provides that the VBA was established to promote international cooperation and the sustainable management of the water resources in the VRB to ensure socioeconomic integration among its riparian nations.¹²⁴ The *VBA Convention* provides the principles for cooperation among the riparian nations in the VRB. The principles are a commitment to use the water resources in the VRB equitably, to cooperate in the sharing of the water resources in the VRB; to exchange information and data among the State Parties; to issue notice of planned activities that could have negative effects in the VRB; to exercise precaution and prevention in relation to the use of the water resources in the VRB; to protect and conserve the ecosystems in the VRB, to avoid activities that can cause damage in the VRB; to issue notice in emergency situations in the VRB; and to ensure freedom of navigation.¹²⁵ Overall, the principles confirm the VBA's objectives and they provide further evidence of the State Parties' willingness to cooperate in the reasonable utilization of the water resources in the VRB, while avoiding activities that could waste the water resources of the VRB.

2.2 The VBA's Structure, Powers, and Tools to carry out its Mandate

This section examines the VBA to assess whether or not it has the structure, powers, and tools to effectively carry out its mandate. The section concludes that such structure, powers, and tools do not exist in the VBA. Chapter four of this thesis discusses whether incorporating an independent investigative body that is equipped with a Reference Jurisdiction mechanism would facilitate the VBA in carrying out its mandate.

¹²⁴ *VBA Convention*, *supra* note 87 at art 3 (1).

¹²⁵ *Ibid.*

The VBA's structure, powers, and tools, are found in the provisions governing the Council of Ministers in Charge of Water Resources in the State Parties in the VRB (the Council),¹²⁶ the Forum of Stakeholders in the VRB (the Forum),¹²⁷ and the Committee of Experts (the Committee).¹²⁸ The thesis examines them in turn to identify to what extent they, working together or on their own have the ability to carry out the VBA's mandate and address the water conflicts in the VRB. Based on the results of the assessment, the thesis makes recommendations regarding how an IJC-type structure with a Reference Jurisdiction-type mandate could be incorporated into the VBA to assist it to better manage the water resources in the VRB to prevent and resolve water conflicts.

2.2.1 The Council of Ministers in Charge of Water Resources

The Council is one of the permanent organs of the VBA. Article 6 of the *VBA Statutes*, describes the Council's mandate, its composition, and its responsibilities.¹²⁹ The Council comprises

¹²⁶ *VBA Statutes*, *supra* note 84 at art 4.

¹²⁷ *Ibid.*

¹²⁸ *Ibid.*

¹²⁹ *Ibid* at art 6. Article 6 of the *VBA Statutes* provides as follows:

- (1) The Council of Ministers, hereinafter referred to as "the Council", shall be responsible for the formulation and control of the programmes and policies of the Authority in conformity with cooperation and development policies defined by the Assembly and shall supervise and monitor the activities of the Authority.
- (2) The Council shall consist of the Ministers in charge of Water Resources of the State Parties or their duly mandated representatives provided that these Ministers may be accompanied by other ministers of government.
- (3) The State Parties shall be obliged to attend meetings of the Council.
- (4) Without, prejudice to the powers of the Assembly, the Council shall exercise overall responsibility over all the organs of the Authority and shall legally represent the Authority in all matters provided that the Council may expressly delegate some of its powers to the Executive Director.
- (5) The Council shall control the activities of the Executive Directorate and shall approve the budget of the Authority and determine the financial contributions of the State Parties.
- (6) The Council shall approve the financial and employment regulations and shall employ senior staff of the Authority on the recommendations of the Executive Director, among nationals of the State Parties on the basis of competence and equitable distribution.
- (7) The Council shall examine all projects submitted to the Authority and may authorise their execution.
- (8) The decisions of the Council shall be binding on all State Parties.
- (9) The Council shall meet once a year in an ordinary session convened by its President provided that the President at the request of a State Party may convene an Extraordinary Session of the Council.

Ministers responsible for Water Resources in the State Parties or their legally appointed representatives.¹³⁰ The Council exercises responsibility over all the organs of the VBA.¹³¹ However, “the Council may expressly delegate some of its powers to the Executive Director.”¹³² The Council is responsible for all projects submitted to the VBA, and may authorise their execution.¹³³ The Council’s decision is binding on State Parties.¹³⁴ The Council’s decisions are adopted by consensus but where persistent disagreement surfaces, decisions are adopted by two-thirds majority of State Parties.¹³⁵

The Council oversees all water-related projects submitted to the VBA, by assessing them to decide whether or not to authorize them. However, while the Council has the authority to “adopt its own internal rules and procedures in the performance of its mandate,”¹³⁶ it does not specify the nature of the rules and procedures it uses to assess the viability of water-based projects submitted to it for approval. Furthermore, the VBA’s mandate does not specify whether or not

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- (10) The sessions of the Council may be held in a rotational manner among the State Parties according to the alphabetical order of the States in French.
 - (11) The meetings of the Council shall be chaired by its President and the quorum for all meetings shall be two-thirds of the State Parties.
 - (12) The decisions of the Council shall be adopted by consensus. In the event of persistent disagreement, decisions shall be adopted by two-thirds majority of State Parties.
 - (13) The tenure of office of a President shall be for one year and shall be appointed alternatively among the Ministers in charge of Water Resources of the State Parties according to the alphabetical order of the States in French.
 - (14) The President shall in between sessions of the Council represent the Council and shall take any decisions within his competence in the interest of the Authority and shall report to the Council at its next meeting.
 - (15) The President of the Council may, in the event of an emergency and in consultation with other members of the Council take appropriate measure within the jurisdiction of the Council.
 - (16) The Council in all matters shall exercise its power in accordance with the mandate assigned to the Authority.
 - (17) The Council shall report the activities of the Authority to the Assembly through its President.
 - (18) The Council shall adopt its own internal rules and procedures in the performance of its mandate.

¹³⁰ *Ibid.*

¹³¹ *Ibid.*

¹³² *Ibid.* See also at art 9, where the Executive Director, is, *inter alia*, “the head of the administration of the [VBA] and shall be responsible for the management of the assets and the staff of the [VBA] and shall have supervisory power over all the staff and activities of the [VBA].”

¹³³ *Ibid* at art 6.

¹³⁴ *Ibid.*

¹³⁵ *Ibid.*

¹³⁶ *Ibid.*

the Council has the authority to engage stakeholders in its decisions, and also whether it could constitute and use various boards of experts in research and data collection to aid the decisions regarding submitted projects.¹³⁷ Additionally, the VBA's mandate does not specify whether the Council's decisions are independent of the component governments."¹³⁸ The Council's composition also undermines its independence, since its members are all Ministers of State Parties making them part of the governments of their respective countries, further casting doubt on their ability to act independently from governmental influence and interference. However, the Council needs independence in order for it to exercise its mandate effectively. For example, the Council's lack of independence will allow the State Parties to interfere in its decision making process and render its decisions in the interest of member states rather than for the good of the management of the VRB's water resources. If the Council were an independent entity, it could carry out its mandate objectively, by relying on scientific principles to investigate conflicts to arrive at decisions without interference from the governments of the State Parties.

¹³⁷ Aaron T Wolf & Joshua T Newton, "The International Joint Commission: A Successful Treaty between Canada and the USA" in Anton Earle, Anders Jägerskog and Joakim Öjendal, eds, *Transboundary Water Management Principles and Practice* (London: Earthscan, 2010) at 198-199 [Wolf & Newton, "The International Joint Commission"]. See *The Boundary Waters Treaty*, *supra* note 47 at art XII, which specifies that: The International Joint Commission shall meet and organize at Washington promptly after the members thereof are appointed, and when organized the Commission may fix such times and places for its meetings as may be necessary, subject at all times to special call or direction by the two Governments. Each Commissioner upon the first joint meeting of the Commission after his appointment, shall, before proceeding with the work of the Commission, make and subscribe a solemn declaration in writing that he will faithfully and impartially perform the duties imposed upon him under this treaty, and such declaration shall be entered on the records of the proceedings of the Commission. The United States and Canadian sections of the Commission may each appoint a secretary, and these shall act as joint secretaries of the Commission at its joint sessions, and the Commission may employ engineers and clerical assistants from time to time as it may deem advisable. The salaries and personal expenses of the Commission and of the secretaries shall be paid by their respective Governments, and all reasonable and necessary joint expenses of the Commission, incurred by it, shall be paid in equal moieties by the High Contracting Parties. The Commission shall have power to administer oaths to witnesses, and to take evidence on oath whenever deemed necessary in any proceeding, or inquiry, or matter within its jurisdiction under this treaty, and all parties interested therein shall be given convenient opportunity to be heard, and the High Contracting Parties agree to adopt such legislation as may be appropriate and necessary to give the Commission the powers above mentioned on each side of the boundary, and to provide for the issue of subpoenas and for compelling the attendance of witnesses in proceedings before the Commission before the Commission. The Commission may adopt such rules of procedure as shall be in accordance with justice and equity, and may make such examination in person and through agents or employees as may be deemed advisable.

¹³⁸ Wolf & Newton, "The International Joint Commission", *ibid* at 199.

The Council's independence will be particularly important when it exercises one of its mandates under Article 2 (9) of the *VBA Statutes*, which involves its authorization of "the development of infrastructure and projects planned by the State Parties and which could have substantial impact of the water resources in the basin [VRB]"¹³⁹ and where the parties may want to exert pressure on the Council to get support for their vested interests.

This thesis later will argue that the VBA's decision making process could be enhanced by incorporating an IJC-type Commission that is equipped with a Reference Jurisdiction-type power, where the appointed Commissioners are independent and impartial in the way they investigate and approve projects in the VRB with transboundary implications. If the Commissioners are independent, it will allow them to exercise their mandate objectively without interference from the governments of the State Parties. If Commissioners make decisions impartially, it will be based on objective legal and scientific investigations that avoid support for their biased personal and nationalistic interests.

2.2.2 The Forum of Stakeholders

This section sets out what the Forum is, how it operates to carry out the VBA's authority, and assesses its strengths and weaknesses in helping to meet the VBA's mandate and deal with the water conflicts in the VRB. The thesis will demonstrate that the Forum is under the control of the Council, depriving it of the independence and impartiality it needs in performing its mandate. The Forum needs independence to enable it to make its contributions to the Council based on the facts and circumstances of issues been addressed by the Council, without interference from either

¹³⁹ *VBA Statutes*, *supra* note 84 at art 2 (9).

the Council or the governments of the VRB. The Forum requires impartiality to provide its input to the Council's investigations based on science and facts rather than blind support for a particular position.

This section examines the Forum's role in relation to its support of the VRB's State Parties, and also for individuals who submit projects to the VBA. This thesis aims to use the Forum's present lack of independence and impartiality, to make a case for all concerned citizens of the VRB to be offered an opportunity to make submissions during the Council's investigations into disputes in the VRB. However, this thesis points out that there is nothing wrong with the Forum's support for the State Parties, rather it argues for an opportunity for all concerned citizens in the VRB to contribute to the VBA's activities as well.

2.2.2.1 The Involvement of the Forum in the VBA's Activities

Article 7 of the *VBA Statutes* describes the involvement of the Forum in the VBA's Council's decision making processes.¹⁴⁰ The Forum's involvement is a good development as it provides

¹⁴⁰ *Ibid* at art 7. Article 7 of the *VBA Statutes* provides that:

- (1) The Forum of the stakeholders involved in the development of the Volta Basin, hereinafter referred to as "the Forum", shall be an advisory body instituted by the Council.
- (2) The Forum shall consist of:
 - (a) The representatives of various categories of water users; Civil Society involved in water resources management; and decentralized local authorities in each portion of the basin of the State Parties,
 - (b) The representatives of the National Focal Bodies,
 - (c) The representatives of neighbouring trans-boundary basin organizations,
 - (d) The representatives of research centres operating in the water and environment sector.
- (3) The Forum shall meet at least once a year at the request of its President in consultation with the President of the Council.
- (4) The Forum shall submit to the Council the opinions and proposals of stakeholders involved in the development of the basin and shall inform stakeholders on the activities and achievements of the Authority.
- (5) The Forum shall support the work of the Authority through the promotion of education and sensitization of the population of the basin on joint issues relating to integrated water resources management.
- (6) The Forum shall develop its own internal rules and procedure which shall be submitted to the Council for approval.

opportunities for some of the citizens in the VRB to be involved in the activities of the VBA. However, as mentioned earlier, the Forum lacks independence in making its contributions to the VBA.¹⁴¹ This is due to a number of reasons, first, the Forum is an advisory body that is instituted by the Council,¹⁴² meets once a year in consultation with the President of the Council,¹⁴³ and submits its internal rules and procedures to the Council for approval.¹⁴⁴ Second, the Forum is not independent of the Parties as its membership comprises governmental bodies and agencies¹⁴⁵ with the exception of representatives of various categories of water users in the VRB and civil society, making it more likely to represent the interests of the State Parties.¹⁴⁶ Third, the Forum acts as proxy for others involved in the development of the VRB, and it does not act as concerned citizens who are worried about the impact of particular projects on water resources in the VRB.¹⁴⁷

Finally, the Forum is expected as part of its mandate to present the opinions and proposals of stakeholders engaged in the development of the VRB to the Council, and also inform stakeholders about the VBA's activities and achievements. By contrast, the stakeholders' participation in the IJC's activities is as concerned citizens and not as proxy for developers or the State Parties.

¹⁴¹ *Ibid.*

¹⁴² *Ibid* at art 7 (1).

¹⁴³ *Ibid* at art 7 (3).

¹⁴⁴ *Ibid* at art 7 (6).

¹⁴⁵ *Ibid* at art 7 (2) (a) – (d).

¹⁴⁶ *Ibid* at art 7 (4)-(5).

¹⁴⁷ *Ibid* at art 7 (4).

2.2.2.2 Conclusion – the Forum

The foregoing shows that the Forum is controlled by the Council and as a result, it lacks the independence that it needs to exercise its mandate effectively. The Forum needs an independent mandate that allows it to act on its own without interference from the Council. For example, if the Forum were an independent entity, if the Council requires its input for its deliberations, the Forum would be able to provide an objective assessment of the issues and make its own contribution free of the Council's interference. This thesis later will show that there is also a need for an opportunity for the voices of the population of the VRB, affected by projects being investigated by the Council for approval, to be heard in person -- and not via the Parties - controlled Forum -- as part of the deliberations of the Council. The current situation where the Forum is an organ of the VBA, curtails its independence and impartiality to provide an objective assessment and critique of the way the Council approves development projects within the VRB. In sum, the Forum only represents the views of the governments in the VRB and there is room for the VBA to receive input from the concerned citizens of the VRB as part of its decision making processes.

2.2.3 *The Committee of Experts*

Another VBA organ is the Committee. Article 8 of the *VBA Statutes* covers the Committee.¹⁴⁸

The Committee is provided with the mandate to prepare the meetings of the Council, and also support the activities of the Executive Directorate.¹⁴⁹ The Committee like the Forum, is under the direct control of the Council, and by implication the State Parties, and does not enjoy an independent mandate. The thesis later will show that there is a need for an IJC-type body with a Reference Jurisdiction-type mandate within the VBA with an independent mandate to ensure its scientific independence without political influence and manipulation.

2.3 **The Strengths and Weaknesses of the VBA as Presently Constituted**

2.3.1 **The VBA's Strengths**

The major achievement of the VBA, to date, is probably the mere fact that all the six riparian states in the VRB, negotiated, consulted, and cooperated to sign it. Indeed, such cooperation augurs well for international river basin agreements as they contribute to the successful creation and operation of water institutions,¹⁵⁰ promotes equitable access and use of transboundary

¹⁴⁸ *Ibid* at art 8. Article 8 of the *VBA Statutes* provides that:

- (1) The Committee of Experts, hereinafter referred to as “the Committee” shall consist of two representatives each from a State party, one of whom shall at least belong to the National Focal Bodies.
- (2) The Committee shall be responsible for:
 - (a) Preparation of meetings of the Council;
 - (b) Supporting the Executive Directorate in the execution of its functions especially in its relationships with the National Focal Bodies and the other actors operating in the basin;
- (3) The Executive Director shall convene the meetings of the Committee in consultation with the President of the Council as and when necessary;
- (4) The Committee shall develop its own internal rules and procedure shall be submitted to the Council for approval.

¹⁴⁹ *Ibid* at art 9. The Executive Directorate is described, *inter alia*, as “the executive body of the [VBA] and shall enforce the decisions of the Council and report regularly on their implementation.”

¹⁵⁰ Dinar et al, *Bridges over Water: Understanding Transboundary Water Conflict, Negotiation and Cooperation* (Singapore: Mainland Press Pte Ltd, 2007) at 78-89 [Dinar et al, “Bridges over Water”].

water,¹⁵¹ serves as an important antecedent for the signing and maintenance of water treaties to resolve conflicts,¹⁵² and promotes the riparian nations to work together to avoid conflict in order to allow them to benefit from their shared watercourses.¹⁵³

2.3.2 The VBA's Weaknesses

2.3.2.1 The VBA's Inability to Deal with Water Disasters and Conflicts

As mentioned in Chapter one, a major conflict in the VRB is flooding by uncontrolled and uncoordinated opening of the Bagrè Dam in Burkina Faso and the subsequent flooding in Ghana. The worst of these floods occurred in August 2007, when there was a devastating flood, the first of its kind in over 50 years in Ghana¹⁵⁴ that was worsened “by the opening of the floodgates of the Bagrè Dam in Burkina Faso.”¹⁵⁵ The authorities in Burkina Faso failed to notify Ghana about the opening of the dam, and this left Ghana unprepared for the attendant floods that accompanied the opening, resulting in unnecessary loss of life and damage to property.¹⁵⁶ The uncoordinated Bagrè Dam floodgates’ opening, presented the VBA with an opportunity to prove to its doubters that it was ready and capable to deal with water conflict issues in the VRB.¹⁵⁷ It also provided it with “a good opportunity to test out the [its] structure and institutional capacity for

¹⁵¹ Arun P Elhance, *Hydro-Politics in the 3rd World: Conflict and Cooperation in International River Basins* (Washington DC: United States Institute of Peace, 1999) at ix [Elhance, “Hydro-Politics”].

¹⁵² Heather L Beach et al, *Transboundary Freshwater Dispute Resolution Theory, Practice and Annotated References* (New York: United Nations Press, 2000) at 47.

¹⁵³ Meredith A Giordano & Aaron T Wolf, “Sharing Waters: Post-Rio International Water Management” (2003) 27 *Nat Resources Forum* at 165.

¹⁵⁴ Gao & Margolies, *supra* note 7 at 7.

¹⁵⁵ *Ibid.*

¹⁵⁶ *Ibid.*

¹⁵⁷ *Ibid* at 11.

leadership.”¹⁵⁸ However, the VBA failed in its initial task that required its leadership to facilitate preventative measures to avoid loss of life and damage to property in Ghana.

The VBA’s inability to coordinate the opening of the dam in Burkina Faso, to avoid flooding in Ghana, is one of its major weaknesses and it has to be rectified. As well, the VBA has no direct powers to enable it to effectively coordinate the opening of dams as the *VBA Statutes* only gives the VBA powers of research, monitoring and the development of tools to manage the water resources of the VRB but not powers to take action to avoid water disasters and water conflicts. For example, Article 2 (4) of the *VBA Statutes* provides the VBA with the power “[t]o coordinate studies, research activities, and works initiated in the basin for the development of the water resources in the basin, especially those relating to (...) hydro-power production (...)”¹⁵⁹ While, Article 2 (5) provides the VBA with the power to improve tools for the collection and the dissemination of data for scientific research, planning, development and management of the VRB’s water resources.¹⁶⁰ Finally, Article 2 (6) provides the VBA with the power to develop and implement institutional mechanisms to monitor, evaluate and plan for the efficient management of the VRB’s water resources.¹⁶¹ The foregoing three provisions enable the VBA to plan to manage the water resources of the VRB but they do not require the VBA to act to prevent water disasters in the VRB. As well, the provisions do not provide the VBA with adequate powers to manage hydroelectric projects in the VRB that would include the coordination of the opening of dams to avert flooding either in Ghana or elsewhere in the VRB. The thesis will make

¹⁵⁸ *Ibid.*

¹⁵⁹ *VBA Statutes*, *supra* note 84 at art 2 (4).

¹⁶⁰ *Ibid* at art 2 (5).

¹⁶¹ *Ibid* at art 2 (6).

recommendations in Chapter four, to enable the VBA to have the powers to coordinate the opening of dams to avoid flooding in the VRB.

Resolving the flood problem should have been easy for the VBA, as it is not overly complex, and it could be addressed through a meeting with officials from Burkina Faso and Ghana to establish mutually acceptable procedural steps for the opening of the Bagrè floodgates.¹⁶² It is essential that the VBA be able to find solutions for “simpler” problems such as the Bagrè Dam situation to establish a precedent for the resolution of more complex conflicts in future.”¹⁶³ The thesis will make recommendations in Chapter four for the amendment of the *VBA Statutes* and the *VBA Convention* to require the VBA to negotiate with officials in the VRB in areas where the opening of dams has the potential to cause flooding to establish mutually acceptable opening times for dams to prevent flooding.

The VBA’s lack of effective powers to deal with water disasters is a great setback in its efforts to address the water conflicts in the VRB, as a major objective of the VBA is the improvement of the tools and networks for the collection, processing, storage and dissemination of data and information necessary for the management of the water resources in the VRB.¹⁶⁴ If the VBA’s data and information management had been operational, Ghana could have been warned of the impending floods allowing it to take measures to avert the loss of life and the destruction of property. Therefore, while the VBA’s creation “is a significant step in the process towards holistic watershed management in the Volta River Basin,”¹⁶⁵ it is plagued by this, and other

¹⁶² *Ibid.*

¹⁶³ *Ibid.*

¹⁶⁴ *Ibid* at art 2 (5).

¹⁶⁵ Gao & Margolies, *supra* note 7 at 12.

weaknesses that limit its effective role as the VRB's water management institution.¹⁶⁶ Chapter four will offer recommendations to address the weaknesses in the VBA's management of water disasters.

2.3.2.2 Faulty Stakeholder Involvement in the VBA's Management Processes

Another weakness of the VBA's management of the water resources in the VRB is its inability to galvanise the stakeholders¹⁶⁷ to take opportunity of its (VBA's) framework to create policy, plan projects, resolve water conflicts, and to create an effective system for data sharing.¹⁶⁸ As mentioned earlier, the operation of effective data sharing could have ameliorated the impact of the flooding in Ghana caused by the opening of the Bagrè Dam in Burkina Faso. Besides data sharing problems, the VBA, has so far failed to devise action plans that are necessary to address the water conflicts in the VRB. This thesis argues that the VBA should specify the type of actions it intends to take to address and manage water conflicts in the VRB. Achieving this will require the stakeholders' cooperation in data sharing together with an awareness of how their water use might impact negatively on water use in another country. The VBA together with the stakeholders' cooperation should come up with specific rules and procedures to be used to investigate and sanction water-related developments in the VRB. The thesis will make recommendations in Chapter four regarding the measures the VBA could take to facilitate investigations and approval of water-based projects in the VRB.

¹⁶⁶ *Ibid* at 9-12.

¹⁶⁷ Stakeholders as used here means the six riparian nations of the VRB and the extent to which the VBA devise plans on their behalf to successfully manage their water resources in the VRB to prevent and address conflicts.

¹⁶⁸ Gao & Margolies, *supra* note 7 at 9.

Another aspect of the faulty stakeholders involvement in the VBA's management processes relates to the composition of the VBA's organs that excludes important stakeholders¹⁶⁹ from its decision making process.¹⁷⁰ Specifically, the VBA's main decision making body, the Council, is composed of National Water Directorate representatives of the VRB's six riparian nations and does not cater for the needs of all stakeholders and particularly concerned citizens in the VRB.¹⁷¹

The VBA's exclusion of concerned citizens from its management processes could create problems for the VBA as such citizens might not support its management plans for the VRB¹⁷² that they consider to be against their interests. If this happens, the concerned citizens may resort to civil disobedience to air their grievances that could delay important water-based projects in the VRB. However, according to Gao Yongxuan & Amy Margolies, it might be impractical, even impossible to involve all concerned citizens in the VBA's decision making processes as its main organs¹⁷³ all have limited compositions and with specific membership requirements. Instead, what is needed is a VBA decision making process that allows any of the VRB's citizens with concern about a project that impacts the water resources in the VRB, to have an opportunity to present their concerns either orally or through documentary evidence. Additionally, this thesis contends that there is the need for an independent investigative and reporting body within the VBA that offers concerned citizens the opportunity to make oral and written submissions as part of its investigations into water resources management and the approval of water-based projects in the VRB.

¹⁶⁹ Stakeholders as used here imply concerned citizens in the VRB who are interested in how water-based projects impacts on the water resources in the VRB.

¹⁷⁰ Gao & Margolies, *supra* note 7 at 9.

¹⁷¹ *Ibid.*

¹⁷² *Ibid.*

¹⁷³ *Ibid.*

Chapter four will make recommendations regarding an amendment of the *VBA Statutes* and the *VBA Convention* to provide the VBA with powers not only to receive submissions from concerned citizens but also report on how it used the submissions in the VBA's decision making processes.

2.3.2.3 The VBA's Unclear Decision Making Processes

Like any interjurisdictional entity with a water management mandate, the extent to which “the VBA’s water management is successful will be defined by the characteristics of [its] decision making processes.”¹⁷⁴ Yet, the VBA’s decision making processes are unclear,¹⁷⁵ while what is needed are a clear decision making processes to spur the VBA into effective action.¹⁷⁶ The thesis argues that there is a need for the VBA to specify the rules and procedures it uses to arrive at decisions and in particular regarding projects that impact on the water resources in the VRB. The VBA needs to clarify whether or not it conducts investigations and whether such investigations are independent of interference from the governments of the VRB. Such clarification is also essential to make apparent the processes the VBA uses to fulfill one of its mandates of authorizing “the development of infrastructure and projects planned by the State Parties and which could have a substantial impact on the water resources of the basin.”¹⁷⁷ At the moment, it is unclear how the VBA does this.¹⁷⁸ This thesis argues that the VBA’s ability to prevent conflict and approve projects that prevent conflict, preserve, and not deplete the water resources in the

¹⁷⁴ *Ibid* at 10.

¹⁷⁵ *Ibid*.

¹⁷⁶ *Ibid*.

¹⁷⁷ *VBA Statutes*, *supra* note 84 at art 2 (9).

¹⁷⁸ Gao & Margolies, *supra* note 7 at 10.

VRB, will depend on how successful it performs this particular mandate. Yet, to date, “there has not been a standard procedure created to allow the VBA [to] carry out this role.”¹⁷⁹

The *status quo* needs to change in ways that allow the VBA to properly manage the VRB’s water resources. This calls for a clear specification of the rules and procedures the VBA uses in arriving at its decisions. The incorporation of such rules and procedures into the VBA’s decision making and management processes will help fill the lacuna in the processes it uses to investigate and approve projects.

This thesis will make recommendations in Chapter four for amending the *VBA Statutes* and the *VBA Convention* to create rules and procedure for the VBA to use to investigate water-related issues and make decisions.

2.3.2.4 The VBA’s Inability to Transform the *VBA Statutes* into a Workable Action to Manage the Water Resources of the VRB for the Benefit of all Riparian Countries

Another weakness of the VBA is its inability to implement its *Statutes* into an action plan to manage the water resources in the VRB for the benefit of the VRB’s riparian nations. According to Gao Yongxuan & Amy Margolies, the signed *VBA Statutes* has not been properly used to address the water conflicts in the VRB¹⁸⁰ as there is no mechanism to implement the *VBA Statutes* in a manner to deal with the real issues of water management in the VRB.¹⁸¹ As mentioned earlier, a major evidence for this failure of the VBA to apply the *VBA Statutes* was its inability to prevent and deal with the aftermath of the flooding in Ghana that was due to the

¹⁷⁹ *Ibid.*

¹⁸⁰ *Ibid* at 11.

¹⁸¹ *Ibid.*

uncoordinated opening of dam floodgates in upstream Burkina Faso.¹⁸² This thesis contends that the VBA's clarification of its decision making processes as mentioned earlier, will help to explain how it intends to apply the *VBA Statutes* to address the water conflicts in the VRB.

2.3.2.5 An Absence of an Independent Body in the VBA's Decision Making Processes

Another weakness of the VBA is an absence within its structure of an independent body comprising nationals of all VRB's riparian countries which is equipped with a mandate to investigate and report on water and environmental-related conflicts. Without such an independent body, the VBA is deprived of an entity that uses scientific evidence to investigate and make recommendations to address conflicts. Such a body should be provided with the mandate to constitute boards of independent experts as part of its investigations into conflicts so that the body's recommendations after investigations will be based on conclusions from expert investigations. Such a body's inclusion in the VBA would provide it with the ability to use scientific principles and experts to investigate and report on issues and conflicts independently without interference from the governments of the riparian nations in the VRB. Any future reformation of the VBA should incorporate such an independent investigative and reporting body. Chapter four will make recommendations regarding how such a body can be incorporated into the VBA.

¹⁸² *Ibid.*

2.4 Conclusion – the VBA’s Weaknesses

The foregoing highlighted the VBA’s weaknesses. These weaknesses need addressing to make the VBA more effective in managing the water resources in the VRB to prevent conflict and for the benefit of all the VRB’s riparian nations. The VBA needs both improvement to its existing organs, and the creation of a new structure to assist it to better carry out its mandate. The weaknesses contributed to the VBA’s failure to deal with a relatively simple problem of “flooding” in Ghana caused by the opening of dam floodgates in Burkina Faso. The failure does not augur well for the VBA's ability to deal with more complex issues of pollution, water scarcity and the ongoing tussle between water for hydroelectric power use in Ghana and water for irrigation use in Burkina Faso. A new addition to the VBA structure, is needed that not only recognises these problems but also create measures to address them.

Chapter 3: Assessing the Success of the International Joint Commission's Reference Jurisdiction

3.1 Introduction

Chapter three examines the IJC and its successful exercise of its Reference Jurisdiction mandate to identify which aspects of its mandate and rules could be incorporated into the VBA to assist it to better manage the water conflict in the VRB.

As mentioned in Chapter one, flexibility is a key factor that has helped the IJC's success in using its Reference Jurisdiction. The thesis uses the term "flexibility" in relation to the IJC as, first, the broad mandate under its Reference Jurisdiction that allows it to investigate varied boundary waters and environmental issues and make recommendations to the governments, and second, as the IJC's rules and procedures for its Reference Jurisdiction that allows it to adapt them as appropriate for particular references. This section of the thesis examines the factors that have assisted the IJC's use of flexibility to identify what makes the factors successful. The thesis examines the IJC's general mandate and rules, and the IJC's mandate under its Reference Jurisdiction before proceeding to assess the factors.

Chapter three begins with a brief outline of the *Boundary Waters Treaty* (BWT). Second, it describes the IJC, its mandate and rules. Third, it focuses on the Reference Jurisdiction and how the IJC uses it to investigate and make recommendations for references. Fourth, it examines flexibility as a main factor that assists the IJC's exercise of its Reference Jurisdiction mandate with the aim of identifying the factors that has made its use by the IJC successful. Finally, after

an examination of the VBA that concludes that it does not have an IJC-type mandate, and with flexible Reference Jurisdiction-type powers, the thesis recommends their incorporation into the VBA.

3.2 The Origins of the *Boundary Waters Treaty*

A boundary line divides the United States and Canada into two distinct and independent political entities covering an approximate distance of 3500 miles and along a stretch of 2000 miles of navigable rivers.¹⁸³ Along the boundary line, there are approximately “300 lakes, rivers, and streams [that] flow along or cross the border.”¹⁸⁴ With the two nations so closely linked by freshwater,¹⁸⁵ disputes over boundary waters are likely to occur “especially in the west where the border was drawn without regard to geographical and river basin features.”¹⁸⁶ Therefore, it came as no surprise that in 1903, as a result of concerns over the condition and uses of boundary waters, the governments of Canada and the United States established the International Waterways Commission (IWC).¹⁸⁷

The IWC aimed to resolve boundary waters disputes between the two nations.¹⁸⁸ Although, it investigated a number of issues, it failed in getting its recommendations implemented as it lacked

¹⁸³ Chirakaikaran Joseph Chacko, *The International Joint Commission between the United States of America and the Dominion of Canada* (New York: Columbia University Press, 1932) at 43.

¹⁸⁴ David G LeMarquand, “Preconditions to Cooperation in Canada-United States Boundary Waters” (1989) 26 Nat Resources J at 221.

¹⁸⁵ *Ibid.*

¹⁸⁶ Nigel Bankes, “From Devils Lake to the Columbia River: Western Water Issues” (2008) 2 Occasional Papers at 13.

¹⁸⁷ Jennifer Woodward, “International Pollution Control: The United States and Canada-The International Joint Commission” (1988) 9 NYL Sch J Int’l & Comp L at 326.

¹⁸⁸ “Origins of the Boundaries Water Treaty,” online: IJC.org <<http://bwt.ijc.org/index.php?page=origins-of-the-boundaries-water-treaty&hl=eng>> [Origins of the BWT].

enforcement powers.¹⁸⁹ The IWC's significant achievement was its recommendation to the United States and Canada governments to create a permanent body with wider powers and principles to govern the use and diversion of boundary waters.¹⁹⁰ The two nations responded with a new treaty called the *Boundary Waters Treaty*.¹⁹¹

3.2.1 *The Purpose of the Boundary Waters Treaty*

The purpose of the BWT is provided in its preamble as, *inter alia*, below:

The United States and Canada (...) being equally desirous to prevent disputes regarding the use of boundary waters and to settle all questions which are now pending between the United States and the Dominion of Canada involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along their common frontier, and to make provision for the adjustment and settlement of all such questions as may hereafter arise (...).¹⁹²

The words of the preamble “belie [the BWT’s] restrictive short title”¹⁹³ as it indicates that the treaty “envisage[s] far more than the mere settlement of disputes concerning boundary waters.”¹⁹⁴

The BWT provides the principles and mechanisms to help address and resolve water use issues, ranging from navigation, to diversions, to water quality,¹⁹⁵ and it has provided the two countries

¹⁸⁹ Chacko, *supra* note 183 at 76.

¹⁹⁰ Origins of the BWT, *supra* note 188.

¹⁹¹ *Ibid.*

¹⁹² *The Boundary Waters Treaty*, *supra* note 47 at Preamble.

¹⁹³ LM Bloomfield and Gerald F Fitzgerald, *Boundary Waters Problems of Canada and the United States (The International Joint Commission 1912-1958)* (Toronto: The Carswell Company Ltd, 1958) at 15.

¹⁹⁴ *Ibid.*

¹⁹⁵ Robert H Abrams, “The Boundary Waters Treaty of 1909 as a Model for Interjurisdictional Water Governance” (2008) 54 *Wayne LR* at 1636.

with the foundation for the settlement of their boundary waters disputes.¹⁹⁶ The BWT was initially intended to remain in force for five years, dating from the day of ratifications, and to continue until it was terminated by twelve months' written notice by either country.¹⁹⁷ However, it is still in force more than a hundred years later.¹⁹⁸ A major contributor to the BWT's success is the IJC which is its governance mechanism that it uses to resolve and prevent water disputes.¹⁹⁹

3.3 The International Joint Commission

The creation of the IJC was a tribute to the far-sightedness of the draftsmen of the BWT who, “realizing the need for a machinery to give effect to the aims of the [BWT] provided for the establishment and maintenance of the International Joint Commission.”²⁰⁰ The BWT's Article VII established the IJC.²⁰¹ The IJC held its first meeting in Washington in January 1912 and adopted its initial Rules of Procedure in February 1912.²⁰²

The IJC comprises six commissioners, three appointed by the United States and three appointed by Canada.²⁰³ The IJC has lasted for over a hundred years notwithstanding the likelihood of a deadlock due to its evenly divided voting authority.²⁰⁴ Its longevity is linked to its excellent record of research and analysis and the promotion of binational consensus.²⁰⁵ The thesis later

¹⁹⁶ Daniel K DeWitt, “Great Words Needed for the Great Lakes: Reasons to Rewrite the Boundary Waters Treaty of 1909” (1993-1994) 69 *Indiana LJ* at 299.

¹⁹⁷ *The Boundary Waters Treaty*, *supra* note 47 at art XIV.

¹⁹⁸ Wolf & Newton, “The International Joint Commission”, *supra* note 137 at 198.

¹⁹⁹ *Ibid.*

²⁰⁰ Bloomfield & Fitzgerald, *supra* note 193 at 15.

²⁰¹ *The Boundary Waters Treaty*, *supra* note 47 at art VII.

²⁰² Origins of the BWT, *supra* note 188.

²⁰³ *The Boundary Waters Treaty*, *supra* note 47 at art VII.

²⁰⁴ Abrams, *supra* note 195 at 1636.

²⁰⁵ *Ibid.*

will show that the IJC's use of its flexibility has facilitated its use of its Reference Jurisdiction mandate to investigate and make recommendations under references.

3.3.1 *The IJC's Areas of Jurisdiction*

The IJC has four major powers; administrative,²⁰⁶ quasi-judicial,²⁰⁷ arbitral²⁰⁸ and the investigative powers²⁰⁹ or the Reference Jurisdiction.²¹⁰ However, “[f]or reasons which are not

²⁰⁶ *The Boundary Waters Treaty*, *supra* note 47 at art VI. The administrative powers provides for the equal apportionment of the St. Mary and Milk Rivers. The thesis notes that the IJC's administrative powers are exercised in relation to the two rivers but is not able to say conclusively whether other administrative powers exist outside of the BWT's provision. See Article VI of the BWT. It provides that the High Contracting Parties agree that the St. Mary and Milk Rivers and their tributaries (in the State of Montana and the Provinces of Alberta and Saskatchewan) are to be treated as one stream for the purposes of irrigation and power, and the waters thereof shall be apportioned equally between the two countries, but in making such equal apportionment more than half may be taken from one river and less than half from the other by either country so as to afford a more beneficial use to each. It is further agreed that in the division of such waters during the irrigation season, between the 1st of April and 31st of October, inclusive, annually, the United States is entitled to a prior appropriation of 500 cubic feet per second of the waters of the Milk River, or so much of such amount as constitutes three-fourths of its natural flow, and that Canada is entitled to a prior appropriation of 500 cubic feet per second of the flow of St. Mary River, or so much of such amount as constitutes three-fourths of its natural flow. The channel of the Milk River in Canada may be used at the convenience of the United States for the conveyance, while passing through Canadian territory, of waters diverted from the St. Mary River. The provisions of Article II of this treaty shall apply to any injury resulting to property in Canada from the conveyance of such waters through the Milk River. The measurement and apportionment of the water to be used by each country shall from time to time be made jointly by the properly constituted reclamation officers of the United States and the properly constituted irrigation officers of His Majesty under the direction of the International Joint Commission.

²⁰⁷ *Ibid* at arts III, IV, & VIII. The quasi-judicial powers cover the applications for permission to use, divert, or obstruct boundary waters. Article III of the BWT, it provides that: It is agreed that, in addition to the uses, obstructions, and diversions heretofore permitted or hereafter provided for by special agreement between the Parties hereto, no further or other uses or obstructions or diversions, whether temporary or permanent, of boundary waters on either side of the line, affecting the natural level or flow of boundary waters on the other side of the line shall be made except by authority of the United States or the Dominion of Canada within their respective jurisdictions and with the approval, as hereinafter provided, of a joint commission, to be known as the International Joint Commission. The foregoing provisions are not intended to limit or interfere with the existing rights of the Government of the United States on the one side and the Government of the Dominion of Canada on the other, to undertake and carry on governmental works in boundary waters for the deepening of channels, the construction of breakwaters, the improvement of harbours, and other governmental works for the benefit of commerce and navigation, provided that such works are wholly on its own side of the line and do not materially affect the level or flow of the boundary waters on the other, nor are such provisions intended to interfere with the ordinary use of such waters for domestic and sanitary purposes.

See Article IV of the BWT. It provides that: The High Contracting Parties agree that, except in cases provided for by special agreement between them, they will not permit the construction or maintenance on their respective sides of the boundary of any remedial or protective works or any dams or other obstructions in waters flowing from boundary waters or in waters at a lower level than the boundary in rivers flowing across the boundary, the effect of which is to raise the natural level of waters on the other side of the boundary unless the construction or maintenance thereof is approved by the aforesaid International Joint Commission. It is further agreed that the waters herein

defined as boundary waters and waters flowing across the boundary shall not be polluted on either side to the injury of health or property on the other.

See Article VIII of the BWT, it provides that: This International Joint Commission shall have jurisdiction over and shall pass upon all cases involving the use or obstruction or diversion of the waters with respect to which under Article III or IV of this Treaty the approval shall be governed by the following rules of principles which are adopted by the High Contracting Parties for this purpose:

The High Contracting Parties shall have, each on its own side of the boundary, equal and similar rights in the use of the waters hereinbefore defined as boundary waters.

The following order of precedence shall be observed among the various uses enumerated hereinafter for these waters, and no use shall be permitted which tends materially to conflict with or restrain any other use which is given preference over it in this order of precedence:

1. Uses for domestic and sanitary purposes;
2. Uses for navigation, including the service of canals for the purposes of navigation;
3. Uses for power and for irrigation purposes.

The foregoing provisions shall not apply to or disturb any existing uses of boundary waters on either side of the boundary. The requirement for an equal division may in the discretion of the Commission be suspended in cases of temporary diversions along boundary waters at points where such equal division cannot be made advantageously on account of local conditions, and where such diversion does not diminish elsewhere the amount available for use on the other side.

The Commission in its discretion may make its approval in any case conditional upon the construction of remedial or protective works to compensate so far as possible for the particular use or diversion proposed, and in such cases may require that suitable and adequate provision, approved by the Commission, be made for the protection and indemnity against injury of all interests on the other side of the line which may be injured thereby.

In cases involving the elevation of the natural level of waters on either side of the line as a result of the construction or maintenance on the other side of remedial or protective works or dams or other obstructions in boundary waters flowing there from or in waters below the boundary in rivers flowing across the boundary, the Commission shall require, as a condition of its approval thereof, that suitable and adequate provision, approved by it, be made for the protection and indemnity of all interests on the other side of the line which may be injured thereby.

The majority of the Commissioners shall have power to render a decision. In case the Commission is evenly divided upon any question or matter presented to it for decision, separate reports shall be made by the Commissioners on each side to their own Government. The High Contracting Parties shall thereupon endeavour to agree upon an adjustment of the question or matter of difference, and if an agreement is reached between them, it shall be reduced to writing in the form of a protocol, and shall be communicated to the Commissioners, who shall take such further proceedings as may be necessary to carry out such agreement.

²⁰⁸ *Ibid* at art X. Article X of the BWT provides that: Any questions or matters of difference arising between the High Contracting Parties involving the rights, obligations, or interests of the United States or of the Dominion of Canada either in relation to each other or to their respective inhabitants, may be referred for decision to the International Joint Commission by the consent of the two Parties, it being understood that on the part of the United States any such action will be by and with the advice and consent of the Senate, and on the part of His Majesty's Government with the consent of the Governor General in Council. In each case so referred, the said Commission is authorized to examine into and report upon the facts and circumstances of the particular questions any matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference.

A majority of the said Commission shall have power to render a decision or finding upon any of the questions or matters so referred.

If the said Commission is equally divided or otherwise unable to render a decision or finding as to any questions or matters so referred, it shall be the duty of the Commissioners to make a joint report to both Governments, or separate reports to their respective Governments, showing the different conclusions arrived at with regard to the matters or questions referred, which questions or matters shall thereupon be referred for decision by the High Contracting Parties to an umpire chosen in accordance with the procedure prescribed in the fourth, fifth and sixth paragraphs of Article XLV of the Hague Convention for the pacific settlement of international disputes, dated October 18, 1907. Such umpire shall have power to render a final decision with respect to those matters and questions so referred on which the Commission fails to agree.

²⁰⁹ *Ibid* at art IX. The investigative powers provides for the examination and making recommendations in regard to any differences arising along the common boundary. Article IX of the BWT provides that: The High Contracting

altogether obvious, no use has ever been made of the arbitral function”²¹¹ under article X, that allows any questions or matters of difference arising between the United States and Canada to be referred for decision to the International Joint Commission with the consent of the two governments.²¹² It has been suggested that this might be due to either the effective function of the IJCs other powers or that judicial proceedings are not an appropriate forum for the resolution of problems involved with the management of a complex waterways system.²¹³ It could also be that the governments have avoided the use of the arbitral process because they do not want to force the IJC into choosing sides in the middle of heated conflicts, which could potentially undermine its legitimacy with the losing side.²¹⁴ Despite the foregoing, B. Timothy Heinmiller sees Article X -- the arbitral powers -- as remaining a “potential power of the IJC that may be used in the future.”²¹⁵

Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier between the United States and the Dominion of Canada, shall be referred from time to time to the International Joint Commission for examination and report, whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred.

The International Joint Commission is authorized in each case so referred to examine into and report upon the facts and circumstances of the particular questions and matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference.

Such reports of the Commission shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an arbitral award.

The Commission shall make a joint report to both Governments in all cases in which all or a majority of the Commissioners agree, and in case of disagreement the minority may make a joint report to both Governments, or separate reports to their respective Governments.

In case the Commission is evenly divided upon any question or matter referred to it for report, separate reports shall be made by the Commissioners on each side to their own Government.

²¹⁰ *Ibid.*

²¹¹ William R Willoughby, “Expectations and Experience 1909-1979” in Robert Spencer, John Kirton and Kim Richard Nossal, eds, *The International Joint Commission Seventy Years On* (Toronto: University of Toronto, Centre for International Studies, 1981) at 34.

²¹² *The Boundary Waters Treaty*, *supra* note 47 at art X.

²¹³ Willoughby, *supra* note 211 at 34.

²¹⁴ *Ibid.*

²¹⁵ B Timothy Heinmiller, “The Boundary Waters Treaty and Canada-U.S. Relations in Abundance and Scarcity” (2008) 54 *Wayne L Rev* at 1506.

3.3.2 *The IJC's Structure, Mandate and Rules*

Article VII provides, *inter alia*, that:

The High Contracting Parties agree to establish and maintain an International Joint Commission of the United States and Canada composed of six commissioners, three on the part of the United States appointed by the President thereof, and three on the part of the United Kingdom appointed by His Majesty on the recommendation of the Governor in Council of the Dominion of Canada.²¹⁶

The above text shows that the IJC comprises an equal number of Commissioners for the United States (the United States Section) and Canada (the Canada Section). In addition, Article XII of the BWT provides further clarifications regarding the IJC's mandate and organization.²¹⁷ Article XII provides, first, that the IJC will have meetings as mandated by the two governments. Second, each Commissioner upon appointment will make a solemn declaration in writing that he or she will faithfully and impartially perform his or her duties as mandated by the Treaty. Third, the United States and Canada sections' will each appoint its own chairman and secretary to assist with the work of their section of the Commission. Fourth, the Commission may employ

²¹⁶ *The Boundary Waters Treaty*, *supra* note 47 at art VII.

²¹⁷ *Ibid* at art XII. Article XII provides that The International Joint Commission shall meet and organize at Washington promptly after the members thereof are appointed, and when organized the Commission may fix such times and places for its meetings as may be necessary, subject at all times to special call or direction by the two Governments. Each Commissioner upon the first joint meeting of the Commission after his appointment, shall, before proceeding with the work of the Commission, make and subscribe a solemn declaration in writing that he will faithfully and impartially perform the duties imposed upon him under this treaty, and such declaration shall be entered on the records of the proceedings of the Commission. The United States and Canadian sections of the Commission may each appoint a secretary, and these shall act as joint secretaries of the Commission at its joint sessions, and the Commission may employ engineers and clerical assistants from time to time as it may deem advisable. The salaries and personal expenses of the Commission and of the secretaries shall be paid by their respective Governments, and all reasonable and necessary joint expenses of the Commission, incurred by it, shall be paid in equal moieties by the High Contracting Parties. The Commission shall have power to administer oaths to witnesses, and to take evidence on oath whenever deemed necessary in any proceeding, or inquiry, or matter within its jurisdiction under this treaty, and all parties interested therein shall be given convenient opportunity to be heard, and the High Contracting Parties agree to adopt such legislation as may be appropriate and necessary to give the Commission the powers above mentioned on each side of the boundary, and to provide for the issue of subpoenas and for compelling the attendance of witnesses in proceedings before the Commission before the Commission. The Commission may adopt such rules of procedure as shall be in accordance with justice and equity, and may make such examination in person and through agents or employees as may be deemed advisable.

engineers and clerical assistants as it deems appropriate. Fifth, during joint sessions of the IJC, the two secretaries will act as joint secretaries. Sixth, the Commission is permitted to employ additional staff as it deems necessary to carry out its duties. Seventh, each country is responsible for the payment of expenses and the management of the affairs of its own section, including the payment of the salaries of the Commissioners and secretaries. However, any joint-expenses incurred by the Commission are shared equally by the United States and Canada. Eighth, the Commission can administer oaths to witnesses, take evidence on oath, or inquire into any matter within its jurisdiction under the BWT. Finally, the Commission shall provide opportunities for all parties interested in a matter to be heard.

The IJC Commissioners are selected from a variety of professions, but they are mostly legally trained, politicians and engineers.²¹⁸ The IJC Commissioners in the United States and Canada appoint additional staff to assist them in their work.²¹⁹

3.3.3 The IJC Rules of Procedure – General

The IJC has a mandate under Article XII of the BWT to create its own Rules of Procedure (Rule(s)) and it provides that “[t]he Commission may adopt such rules of procedure” in the exercise of its jurisdiction.²²⁰ Based on this mandate, the IJC adopted its Rules to assist its Commissioners in all their deliberations and in the performance of their mandate.²²¹ Rule 2 (1)-(2) provides that the United States and the Canadian sections of the IJC, will each appoint a

²¹⁸ Willoughby, *supra* note 211 at 35-36.

²¹⁹ *Ibid.*

²²⁰ *The Boundary Waters Treaty*, *supra* note 47 at art XII.

²²¹ *Ibid.*

Chairman to oversee all meetings.²²² Rule 3 provides for the creation of two permanent offices for the IJC one for the United States section in Washington and the other for the Canadian section in Ottawa.²²³ Rule 4 covers the duties of the secretaries appointed for each of the two sections of the IJC.²²⁴ For example, Rule 4 (1) provides that the secretaries will act as joint secretaries for all meetings and hearings of the two sections of the IJC, while they will act as secretaries for meetings of their own section.²²⁵ Additionally, Rule 4 (2)–(4) covers the need for the proper filing of documents relating to applications and references and the exchange of documents between the secretaries.²²⁶

According to Rule (5), the IJC will meet twice a year in April in Washington and in October in Ottawa, and also meet for any other meeting that are requested by the two governments.²²⁷ It also

²²² The International Joint Commission, “Rule of Procedure of the International Joint Commission” online: The International Joint Commission <http://www.ijc.org/rel/agree/rules_e.htm> at rule 2 (1)–(2) [The IJC, “Rule of Procedure”].

²²³ *Ibid* at rule 3.

²²⁴ *Ibid* at rule 4.

²²⁵ *Ibid* at rule 4 (1). Rule 4 (1) provides that: (1) [t]he secretaries shall act as joint secretaries at all meetings and hearings of the Commission. The secretary of the section of the Commission of the country in which a meeting or hearing is held shall prepare a record thereof and each secretary shall preserve an authentic copy of the same in the permanent offices of the Commission.

²²⁶ *Ibid* at rule 4 (2)–(4). Rule 4 (2)–(4) provides that: (2) Each secretary shall receive and file all applications, references and other papers properly presented to the Commission in any proceeding instituted before it and shall number in numerical order all such applications and references; the number given to an application or reference shall be the primary file number for all papers relating to such application or reference.

(3) Each secretary shall forward to the other for filing in the office of the other copies of all official letters, documents records or other papers received by him or filed in his office, pertaining to any proceeding before the Commission, to the end that there shall be on file in each office either the original or a copy of all official letters and other papers, relating to the said proceeding.

(4) Each secretary shall also forward to the other for filing in the office of the other copies of any letters, documents or other papers received by him or filed in his office which are deemed by him to be of interest to the Commission.

²²⁷ *Ibid* at rule 5. Rule 5 provides that at: 5. (1) Subject at all times to special call or direction by the two Governments, meetings of the Commission shall be held at such times and places in the United States and Canada as the Commission or the Chairmen may determine and in any event shall normally be held each year in the United States in April and in Canada in October, beginning ordinarily on the first Tuesday of the said months.

(2) If the Commission determines that a meeting shall be open to the public, it shall give such advance notices to this effect as it considers appropriate in the circumstances.

provides that the Commission or the Chairmen determines if a meeting will be opened to the public and shall provide advance notice to the public.²²⁸

Rule 8 covers the procedure for making decisions and it entrusts the whole Commission (involving all the six Commissioners) appointed in line with Article XII of the BWT, to deliberate and determine any question or matter of difference and the agreement of at least four Commissioners is needed for a decision.²²⁹

3.3.4 The IJC's Rules of Procedure for References

The IJC has created Rules of Procedure specifically for its handling of references. First, Rule 26 (1)-(4) provides that matters or questions of differences can be referred to the IJC for investigation and recommendations by either the government of the United States or Canada, and it also stresses the need for the question or matter of difference in the reference to be clearly stated.²³⁰ Second, Rule 27 (1)-(2) provides that if a secretary of one section receives a reference, he or she must send a copy to the secretary of the other section, and it also calls for appropriate notice of the reference to be made available to the public in relevant publications.²³¹ Third, Rule 28 (1)-(3) provides for the IJC to constitute boards of equal membership of the United States and Canada to help with investigations into references and the reports from the board are to be made

²²⁸ *Ibid.*

²²⁹ *Ibid* at rule 8. Rule 8 provides that: The whole Commission shall consider and determine any matter or question which the Treaty or international agreement, either in terms or by implication, requires or makes it the duty of the Commission to determine. For the purposes of this rule and Rule 7, "the whole Commission" means all of the commissioners appointed pursuant to Article VII of the Treaty whose terms of office have not expired and who are not prevented by serious illness or other circumstances beyond their control from carrying out their functions as commissioners. In no event shall a decision be made without the concurrence of at least four commissioners.

²³⁰ *Ibid* at rule 26 (1)-(4).

²³¹ *Ibid* at rule 27 (1)-(2).

available to the two governments and interested parties.²³² Finally, Rule 29 (1)–(9) provides for the IJC to conduct hearings as part of its investigation into references, while providing interested parties with an opportunity to present oral and documentary evidence at the hearings.²³³

The importance of the foregoing is that it shows the IJC’s mandate emphasizes parity in the composition and operation of its United States and Canadian sections. Additionally, it emphasizes the need for the two sections to work together as equal partners in addressing their boundary waters issues. The IJC Rules allow it to use boards of experts in its investigations ensuring that its reports accompanying investigations are based on scientific principles.

3.3.5 The IJC’s Contribution to the BWT’s Success in Resolving Boundary Waters Disputes

The IJC uses experts, scientific investigations, boards, public participation in joint fact-finding, and consensus among its Commissioners to resolve and prevent water disputes.²³⁴ The IJC also relies on its broad and flexible mandate²³⁵ to investigate and make recommendations on varied issues that extend beyond navigation to water quantity, water quality, and environmental concerns.²³⁶ The IJC’s broad mandate has made it a pioneer of key environmental law principles such as the precautionary principle,²³⁷ and the prevention of transboundary pollution.²³⁸

²³² *Ibid* at rule 28 (1)-(3).

²³³ *Ibid* at rule 29 (1)-(9).

²³⁴ Wolf & Newton, “The International Joint Commission”, *supra* note 137 at 198.

²³⁵ Austen L Parrish, “Trail Smelter Déjà Vu: Extraterritoriality, International Environmental Law, and the Search for Solutions to Canadian-U.S. Transboundary Water Pollution Disputes” (2005) 85 BUL Rev at 418 [Parrish, “Trail Smelter Déjà Vu].”

²³⁶ Sam Speck, “The Boundary Waters Treaty and Protecting Fresh Water Resources in North America” (2008) 54 Wayne L Rev at 1483-1488.

²³⁷ The International Joint Commission, “A Model for Cooperation” (2009-2012) online: The International Joint Commission <<http://bwt.ijc.org/index.php?page=model-cooperation&hl=eng>>. Commenting on the its investigation and recommendations in regard to the 1985 Flathead River Reference to it, the IJC provides that: [the] U.S. citizens objected to a proposed mountaintop-removal coal mine in British Columbia because they were concerned it could pollute the Flathead River and decimate the trout fishery. After studies and public consultation, the IJC

The IJC's broad mandate under its Reference Jurisdiction was shown under the Trail Smelter Reference. The reference was necessitated by transboundary pollution. The Consolidated Mining and Smelting Company of Canada, Limited (the Company), operated the zinc and lead smelter at Trail, British Columbia (BC) that it acquired in 1906.²³⁹ Later, the Company became one of the best and largest equipped smelting plants in North America.²⁴⁰ The Company installed two 409-foot high smokestacks in 1925 and 1927 that spewed sulphur dioxide pollution over a wide area and this caused farmers in Washington State in the United States to seek redress for their

recommended that the mine not be approved until potential impacts on the fishery were eliminated and both sides found the other risks to be acceptable [The IJC, "A Model for Cooperation"]. See Bankes, *supra* note 186 at 13, where the author comments that by basing on risk to stop the [Flathead] project, the IJC's conclusions and recommendations fell within the ambit of the precautionary principle. See Irina Zodrow, "International Aspects of Water Law Reforms" in Phillippe Cullet et al, *Water Law for the Twenty-First Century National and International Aspects of Water Law Reform in India* (Oxon: Routledge, 2010) at 46, where the author provides that: the principle of precaution is now widely accepted as a fundamental concept of international and national environmental laws and regulations. See the Rio Declaration on Environment and Development, Rio de Janeiro, 14 June 1992, UN Doc. A/CONF.151/26/Rev1 at Principle 15 that provides that: In order to protect the environment, the precautionary approach shall be widely applied by States, according to their capabilities. Where there are threats of serious or irreversible damage, lack of full scientific certainty shall not be used as a reason for postponing cost-effective measures to prevent environmental degradation.

²³⁸ *The Boundary Waters Treaty*, *supra* note 47 at art IV, where the provision is seen as a forerunner of the international environmental movement prohibiting the perpetration of transboundary environmental harm as it provides, *inter alia*, that: "[i]t is further agreed that the waters herein defined as boundary waters and waters flowing across the boundary shall not be polluted on either side to the injury of health or property on the other." See John H Knox, "The Boundary Waters Treaty: Ahead of its Time and Ours" (2008) 54 Wayne L Rev at 1591, where the author comments that: [o]n its face, the prohibition on transboundary environmental harm in Article IV looks like a harbinger of the international environmental movement that began six decades later. Transboundary harm has been the subject of almost all international environmental treaties in the last forty years, from those addressing threats to the environment of the entire planet, such as climate change and ozone depletion, to those addressing regional environmental degradation, such as long-range air pollution and pollution of shared bodies of water, to bilateral agreements focusing on harm crossing a single international boundary. See Bradley C Karkkainen, "The Great Lakes and International Environmental Law: Time for Something Completely Different?" (2008) 54 Wayne L Rev at 1576, where the author notes that: [w]ith that simple bilateral commitment, the United States and Canada embraced a mutual obligation to prevent significant harm by transboundary pollution-the first clear expression in treaty law of the great principle of state responsibility to prevent serious transboundary environmental harm. See Marcia Valiante, "How Green is my Treaty - Ecosystem Protection and the Order of Precedence under the Boundary Waters Treaty of 1990" (2008) 54 Wayne L Rev at 1526, where the author comments that "[The BWT] (...) has iconic status as one of the earliest international agreements to establish a permanent regime [called the IJC] for resolving water resource conflicts between two sovereign nations, and the first to prohibit harmful levels of pollution."

²³⁹ United Nations, Reports of International Arbitral Awards, Trail Smelter Case (United States, Canada) online: <http://untreaty.un.org/cod/riaa/cases/vol_III/1905-1982.pdf> at 1918 [United Nations, "Trail Smelter Case, United States, Canada"].

²⁴⁰ *Ibid.*

polluted farmlands.²⁴¹ To deal with the pollution, the governments of the United States and Canada, issued a concurrent reference under Article IX of the BWT – with the United States reference dated August 7, 1928²⁴² and the Canada reference dated August 17, 1928²⁴³ – to the IJC to investigate and report on the Trail Smelter fumes in BC – for causing transboundary air pollution in Washington State in the United States, and together with the recommendations that the IJC deems appropriate on the questions below.²⁴⁴

- “1. Extent to which property in the State of Washington has been damaged by fumes from Smelter at Trail, British Columbia.
2. The amount of indemnity which would compensate United States interests in the State of Washington for past damages.
3. Probable effect in Washington of future operations of smelter.
4. Method of providing adequate indemnity for damages caused by future operations.
5. Any other phase of problem arising from drifting of fumes on which Commission deems it proper or necessary to report and make recommendations in fairness to all parties concerned.”²⁴⁵

The significance of the terms of reference was that it allowed the IJC to investigate the extent to which property in the Washington State had been damaged by fumes from the Trail Smelter in BC; and second, the IJC was mandated to determine the amount of indemnity which would provide for compensation for past damages to the United States interests in Washington State.²⁴⁶

The IJC after an extensive investigation and its report in February 1931 recommended payment of \$350,000 to cover claims for damages through the end of 1931. Remedial works were to be completed that year [by the Company] and the report expected that

²⁴¹ *Ibid.*

²⁴² The International Joint Commission, “Docket 25R U.S. Letter of Reference” (1928) online: The International Joint Commission <http://bwt.ijc.org/docket_table/attachments/Docket%2025/Docket%2025%20U.S.%20Letter%20of%20Reference.pdf> [The IJC, “Trail Smelter Reference”].

²⁴³ *Ibid.*

²⁴⁴ *Ibid.*

²⁴⁵ *Ibid.*

²⁴⁶ United Nations, “Trail Smelter Case, United States, Canada”, *supra* note 239 at 1918.

they would bring an end to the transboundary damages. The IJC report was not accepted by both governments.²⁴⁷

The governments rejected the IJC report and recommendations as the pollution persisted, and the subsequent diplomatic negotiations resulted in the United States and Canada signing and ratifying a Convention in 1935.²⁴⁸ Based on the terms of the Convention the two nations agreed to refer the matter to a three-member arbitration tribunal comprising an American, a Canadian, and an independent Chairman who is a jurist of repute (a Belgian national was ultimately appointed).²⁴⁹ The arbitration tribunal was charged with determining whether the damages caused by the Trail Smelter continued to occur after January 1, 1932 and, if so, what indemnity should be paid.²⁵⁰ Canada had already agreed to pay the United States \$350,000 for damages prior to 1932, based on the findings of the IJC report²⁵¹ and \$78,000 for subsequent damages.²⁵² The tribunal also established a preventive regime and the possibility for future compensation.²⁵³ The Smelter dispute became a landmark decision in international environmental law because two countries relied on arbitration to settle a transboundary pollution issue.²⁵⁴ The importance of the

²⁴⁷ The International Joint Commission, "International Joint Commission Annual Report for 2008: Boundary Waters Treaty Centennial Edition" (2009) online: The International Joint Commission <<http://www.ijc.org/php/publications/pdf/ID1629.pdf>> at 41 [The IJC, "Annual Report for 2008"].

²⁴⁸ United Nations, "Trail Smelter Case, United States, Canada", *supra* note 239 at 1918, art II.

²⁴⁹ *Ibid.*

²⁵⁰ *Ibid* at art III. The questions the arbitration tribunal was supposed to address were: The Tribunal shall finally decide the questions, hereinafter referred to as "the Questions", set forth hereunder, namely:

(1) Whether damage caused by the Trail Smelter in the State of Washington has occurred since the first day of January, 1932, and, if so, what indemnity should be paid therefor?

(2) In the event of the answer to the first part of the preceding Question being in the affirmative, whether the Trail Smelter should be required to refrain from causing damage in the State of Washington in the future and, if so, to what extent?

(3) In the light of the answer to the preceding Question, what measures or regime, if any, should be adopted or maintained by the Trail Smelter?

(4) What indemnity or compensation, if any, should be paid on account of any decision or decisions rendered by the Tribunal pursuant to the next two preceding Questions?

²⁵¹ *Ibid* at art I.

²⁵² The IJC, "Annual Report for 2008", *supra* note 247 at 41.

²⁵³ *Ibid.*

²⁵⁴ *Ibid.*

tribunal's decision was that it established that a State owes a duty at all times to protect other States against injurious acts by individuals from within its jurisdiction.

The IJC has attracted praise for successfully managing the boundary waters between the United States and Canada.²⁵⁵ It has resulted in calls for other jurisdictions to adopt an IJC-type structure to resolve their water disputes. For example, L.M. Bloomfield & Gerald F. Fitzgerald recommend it as a model of legal regime to govern other international rivers to help settle disputes.²⁵⁶ Similarly, John E. Carroll views it as a model for the rest of the world.²⁵⁷ To this end, this thesis proposes an incorporation of an IJC-type structure into the VBA to assist it to better manage the water conflict in the VRB.

3.4 The IJC's Reliance on the Reference Jurisdiction for Investigations and Report

The IJC's exercise of its Reference Jurisdiction mandate has made an important contribution to its success in managing the boundary waters between the United States and Canada.²⁵⁸ L.H. Legault confirms that it is one of the major functions assigned to the IJC.²⁵⁹ Duncan B. Hollis also notes that it has played a key role in the IJC's success by receiving and dealing with references.²⁶⁰ Stephen J. Toope & Jutta Brunnée note that “[t]he [R]eference [J]urisdiction (...)

²⁵⁵ Wolf & Newton, “The International Joint Commission”, *supra* note 137 at 198.

²⁵⁶ Bloomfield & Fitzgerald, *supra* note 193 at iii.

²⁵⁷ John E Carroll, “Patterns Old and New” in Robert Spencer, John Kirton and Kim Richard Nossal, eds, *The International Joint Commission Seventy Years On* (Toronto: University of Toronto, Centre for International Studies, 1981) at 43.

²⁵⁸ Heinmiller, *supra* note 215 at 1506.

²⁵⁹ LH Legault, “The Roles of Law and Diplomacy in Dispute Resolution: The IJC as a Possible Model” Address of IJC Chairman Legault, Canadian Section, International Joint Commission to the Canada – (Cleveland, Ohio: United States Law Institute, Case Western Reserve University School of Law, April 2000) online: <http://www.ijc.org/php/publications/html/legault_april.html> at 50-51.

²⁶⁰ Duncan B Hollis, “Disaggregating Devils Lake: Can Non-State Actors, Hegemony, or Principal-Agent Theory Explain the Boundary Waters Treaty? Responsibility of Individuals, States and Organizations” (2007) Temple

is a process that takes full advantage of the IJC as a unique forum for dialogue and fact-finding” to investigate problems and make recommendations to the two governments.²⁶¹ Shiloh Hernandez draws attention to the fact that “[w]hile the nations have referred many matters to the IJC for non-binding recommendations under [A]rticle IX, they have referred none for a binding decision under [A]rticle X.”²⁶² Despite the foregoing, B. Timothy Heinmiller, highlights that the IJC’s investigative powers were initially regarded as “relatively minor in importance, [but] have been invoked quite frequently and have become one of the Commission’s most significant contributions to conflict management.”²⁶³ John E. Carroll agrees that “receiving and acting upon references given to it by the government, is [not only] becoming dominant in the work of the Commission [but] is also the one for which it is best known to the public today.”²⁶⁴ Robert V. Wright adds that “[t]his often used investigative and reporting power of the IJC has proved to be very useful in heading off disputes.”²⁶⁵

A. Dan Tarlock goes further that the Reference Jurisdiction “is the major source of the IJC’s influence and is now its most important function.”²⁶⁶ According to Stephen J. Toope & Jutta Brunnée, “[a]lthough it may not have been apparent to the drafters of the Treaty in 1909, the most important role accorded to the IJC has probably been its fact-finding and reporting

University Legal Studies Research Paper No 2007-05 online: Social Science Research Network<<http://ssrn.com/abstract=976829>> at 5.

²⁶¹ Stephen J Toope & Jutta Brunnée, “Freshwater Regimes: The Mandate of the International Joint Commission” (1998) 15 *Ariz J Int’l & Comp L* at 283.

²⁶² Shiloh Hernandez, “Mountaintop Removal at the Crown of the Continent: International Law and Energy Development in the Transboundary Flathead River Basin” (2008) 32 *Vt L Rev* at 560.

²⁶³ Heinmiller, *supra* note 215 at 1506.

²⁶⁴ Carroll, *supra* note 257 at 43.

²⁶⁵ Robert V Wright, “The Boundary Waters Treaty: A Public Submission Process Would Increase Public Participation, Accountability, and Access to Justice” (2008) 54 *Wayne L Rev* at 1611.

²⁶⁶ A Dan Tarlock, “The Great Lakes as an Environmental Heritage of Humankind: An International Law Perspective” (2007) 40 *U Mich J L Reform* at 1011 [Tarlock, “The Great Lakes”].

jurisdiction.²⁶⁷ A. Dan Tarlock notes that the IJC uses it,²⁶⁸ to resolve what L.M. Bloomfield and Gerald F. Fitzgerald describe as a myriad of disputes involving boundary waters and environmental issues.²⁶⁹ The foregoing evidences the value of the Reference Jurisdiction to the IJC. With this in mind, the question is: what has accounted for the IJC's successful use of its Reference Jurisdiction? The thesis later will show that the use of flexibility is considered as a key factor in the IJC's successful exercise of its Reference Jurisdiction mandate.

3.4.1 The IJC's Reference Jurisdiction Mandate

Article IX of the BWT covers the Reference Jurisdiction and its first part provides that any questions or matters of difference between the United States and Canada along their common frontier should be referred to the IJC for investigation and recommendations.²⁷⁰ It is a broad mandate that allows the IJC to investigate and advise the governments on (...) boundary questions relating to water and the environment.²⁷¹ The thesis later identifies the IJC's broad mandate as one of the factors that have assisted its successful use of its Reference Jurisdiction. William R. Willoughby, acknowledges that "as long as the matter relates to the 'common

²⁶⁷ Toope & Brunnée, *supra* note 261 at 282.

²⁶⁸ A Dan Tarlock, "The International Joint Commission and Great Lakes Diversions: Indirectly Extending the Reach of the Boundary Waters Treaty" (2008) 54 Wayne LR at 1672 [Tarlock, "The International Joint Commission"].

²⁶⁹ Bloomfield & Fitzgerald, *supra* note 193 at 39.

²⁷⁰ *The Boundary Waters Treaty*, *supra* note 47 at art IX, where the first part provides that: The High Contracting Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier between the United States and the Dominion of Canada, shall be referred from time to time to the International Joint Commission for examination and report, whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred. The International Joint Commission is authorized in each case so referred to examine into and report upon the facts and circumstances of the particular questions and matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference.

²⁷¹ Legault, *supra* note 259 at 50-51.

frontier,' there are no limitations on the Commission's power to examine questions of law or fact involved in any dispute or problem."²⁷² William R. Willoughby's statement may be too optimistic since the IJC's powers are limited to those given to it by the BWT, and by the governments of the United States and Canada, and all with a view to preventing and resolving (...) conflicts"²⁷³ relating to their boundary waters.

The remainder of the text of the BWT's Article IX provides, *inter alia*, that:

[The] (...) reports of the Commission [accompanying investigations under references] shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an arbitral award.²⁷⁴

L.M. Bloomfield and Gerald F. Fitzgerald view the above as a confirmation that the Reference Jurisdiction is non-judicial in nature.²⁷⁵ Non-judicial as used here means that the IJC's recommendations following its investigations under references are not binding on the two governments. The IJC plays an advisory role under its Reference Jurisdiction²⁷⁶ and it does this by examining matters and questions referred to it by the governments and reporting its findings to the two governments.²⁷⁷ The significance of the IJC's lack of issuing binding decisions under

²⁷² Willoughby, *supra* note 211 at 35.

²⁷³ The International Joint Commission, "The IJC and the 21st Century, Response of the IJC to a Request by the Governments of Canada and the United States for Proposals on How to Best Assist them to Meet the Environmental Challenges of the 21st Century" (1997) online: The International Joint Commission <<http://www.ijc.org/php/publications/pdf/ID1011.pdf>> [The IJC, "The IJC and the 21st Century"] where the IJC states that: Under its reference function and at the request of governments the Commission investigates and reports on issues of concern along the boundary. These reports are advisory in nature and not binding on the governments. There are few restrictions on the issues or responsibilities that can be given to the IJC in this way. Thus, the Commission has undertaken such diverse roles as investigating and reporting on transboundary water and air pollution or recommending principles for developing resources, all with a view to preventing and resolving transboundary conflicts.

²⁷⁴ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

²⁷⁵ Bloomfield & Fitzgerald, *supra* note 193 at 39.

²⁷⁶ Woodward, *supra* note 187 at 328.

²⁷⁷ *Ibid.*

Article IX is that it encourages the two governments to refer many issues to the IJC with the knowledge that they have the choice to accept or reject the IJC's findings and recommendations. Maxwell Cohen notes that the IJC has also steered clear of a legalistic approach to its mandate.²⁷⁸ Not adopting a legalistic approach means the IJC does not rely on precedent to investigate and report on references but instead investigate each referral as a unique question and report on it to the governments. Some see this lack of a legalistic approach as a weakness in the IJC's exercise of its Reference Jurisdiction.²⁷⁹ However, Itzhak E. Kornfeld, argues that it is one of its strengths as it allows the IJC to have flexibility in its use and not be tied down with a court-type precedent.²⁸⁰ The foregoing shows that the IJC's mandate under its Reference Jurisdiction allows the governments to refer varied boundary waters issues to it for investigation and report.

3.5 The Factors that have assisted the IJC's Successful Use of Flexibility

The thesis cites examples from the Flathead Reference to examine the factors that have aided the IJC's successful use of flexibility to investigate and make recommendations under references. According to Kevin W. Li, D. Marc Kilgour & Keith W. Hipel, the Flathead River Referral was

²⁷⁸ Maxwell Cohen, "The Commission from the Inside" in Robert Spencer, John Kirton and Kim Richard Nossal, eds, *The International Joint Commission Seventy Years On* (Toronto: University of Toronto, Centre for International Studies, 1981) at 121-122. The author submits that: [It] is remarkable how 'non-legalistic' the IJC has been over its history, even though it operated in a more formal and legal manner in its first years than in recent times. It remains for the governments to consider whether the present rather casual attention to legal reforms and principles – often even principles of international law – may have gone too far in the direction of pragmatic non-formal behaviour, and whether, therefore, some new sense of the legal thrust of the treaty should not become part of the next generation of concerns for governments and the Commission.

²⁷⁹ Toope & Brunnée, *supra* note 261 at 274-277.

²⁸⁰ Itzhak E. Kornfeld, "Polycentrism and the International Joint Commission" (2008) 54 *Wayne L Rev* at 1696-1697 [Kornfeld, "Polycentrism"], where the author argues that: [t]he IJC's ability to conduct an in-depth study of each referral, to hold public hearings, and to afford parties the opportunity to submit amicus briefs, provides it with powers that courts simply lack. The [courts] can only deal with narrow legal issues, and in the United States, only when those issues raise a case of controversy. In addition, once the [IJC] receives a referral, its jurisdiction is extremely broad, and unlike courts, it is unconstrained by constitutional provisions or legislative mandate.

premised on the State of Montana's fears that further expansion of the Sage Creek Coal Facilities in Canada would pollute the Flathead River, which flows from British Columbia (BC) in Canada to Montana in the United States.²⁸¹ The Flathead Reference was necessitated by the Sage Creek Coal Limited's application to the BC Government for approval for a proposed mine on the Cabin Creek in BC, near its confluence with the Flathead River.²⁸² It resulted in a reference from the governments to the IJC under Article IX of the BWT, to examine the possible impacts of the proposed coal mine on water quality and quantity, fisheries, and water uses of the Flathead River and downstream through the Flathead Lake.²⁸³

This thesis selected the Flathead Reference for analysis for the following reasons. First, it is one of the eight references that the IJC uses to showcase its successful investigations and recommendations under references.²⁸⁴ Second, it emphasizes the IJC's use of experts from different areas of expertise and scientific principles in investigations under references.²⁸⁵ Third, it shows the use of public participation as part of the investigation under references. Finally, it shows the broad remit of the IJC's Reference Jurisdiction.

²⁸¹ Kevin W Li, D Marc Kilgour & Keith W Hipel, "Status Quo Analysis of the Flathead River Conflict" (2004) 40 Water Resources Research at 1.

²⁸² The IJC, "Docket 110 Flathead Can. Reference 1985-02-15.pdf online: The International Joint Commission <http://bwt.ijc.org/docket_table/attachments/Docket%20110/Docket%20110%20Flathead%20Can.%20Reference%201985-02-15.pdf> at 1-3 [IJC, "The Flathead Reference"].

²⁸³ *Ibid* at 2.

²⁸⁴ See The IJC, "The IJC and the 21st Century" *supra* note 273, where the other references the IJC showcased, were The St. Mary and Milk Rivers of 1914, the Trail Smelter Fumes of 1928, the Columbia River of 1944, the Great Lake Levels of 1964, the Skagit River Environmental Flooding Consequences of 1971, the Garrison Diversion Project of 1975, and the 1978 Great Lakes Water Quality Agreement (amended 1987) of 1978.

²⁸⁵ The International Joint Commission, "Impacts of a Proposed Coal Mine in the Flathead River Basin" (1988) online: The International Joint Commission <http://bwt.ijc.org/docket_table/attachments/Docket%20110/Docket%20110%20Flathead%20Final%20Report%20to%20Gov.pdf> at 3 [IJC, "The Flathead Report"].

3.5.1 *The IJC's Broad Mandate Factor*

The IJC's broad mandate is a factor that has assisted its use of flexibility for references. The IJC's broad mandate allows it to investigate and report on boundary waters, the pollution of transboundary waters, and transboundary environmental issues. Boundary waters are waters that form part of or all of the boundaries between two or more countries. Transboundary waters are water resources that cross the boundaries of two or more countries. Transboundary environmental issues are problems such as air pollution that originates from one country but whose effect is felt in one or more neighbouring countries.

The IJC's broad mandate is provided under Article IX of the BWT as, *inter alia*:

The High Contracting Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier between the United States and the Dominion of Canada, shall be referred from time to time to the International Joint Commission for examination and report, whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred.²⁸⁶

Commenting on the IJC's broad mandate factor, James G. Chandler & Michael J. Veschler explain that the word "interests" in the text of Article IX is "one of the secrets to the longevity of the *Boundary Waters Treaty* [as it was] (...) formulated in ways that can and have been adapted to changing times and situations."²⁸⁷ They also note that the term "'interests" has expanded and changed to include environmental concerns which were undreamed of in 1909."²⁸⁸ Mary Beth

²⁸⁶ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

²⁸⁷ James G Chandler & Michael J Veschler, "The Great Lakes-St. Lawrence River Basin from an IJC Perspective" (1992) 18 Can-US LJ at 264.

²⁸⁸ *Ibid.*

Brandoni agrees that Article IX's "language, provides [the IJC with] a forum in which the United States and Canada could address any disputes or concern."²⁸⁹ L.M. Bloomfield & Gerald F. Fitzgerald, also note that the Reference Jurisdiction could be described as a "residuary clause" of the BWT²⁹⁰ that allows it to consider "any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier."²⁹¹ However, the thesis notes that the "interests" must relate to the boundary waters agreement between the two nations.

As mentioned earlier, the Flathead Reference dealt with the fear of water pollution and its attendant environmental degradation in the United States, as a result of a proposed coal mine in Canada.

Pollution is covered under Article IV of the BWT, which provides, *inter alia*, that:

It is further agreed that the waters herein defined as boundary waters and waters flowing across the boundary shall not be polluted on either side to the injury of health or property on the other.²⁹²

The Flathead Reference demonstrates the IJCs' Reference Jurisdiction's broad mandate by investigating a question of pollution involving waters that were transboundary. Although the BWT deals mainly with boundary waters, its Article IV extends its mandate by providing against the pollution of transboundary waters.²⁹³ As such, Article IV's provision allows the governments

²⁸⁹ Mary Beth Brandoni, "A Preliminary Discussion of Natural Gas Pipelines Under the Great Lakes" (2004) 11 *Buff Envtl LJ* at 159.

²⁹⁰ Bloomfield & Fitzgerald, *supra* note 193 at 39.

²⁹¹ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

²⁹² *Ibid* at art IV.

²⁹³ *Ibid*.

to refer issues of transboundary waters pollution such as the Flathead Reference to the IJC – under its Reference Jurisdiction – for investigation and report.²⁹⁴ As well, it did not matter that the polluted waters investigated by the IJC under its Flathead Reference did not strictly meet the criteria for pollution as set out in Article IV of the BWT that: “boundary waters and waters flowing across the boundary shall not be polluted on either side to the injury of health or property on the other.”²⁹⁵ As in the case of the proposed mine in BC, “it [wa]s not the pollution that cross[ed] the boundary, but rather [it was] pollution on one side [British Columbia in Canada that] will cause a loss to the fishery, a loss which is felt on the other side of the boundary” [in the United States].²⁹⁶

²⁹⁴ Bankes, *supra* note 186 at 4, where the author provides that: the Flathead is part of the Columbia Basin on the west side of the continental divide. The Flathead and its tributaries rise in the southeastern part of British Columbia and then flow south into Montana. The river for part of its length forms the western boundary of Glacier National Park in Montana and is designated as a Wild and Scenic River. Glacier Park along with Waterton in Canada is a World Heritage Site. There are currently two initiatives to develop resource projects in the British Columbia portion of the Flathead Basin. One is the proposed Lodgepole Coal Mine (Cline Mining Corporation). This is a proposed open-pit operation located in the Foisey Creek\Crab Creek area approximately 40 kilometres north of the border. Various interests in Montana have expressed serious concerns in relation to the project and have argued that the environmental impact assessment that British Columbia is conducting is too narrowly framed. Many of the concerns articulated emphasize the ecological value and importance of this area and emphasize that the region is highly protected in the United States and (either expressly or by implication) suggest that it deserves similar protection in Canada. See Allan Ingelson, Lincoln Mitchell & Sean Assie, “Coal and Coalbed Methane Development in the Flathead - An International Water Dispute” (2010) 22 Pac McGeorge Global Bus & Dev L J at 182-183, where the authors argue that “[t]he Flathead River is not “boundary water,”” per se, “[h]owever, Article IV of the BWT applies to both boundary waters and “waters flowing across the boundary,””and, therefore, included the Flathead River.” This is because “Article IV states that boundary and transboundary waters “shall not be polluted on either side to the injury of health or property of the other.”” Opponents of [the] development in the Flathead Basin can argue that the use of the words “shall not” creates a legal obligation to avoid transboundary pollution and that the nature of the proposed development in the Flathead Basin automatically calls for the intervention of the IJC. [Furthermore, the authors] cite Dino Ross, observation that finding a binding legal obligation in the words of Article IV is difficult for a variety of reasons, including the lack of a definition for either of the key terms, “pollution” or “injury.” [They continued that] Ross also notes that the incorporation of the Harmon Doctrine in Article II has been described as affecting the treaty in this way: That doctrine was formulated in 1895 by Attorney General Judson Harmon to deal with apportionment of waters flowing out of the United States into Mexico. It states that nations have exclusive jurisdiction and control over the uses of all waters within their boundaries. The strongly nationalistic terms of the doctrine are only slightly tempered by subsequent language in Article II stating that a downstream user injured by an upstream user is entitled to the same rights and remedies he would have if the injury had occurred in the source nation. Realistically, this “right” to legal recourse in the source nation is almost completely hampered by the difficulty of filing suit and enforcing damages in a foreign country. Therefore, neither country has attempted to utilize Article IV in a binding fashion. Nonetheless, the IJC has played a valuable role in resolving some transboundary water disputes between the United States and Canada, such as the Cabin Creek Mine.

²⁹⁵ *The Boundary Waters Treaty*, *supra* note 47 at art IV.

²⁹⁶ The IJC, “Flathead Report”, *supra* note 285 at 8.

3.5.2 *The IJC Reference Jurisdiction Process Factor*

The IJC's Reference Jurisdiction process is another factor (process factor) that has aided the IJC's use of flexibility for the exercise of its Reference Jurisdiction mandate.

3.5.2.1 The Commencement of the Process

Article IX of the BWT provides the mandate for the IJC's Reference Jurisdiction process. Article IX provides that:

The High Contracting Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier between the United States and the Dominion of Canada, shall be referred from time to time to the International Joint Commission for examination and report, whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred. The International Joint Commission is authorized in each case so referred to examine into and report upon the facts and circumstances of the particular questions and matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference. Such reports of the Commission shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an arbitral award. The Commission shall make a joint report to both Governments in all cases in which all or a majority of the Commissioners agree, and in case of disagreement the minority may make a joint report to both Governments, or separate reports to their respective Governments. In case the Commission is evenly divided upon any question or matter referred to it for report, separate reports shall be made by the Commissioners on each side to their own Government.²⁹⁷

The text of Article IX is important for the following reasons. First, it shows that the Reference Jurisdiction provides the IJC with a broad mandate that allows the Governments to refer any

²⁹⁷ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

other questions or matters of difference arising between either the two governments or their inhabitants along their common frontier to the IJC for investigation and report. Second, the extent of the IJC's investigative powers under references is determined by the text of the particular reference. Third, the IJC's reports after investigations under references are just recommendations to the two governments and are not decisions or an arbitral award. Finally, the text of Article IX is important for the commencement of the Reference Jurisdiction process by providing that the Reference Jurisdiction process commences "whenever either the government of the United States or the government of the Dominion of Canada shall request that such questions or matters of difference be so referred." This means that the Reference Jurisdiction process can be started by either one or both governments issuing a reference to the IJC.

The IJC created its own Rules of Procedure for filling and considering references by its mandate under the BWT. Specifically, Rule 26 (1)-(4) provides that:

26 1. Where a question or matter of difference arising between the two governments involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other along the common frontier between the United States of America and Canada is to be referred to the Commission under Article IX of the Treaty, the method of bringing such question or matter to the attention of the Commission and invoking its action ordinarily will be as set forth in this rule.

2. Where both governments have agreed to refer such a question or matter to the Commission, each government will present to the Commission, at the permanent office in its country, a reference in similar or identical terms setting forth as fully as may be necessary for the information of the Commission the question or matter which it is to examine into and report upon and any restrictions or exceptions which may be imposed upon the Commission with respect thereto.

3. Where one of the governments, on its own initiative,

has decided to refer such a question or matter to the Commission, it will present a reference to the Commission at the permanent office in its country. All such references should conform, as to their contents, to the requirements of paragraph (2) of this rule.

4. Such drawings, plans of survey and maps as may be necessary to illustrate clearly the question or matter referred should accompany the reference when it is presented to the Commission.²⁹⁸

Rule 26 is important for the following reasons. First, Rule 26 provides that references cover a question or a matter of difference between the two governments or their inhabitants that are referred by the governments to the IJC for an investigation and report. Second, Rule 26 (1) provides that the Reference Jurisdiction's process commences with the issuing of a reference. Third, Rule 26 (2) provides the two governments may together issue a reference while Rule 26 (3) provides that one government may issue a reference.

The foregoing provides evidence that the BWT's Article IX provides that either one of the two nations can initiate a reference by stating that a referral is made "whenever either the Government of the United States or the Government of the Dominion of Canada shall request that such questions or matters of difference be so referred."²⁹⁹ However, as mentioned earlier, the IJC's Rules appears to favour both joint references at Rule 26 (2) which provides that:

"[w]here both Governments have agreed to refer such a question or matter to the Commission, each Government will present to the

²⁹⁸ *Ibid* at art XII, which provides, *inter alia*, that "[t]he Commission may adopt such rules of procedure as shall be in accordance with justice and equity. See The IJC, "Rules of Procedure", *supra* note 222 at rule 26 (1). [The IJC, "Rules of Procedure"] which provides that [w]here a question or matter of difference arising between the two Governments involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other along the common frontier between the United States of America and Canada is to be referred to the Commission under Article IX of the Treaty, the method of bringing such question or matter to the attention of the Commission and invoking its action ordinarily will be as set forth in this rule [The IJC, "Rules of Procedure"]. See also *The Boundary Waters Treaty*, *supra* note 45 at art. XII, which provides, *inter alia*, that "[t]he Commission may adopt such rules of procedure as shall be in accordance with justice and equity."

²⁹⁹ *Ibid* at art IX.

Commission, at the permanent office in its country, a reference in similar or identical terms setting forth as fully as may be necessary for the information of the Commission the question or matter which it is to examine into and report upon and any restrictions or exceptions which may be imposed upon the Commission with respect thereto.”³⁰⁰

But another Rule supports individual references at Rule 26 (3).³⁰¹ However, the BWT is paramount over the Rules, as it is the BWT that gives the IJC the mandate to devise Rules to facilitate its work.³⁰² The Rules cannot restrict the BWT.

Chirakaikaran Joseph Chacko undertook an extensive examination of dockets³⁰³ and concluded that in the past, one nation issued a reference but only with the consent of the other nation.³⁰⁴ However, William R. Willoughby, argues that the text of Article IX makes it clear that a single country may make a reference.³⁰⁵ Noah D Hall, agrees that the BWT only requires a reference from one of the countries to invoke the process of a referral in pursuant of Article IX.³⁰⁶ Irrespective of the foregoing contradictory positions, in practice, however, all references have been made by joint or concurrent requests.³⁰⁷ Noah D. Hall confirms that while any one country can make a reference, “as a matter of custom [references have] always been done with the support of both countries.”³⁰⁸ A joint referral is more appropriate as “it would be pointless for one country to ask the IJC for an investigation unless there were reasonable assurances that the

³⁰⁰ The IJC, “Rules of Procedure” *supra* note 222 at rule 26 (2).

³⁰¹ *Ibid* at rule 26 (3).

³⁰² *The Boundary Waters Treaty*, *supra* note 47 at art XII.

³⁰³ Dockets include references that are made to the IJC by the governments.

³⁰⁴ Chacko, *supra* note 183 at 241-245.

³⁰⁵ Willoughby, *supra* note 211 at 35.

³⁰⁶ Noah D Hall, “Transboundary Pollution: Harmonizing International and Domestic Law” (2007) 40 *University of Michigan Journal of Law Reform* at 706-707 [Hall, “Transboundary Pollution”].

³⁰⁷ Willoughby, *supra* note 211 at 35.

³⁰⁸ Hall, “Transboundary Pollution” *supra* note 306 at 706-707.

other would support it.”³⁰⁹ An investigation on the authorization of only one country might generate bitter feelings on the other side, handicap the investigation, and result in either an incomplete or a one-sided report.³¹⁰ Process factor allows the governments to issue joint and not individual references to the IJC for investigation and report.

This thesis notes that while it may be easy for the United States and Canada to issue joint referrals under Article IX to the IJC, this may not always be possible where a larger number of riparian nations are involved. When a larger number of riparian nations are involved, as is the case with the VRB, the methods for issuing referrals could include a majority of the nations issuing references as an alternative to all the states making references. Chapter four provides recommendations on different methods that the VRB countries can use to issue references.

It is also worth noting that although Article IX of the BWT states either nation may refer questions or matters of difference to the IJC under its Reference Jurisdiction for examination and report without the consent of the other,³¹¹ the governments require the consent of each other to refer questions or matters of difference to the IJC for decisions under Article X of the BWT.³¹²

Article X of the BWT provides that:

Any questions or matters of difference arising between the High Contracting Parties involving the rights, obligations, or interests of the United States or of the Dominion of Canada either in relation to each other or to their respective inhabitants, may be referred for decision to the International Joint Commission by the consent of the two Parties, it being understood that on the part of the United States any such action will be by and with the advice and consent

³⁰⁹ Willoughby, *supra* note 211 at 36.

³¹⁰ *Ibid.*

³¹¹ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

³¹² *Ibid* at art X.

of the Senate, and on the part of His Majesty's Government with the consent of the Governor General in Council.³¹³

3.5.2.2 The Issue Specification Process

Another important but often ignored aspect of the process factor, is the need for a clear specification of the question or matter of difference covered in a reference. The IJC's Rule 26 (4) confirms that "(...) drawings, plans of survey and maps as may be necessary to illustrate clearly the question or matter referred should accompany the reference when it is presented to the Commission."³¹⁴ This assists the IJC to know the limits of its investigations under a referral and keeps it focussed and not deviate from the type of question or matter of difference in the referral. The nature of the reference determines the type of maps and diagrams that the governments use to illustrate it for the IJC.

3.5.2.3 The Process that Follows after the IJC Receives a Reference

Another important aspect of the process factor is the four stages the investigation under a reference goes through after its receipt by the IJC. First, according to Rule 27 (2) of the IJC's Rules, the notice of the reference is published in the *Canada Gazette*, the United States *Federal Register*, and the IJC's website.³¹⁵ Additionally, it must be published in two newspapers, one in the United States, and the other in Canada, and in the localities where people are likely to be

³¹³ *Ibid.*

³¹⁴ The IJC, "Rules of Procedure", *supra* note 222 at rule 26 (4).

³¹⁵ *Ibid* at rule 27 (2), which provides that Subject to any restrictions or exceptions which may be imposed upon the Commission by the terms of the reference, and unless otherwise provided by the Commission, the secretaries, as soon as practicable after the reference, and unless otherwise provided by the Commission, shall cause a notice to be published in the Canada Gazette, the Federal Register, the Commission website and in two newspapers, published one in each country and circulated in or near the localities which, in the opinion of the Commission, are most likely to be interested in the subject matter of the reference. The notice shall describe the subject matter of the reference in general terms, invite interested persons to inform the Commission of the nature of their interest and state that the Commission will provide convenient opportunity for interested persons to be heard with respect thereto.

concerned by the subject-matter of the reference.³¹⁶ The notice explains the reference and encourages concerned parties to contact the IJC of their concern.³¹⁷ The IJC also makes the concerned parties aware that it will provide opportunities for them to express their views and to participate in the investigation.³¹⁸ The foregoing shows the importance the IJC attaches to public participation in its investigations under references.

Second, Rule 28 (1) provides that there is a formation of a board of experts to conduct technical investigations to help with the examination of the questions or matters referred.³¹⁹ According to Rule 28 (2), the board of experts will comprise equal membership of the United States and Canada, and it will be responsible for investigating and reporting the results of their investigations to the IJC.³²⁰

Third, the IJC via the provisions of its Rule 28 (3) makes available copies of the final report of the board for examination by the Governments and interested persons prior to holding a final hearing under its Rule 29.³²¹ The IJC's offer of opportunity for interested persons to provide comments on the findings of the board helps it to obtain public input and builds public support for its work.³²²

³¹⁶ *Ibid.*

³¹⁷ *Ibid.*

³¹⁸ *Ibid.*

³¹⁹ *Ibid* at rule 28 (1). The Commission may appoint a board or boards, composed of qualified persons to conduct on its behalf investigations and studies that may be necessary or desirable and to report to the Commission regarding any questions or matters involved in the subject matter of the reference.

³²⁰ *Ibid* at rule 28 (2). Such board ordinarily will have an equal number of members from each country.

³²¹ *Ibid* at rule 28 (3). The Commission ordinarily will make copies of the main or final report of such board or a digest thereof available for examination by the Governments and interested persons prior to holding the final hearing or hearings referred to in Rule 29.

³²² *Ibid.*

Rule 29 (1)-(9) provides that the hearings are publicised in both countries in areas where persons interested in the subject-matter of the reference reside.³²³

Finally, Rule 29 (1) provides for the IJC to prepare a report on the reference to the governments of the United States and Canada after the hearing.³²⁴ The report might be based on unanimity – in which case the IJC presents a joint report, or a disagreement – in which case the IJC presents a majority and a minority report, or an equal split on national lines – in which case the IJC presents separate reports to their respective governments.³²⁵ The IJC issued separate reports only once, in the Waterton and Belly Rivers Reference.³²⁶ The fact that there has been only a single

³²³ *Ibid* at rule 29 (1)–(9), which provides that (1) [a] hearing or hearings may be held whenever in the opinion of the Commission such action would be helpful to the Commission in complying with the terms of a reference. Subject to any restrictions or exceptions which may be imposed by the terms of the reference, a final hearing or hearings shall be held before the Commission reports to Governments in accordance with the terms of reference.

(2) The time, place and purpose of the hearing or hearings on a reference shall be fixed by the Chairmen of the two sections.

(3) The secretaries shall forthwith give written notice of the time, place and purpose of the hearing or hearings to each Government and to persons who have advised the Commission of their interest. Unless otherwise directed by the Commission, the secretaries shall also cause such notice to be published in the *Canada Gazette*, the *Federal Register*, on the Commission website and in two newspapers, published one in each country and circulated in or near the localities which, in the opinion of the Commission, are most likely to be interested in the subject matter of the reference.

(4) All hearings shall be open to the public, unless otherwise determined by the Commission.

(5) At a hearing, the Governments and persons interested are entitled to present, in person or by counsel, oral and documentary evidence and argument that relevant and material to any matter that is within the published purpose of the hearing.

(6) The presiding chairman may require that evidence be under oath.

(7) Witnesses may be examined and cross-examined by the Commissioners and by counsel for the Governments and the Commission. With the consent of the presiding chairman, counsel for any interested person may also examine or cross-examine witnesses.

(8) The Commission may require further evidence to be given and may require printed briefs to be submitted at or subsequent to the hearing.

(9) A verbatim transcript of the proceedings at the hearing shall be prepared.

³²⁴ *Ibid* at rule 29 (1).

³²⁵ *Ibid*. See the *Boundary Waters Treaty*, *supra* note 47 at art IX, where it provides, *inter alia*, that: such reports of the Commission shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an arbitral award. The Commission shall make a joint report to both Governments in all cases in which all or a majority of the Commissioners agree, and in case of disagreement the minority may make a joint report to both Governments, or separate reports to their respective Governments. In case the Commission is evenly divided upon any question or matter referred to it for report, separate report shall be made by the Commission on each side to their own government.

³²⁶ *Ibid* at 29 (1). See the *Boundary Waters Treaty*, *ibid* at art IX. See Bloomfield & Fitzgerald, *supra* note 193 at 117-180, who note that in the history of the IJC, separate reports have been presented only once for a referral in

disagreement on national lines in over fifty references to the IJC represents consensus building between its United States and Canadian sections in the IJC's exercise of its Reference Jurisdiction mandate.

The IJC's Flathead Report emphasized the important contribution of public participation in the investigation by conducting public hearings on three occasions to obtain public input as provided below.

The work of the Study Board and the Commission has also been subjected to public discussion on three occasions. At the beginning of the study, public hearings on the proposed Plan of Study were conducted at Kalispell, Montana and Fernie, British Columbia. Upon completion of the Board's report in July 1988, public meetings were held in Cranbrook, British Columbia and Kalispell, Montana to explain the Board's findings and the Commission's process. The Commission returned to these areas in September for public hearings and received some fifty oral presentations. In addition, a large number of written submissions have since been received from all over North America. Only the submission of the Company explicitly supported the proposal. The findings of the International Joint Commission, (...) [were based on] on the information placed before it from the Board's report, the public consultation procedure and its own understanding of the issues in the context of the Boundary Waters Treaty and the Reference.³²⁷

1955, when the IJC failed to reach an agreement regarding the use and apportionment of the waters of the Waterton and Belly Rivers which rise in Montana and flow into Alberta. Additionally, they note that in the Waterton and Belly Rivers Reference, Canada, the downstream state, wished to construct works that would allow the use of the entire flow of the rivers by arguing that due to the mountainous terrain in the United States, upstream, the water could not be economically used there. It was argued on behalf of Canada that Article II of the BWT did not apply when nature curtailed actual diversion. Furthermore, Article II did not offer either party the property of the water of any stream. It simply reserved the right to divert water in a stream when such diversion was possible while offering a remedy in case there was damage. The Counsel acting for the United States argued that if Canada was to use all the waters of the rivers, it would be equivalent to an appropriation and not apportionment as stated in the terms of the reference. Furthermore, he argued that the fact that the United States' project for the use of the water was not economically viable was not Canada's concern. Besides, under the BWTs Article II, and the now "infamous" Harmon Doctrine, a country had exclusive jurisdiction of the part of international waters in its own territory and it was not limited by any international servitude. This was a difficult and contentious issue and it came as no surprise when the two sections of the Commission failed to reach an agreement on recommendations to be sent to the governments of Canada and the United States, and in the end, each section reported separately to its own government.

³²⁷ The IJC, "The Flathead Report", *supra* note 285 at 5.

What has made the process factor a success is that it allows the IJC to use flexibility to publicise references only in localities where the public will be concerned by the subject-matter of the investigations and to encourage their input into the investigations; and to constitute boards of experts as appropriate for specific investigations under references.

3.5.3 The IJC's Commissioners' Independence and Impartiality Factor

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is its Commissioners' independence and impartiality. Article XII of the BWT provides, *inter alia*, that:

Each Commissioner upon the first joint meeting of the Commission after his appointment, shall, before proceeding with the work of the Commission, make and subscribe a solemn declaration in writing that he will faithfully and impartially perform the duties imposed upon him under this treaty, and such declaration shall be entered on the records of the proceedings of the Commission.³²⁸

³²⁸ *The Boundary Waters Treaty*, *supra* note 47 at art XII, which provides that: The International Joint Commission shall meet and organize at Washington promptly after the members thereof are appointed, and when organized the Commission may fix such times and places for its meetings as may be necessary, subject at all times to special call or direction by the two Governments. Each Commissioner upon the first joint meeting of the Commission after his appointment, shall, before proceeding with the work of the Commission, make and subscribe a solemn declaration in writing that he will faithfully and impartially perform the duties imposed upon him under this treaty, and such declaration shall be entered on the records of the proceedings of the Commission. The United States and Canadian sections of the Commission may each appoint a secretary, and these shall act as joint secretaries of the Commission at its joint sessions, and the Commission may employ engineers and clerical assistants from time to time as it may deem advisable. The salaries and personal expenses of the Commission and of the secretaries shall be paid by their respective Governments, and all reasonable and necessary joint expenses of the Commission, incurred by it, shall be paid in equal moieties by the High Contracting Parties. The Commission shall have power to administer oaths to witnesses, and to take evidence on oath whenever deemed necessary in any proceeding, or inquiry, or matter within its jurisdiction under this treaty, and all parties interested therein shall be given convenient opportunity to be heard, and the High Contracting Parties agree to adopt such legislation as may be appropriate and necessary to give the Commission the powers above mentioned on each side of the boundary, and to provide for the issue of subpoenas and for compelling the attendance of witnesses in proceedings before the Commission. The Commission may adopt such rules of procedure as shall be in accordance with justice and equity, and may make such examination in person and through agents or employees as may be deemed advisable.

The Commissioners, by taking this oath of impartiality, accept their duty to deliberate and make unbiased recommendations to the two governments.

How were the Commissioners independence and impartiality demonstrated under the Flathead Reference? They were demonstrated by the IJC's appointment of boards of experts who relied on scientific principles in their investigations and report to the IJC.

To respond to the [Flathead] Reference, the Commission established a study board, the Flathead River International Study Board [Board], to undertake a technical assessment as a basis for the Commission's deliberations. This Board included experts of various disciplines, and consisted of an equal number of members from the United States and Canada.³²⁹

The importance of this is that it demonstrated that the IJC's investigation and report was independent and impartial and not inappropriately influenced by governments. The thesis will further explain the IJC's use of boards of experts and scientific principles in the next section that deals with the use of boards and experts in joint fact-finding factor.

What has made the independence and impartiality factor a success is that it allows the IJC to carry out its mandate without governmental interference, and without bias as it investigates and

³²⁹ The IJC, "The Flathead Report", *supra* note 285 at (3-4). The IJC also clarified the mandate of the Board as: It [the Board] is charged initially with examining and reporting on: the present state of water quality and water quantity of the Flathead River at the border (including fluctuations);

- current water uses (including water dependent uses such as recreation) in the Flathead River basin together with their effects on present water quality and quantity;
- the nature, location and significance of fisheries currently dependent on the waters of the Flathead River and its tributaries, Howell and Cabin Creek;
- effects on the present state of water quality and water quantity of the Flathead River at the border which would result from the construction, operation and post-mine reclamation of the proposed Cabin Creek coal mine;
- effects on current water uses (including water dependent uses such as recreation) which would result from the identified effects on the present state of water quality and water quantity at the border; and
- effects which the construction, operation and post-mine reclamation of the proposed Cabin Creek coal mine would have on the habitat for fisheries in Canada in the waters of the Flathead River and its tributaries Howell and Cabin Creeks, and consequent effects on fisheries in the United States.

report on references? It allows the IJC Commissioners to investigate referrals and make their recommendations based on relevant scientific evidence free from political interests and national affiliations. This ensures that the report that the IJC issues to the governments on completing its investigations under references is as objective as possible.

3.5.4 *The Use of Boards and Experts in Joint Fact-finding Factor*

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the use of boards and experts in joint fact-finding. This is provided under the IJC Rule 28 (1)-(3) as:

Rule 28 (1) The Commission may appoint a board or boards, composed of qualified persons to conduct on its behalf investigations and studies that may be necessary or desirable and to report to the Commission regarding any questions or matters involved in the subject matter of the reference.

(2) Such board ordinarily will have an equal number of members from each country.

(3) The Commission ordinarily will make copies of the main or final report of such board or a digest thereof available for examination by the Governments and interested persons prior to holding the final hearing or hearings referred to in Rule 29.³³⁰

The use of boards and experts in joint fact-finding factor is seen in operation when the IJC constitutes different boards of experts as appropriate for its joint fact-finding investigations for each reference. This demonstrates flexibility because the IJC is not constrained by the rules to use the same board of experts for all of its investigations. As such, the boards of experts the IJC constitutes as part of its investigations for references are not permanent departments within the IJC. Rather, it is the subject-matter of the reference that dictates the type of boards that the IJC constitutes for its investigations for specific references.

³³⁰ The IJC, "Rules of Procedure", *supra* note 222 at rule 28 (1)-(3).

The IJC sees the use of boards and experts in joint fact-finding as an important aspect of its investigations through its statement below.

The Commission recognizes that binational joint fact-finding builds an important and often essential foundation for the achievement of consensus on appropriate actions. Joint fact-finding normally takes place within the Commission's advisory and regulatory boards, whose members are drawn equally from both countries and who are recognized as having the range of expertise required to address an issue.³³¹

How did the Flathead Reference provide for the use of boards in joint fact-finding? The IJC's mandate to use boards for its Flathead Reference investigations was provided in the reference as: "In addition, the Commission shall utilize the services of specially qualified persons and other resources in Canada and the United States."³³² This allowed the IJC to use the services of experts from both countries and constitute relevant boards as part of its investigation.

The IJC's Flathead Report confirmed its use of boards of experts by providing, *inter alia* that:

To respond to the [Flathead] Reference, the Commission established a study board, the Flathead River International Study Board [Board], to undertake a technical assessment as a basis for the Commission's deliberations. This Board included experts of various disciplines, and consisted of an equal number of members from the United States and Canada.³³³

The Flathead Reference's Board [the Board] started its work in April 1985 and established a number of technical committees to assist it.³³⁴ The Board comprised experts from both countries and had the mandate to undertake its investigation and make its findings available in a report to

³³¹ The IJC, "The IJC and the 21st Century", *supra* note 273 at 9.

³³² The IJC, "The Flathead Reference", *supra* note 282 at 1-3.

³³³ The IJC, "The Flathead Report", *supra* note 285 at 3-4.

³³⁴ *Ibid.*

the IJC.³³⁵ Experts brought to the boards the technical knowledge and the scientific expertise that were required for investigations into the complex subject-matter of the Flathead Reference. For example, the experts used in the Flathead Reference investigations ensured that the report the IJC issued after its investigations, was based on scientific and technical data that were objective and free of political bias and governmental influences.

Additionally, the Flathead Reference called on the IJC's appointed experts to apply the best science or technical data available by providing that:

In the conduct of its investigation and the preparation of its report, the Commission shall make full use of information and technical data heretofore available or which may become available in either country during the course of its investigations. In addition, the Commission shall utilize the services of specially qualified person's and other resources in Canada and the United States.³³⁶

The IJC, in an effort to use experts and scientific data as part of its Flathead Reference investigations, constituted a Board, appointed four technical committees, a special subcommittee, and a task force to describe the existing environmental conditions and water uses in the study area, and to assess the potential changes to those conditions that could develop as a result of the development, operation, and reclamation of the proposed mine. The use of boards and experts in joint fact-finding factor allowed the IJC to conduct a thorough investigation and this allowed the IJC to deal with the Flathead Reference's complex subject-matter.

Noah D Hall, notes that the IJC's reports are known for using "the best available science, produced by technical experts free of political bias."³³⁷ B. Timothy Heinmiller, adds that "the

³³⁵ *Ibid* at 19.

³³⁶ *Ibid*.

³³⁷ Noah D Hall, "Oil and Freshwater Don't Mix: Transnational Regulation of Drilling in the Great Lakes" (2011) 38 *Boston College Env'tl Affairs L Rev* at 314 [Hall, "Oil and Freshwater"].

[scientific] research [by experts who are members of boards] helps to frame water management issues in a reasonable and objective manner and [the IJC's subsequent] (...) recommendations help to provide a basis for political consensus.”³³⁸

What has made the use of boards and experts in joint fact-finding factor a success? Its success is because it allows the IJC to have the flexibility to constitute boards of experts as appropriate for specific references. Experts use science to investigate complex issues in references and report on it to the IJC's Commissioners to assist them to understand fully the issues involved in a reference.

³³⁸ Heinmiller, *supra* note 215 at 1506.

3.5.5 Forum for Public Participation Factor

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the forum for public participation in its investigations. This covers aspects of the process factor that this thesis earlier discussed. Article XII of the *Boundary Waters Treaty* requires the Commission, in any proceeding, inquiry or matter within its jurisdiction, to assure that "all parties interested therein shall be given convenient opportunity to be heard."³³⁹ The IJC confirms that public input form an important part of its investigation under references, and it provides opportunities for the public to "exchange views, knowledge and information" as part of its investigations.³⁴⁰ Additionally, Rule 29 (4) of the IJC Rules provides that there will be a hearing under references that is open to the public,³⁴¹ while Rule 29 (5) provides an opportunity for interested parties to provide oral and documentary evidence.³⁴² The flexibility element of the factor is seen when the IJC publishes notices for public hearings not in all localities but only in localities that are within the area of a particular reference to allow interested parties to participate in the investigations. This is provided under Rule 29 (3) as:

The secretaries shall forthwith give written notice of the time, place and purpose of the hearing or hearings to each Government and to persons who have advised the Commission of their interest. Unless otherwise directed by the Commission, the secretaries shall also cause such notice to be published in the *Canada Gazette*, the *Federal Register*, on the Commission website and in two newspapers, published one in each country and circulated in or near the localities which, in the opinion of the Commission, are

³³⁹ *The Boundary Waters Treaty*, *supra* note 47 at art XII.

³⁴⁰ The IJC, "The IJC and the 21st Century", *supra* note 273 at 9. The IJC provides that: In practice, the Commission has always emphasized the importance of public participation and advice. The Commission provides a forum for the public to participate with governments in developing means of addressing environmental issues. Government officials can meet on neutral ground to discuss and coordinate policies and programs. In much the same way, opportunities are created for exchanges of views, knowledge and information among all those interested in an issue, which again furthers the development of understanding and consensus.

³⁴¹ The IJC, "Rules of Procedure" *supra* note 222 at rule 29 (4).

³⁴² *Ibid* at rule 29 (5).

most likely to be interested in the subject matter of the reference.³⁴³

The IJC used public participation as part of its investigations and report for the Flathead Reference.³⁴⁴ The IJC's Flathead Report notes this as:

The work of the Study Board and the Commission has also been subjected to public discussion on three occasions. At the beginning of the study, public hearings on the proposed Plan of Study were conducted at Kalispell, Montana and Fernie, British Columbia. Upon completion of the Board's report in July 1988, public meetings were held in Cranbrook, British Columbia and Kalispell, Montana to explain the Board's findings and the Commission's process. The Commission returned to these areas in September for public hearings and received some fifty oral presentations. In addition, a large number of written submissions have since been received from all over North America. Only the submission of the Company explicitly supported the proposal.³⁴⁵

The implications of the above are; first, that the IJC used public views in its investigations for references but only in areas that are most likely to be impacted by the question or matter, raised in the reference, indicating flexibility in publicity for the impending reference. Interestingly, the IJC also received written submissions from outside the earmarked areas and "from all over North America" indicating flexibility that not only allows for submissions from parties directly affected by the reference, but also from concerned individuals not directly affected.³⁴⁶ Second, public participation is sought at the start of the investigations, and upon the receipt of the Board's report to explain the findings. This also confirms the IJC's own Rules 29 (1)-(9) which provides that public hearings form an important part of investigations into references.³⁴⁷

³⁴³ *Ibid* at rule 29 (3).

³⁴⁴ The IJC, "The Flathead Report", *supra* note 285 at 5.

³⁴⁵ *Ibid* at 5.

³⁴⁶ The IJC, "Rules of Procedure" *supra* note 222 at rule 29 (5).

³⁴⁷ *Ibid* at rule 29 (1)-(9).

What makes the forum of public participation factor a success is that it allows the IJC to rely on flexibility to publicise references in areas where the citizens will be concerned about the subject matter of the investigation; and to encourage them to participate in it by producing oral or documentary evidence. This not only allows the public to participate in its investigations but it also allows them to be aware of the nature of the IJC's investigations under references.

3.5.6 The IJCs Non-Binding Recommendations Factor

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the IJC's non-binding recommendations for references. This is covered under Article IX of the *Boundary Waters Treaty* which provides that reports from referrals "shall not be regarded as [a] decision" and "shall in no way have the character of an arbitral award."³⁴⁸ The making of non-binding recommendations under references provides the IJC with flexibility and unconstrained freedom to make recommendations as objectively, independently, and impartially as possible, while leaving it to the two governments to decide whether or not to follow up on them. The recommendations are usually "technical recommendations based on the special, scientific expertise of the IJC Commissioners."³⁴⁹ The non-binding nature of recommendations "helps to ensure that the IJC's views are accepted" by the governments³⁵⁰ and they have "often laid the foundation for Canada-United States cooperation initiatives on major issues."³⁵¹

³⁴⁸ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

³⁴⁹ Parrish, "Trail Smelter Déjà Vu", *supra* note 235 at 418-419.

³⁵⁰ *Ibid.*

³⁵¹ Tarlock, "The Great Lakes", *supra* note 266 at 1012. The author provides that: Reference reports [are important and] have often laid the foundation for Canada-United States cooperation initiatives on major issues or at least provided broad, relatively neutral analyses of issues that are superior to studies subject to the immediate pressures of national politics.

With respect to the IJC's Flathead Reference Report, it concluded that the proposed mine's impacts on boundary waters were either inconclusive or did not pose significant harm.³⁵² It also acknowledged the lack of accurate and up-to-date data that made it difficult to make definitive conclusions on the impact of the proposed mine.³⁵³ On the basis of the Board and Committee's reports, the IJC made the following recommendations to the two governments that "can ensure that the provisions of Article IV of the *Boundary Waters Treaty* are honoured in the matter of the proposed coal mine at Cabin Creek in British Columbia:"³⁵⁴

- (1) the mine proposal as presently defined and understood not be approved;
- (2) the mine proposal not receive regulatory approval in the future unless and until it can be demonstrated that:
 - (a) the potential transboundary impacts identified in the report of the Flathead River International Study Board have been determined with reasonable certainty and would constitute a level of risk acceptable to both Governments; and,
 - (b) the potential impacts on the sport fish populations and habitat in the Flathead River system would not occur or could be fully mitigated in an effective and assured manner; and,
- (3) the Governments consider, with the appropriate jurisdictions, opportunities for defining and implementing compatible, equitable and sustainable development activities and management strategies in the upper Flathead River basin.³⁵⁵

The IJC's recommendations showed that their most significant concern about the proposed mine was its effect on the "bull trout populations and generally on the special status of the United States portion of the basin."³⁵⁶ While the basis of the Flathead Reference was pollution, the substance of the IJC's recommendations was a concern of the pollution's impact on the bull trout fish in the United States. What has made the IJC's issuance of non-binding recommendations

³⁵² The IJC, "The Flathead Report", *supra* note 285 at 5.

³⁵³ *Ibid.*

³⁵⁴ *Ibid* at 11.

³⁵⁵ *Ibid.*

³⁵⁶ Bankes, *supra* note 186 at 5.

factor a success is that it allows the IJC to base on objective scientific evidence in making recommendations while leaving it to the governments to decide on their implementation.

3.6 Conclusion – the IJC’s Use of Flexibility Under its Reference Jurisdiction and the factors that assists its use

Chapter three draws the following conclusions underlying the IJC’s successful use of flexibility under its Reference Jurisdiction and the factors that have aided its use. First, flexibility is inferred from the provisions of the BWT and the IJC’s Rules of Practice. Second, the factors that have assisted the IJC’s use of flexibility include; the IJC’s broad mandate, the IJC’s process, the IJC’s Commissioners’ independence and impartiality, the use of boards and experts in joint fact-finding, the forum for public participation, and the IJC’s non-binding recommendations.

3.7 How does the VBA compare to the IJC and its Use of the Reference Jurisdiction?

This section examines the VBA to assess whether or not it includes an IJC-type structure. Additionally, it examines whether the VBA’s IJC-type structure is provided with a Reference Jurisdiction-type powers, and whether it uses flexibility in its exercise. The VBA as presently constituted has three organs that appear to bear the closest similarity to the IJC and how it exercises its powers. They are; the Council of Ministers in Charge of Water Resources in the State Parties in the VRB (the Council),³⁵⁷ the Forum of Stakeholders in the VRB (the Forum),³⁵⁸ and the Committee of Experts (the Committee).³⁵⁹ The thesis examines them in turn to examine whether they are similar to an IJC-type structure and its Reference Jurisdiction powers.

³⁵⁷ *VBA Statutes*, *supra* note 84 at art 4.

³⁵⁸ *Ibid.*

³⁵⁹ *Ibid.*

3.7.1 *The Council of Ministers in Charge of Water Resources*

As described in Part 2.2.1, the Council is one of the permanent organs of the VBA. Article 6 of the *VBA Statutes*, describes the Council’s mandate, its composition, and its responsibilities.³⁶⁰

The Council comprises Ministers responsible for Water Resources in the State Parties or their legally appointed representatives.³⁶¹ The Council exercises responsibility over all the organs of the VBA.³⁶² However, “the Council may expressly delegate some of its powers to the Executive Director.”³⁶³

Arguably, the Council is the closest of the VBA’s organs to the IJC’s Reference Jurisdiction as it oversees all water-related projects submitted to the VBA, by assessing them to decide whether or not to authorize them. However, while the Council has the authority to “adopt its own internal rules and procedures in the performance of its mandate,”³⁶⁴ unlike the IJC’s exercise of its Reference Jurisdiction mandate, it has so far not specified the nature of the rules and procedures it uses to assess the viability of water-based projects submitted to it for approval. Additionally, unlike the IJC’s exercise of its Reference Jurisdiction, the Council’s mandate does not specify whether it has the authority to engage stakeholders in its decisions, and whether it could constitute and use various boards of experts in research and data collection to aid the decisions

³⁶⁰ *Supra* note 129.

³⁶¹ *Ibid* at art 4.

³⁶² *Ibid*.

³⁶³ *Ibid*. See *VBA Statutes* at art 9. The Executive Director, is, *inter alia*, “the head of the administration of the [VBA] and shall be responsible for the management of the assets and the staff of the [VBA] and shall have supervisory power over all the staff and activities of the [VBA].

³⁶⁴ *Ibid*.

regarding submitted projects.³⁶⁵ The Council's mandate does not indicate that it uses flexibility in the exercise of its mandate.

Another difference in the Council's mandate from that of the IJC's Reference Jurisdiction is that the former's mandate does not specify whether or not its decisions are "independent of instruction or management by their respective governments (...) [which is a serious limitation, as the provision of such] independence contributes to the effectiveness of the IJC."³⁶⁶ The Council's composition also undermines its independence since its members are all Ministers of State Parties making them part of the governments of their respective countries, and this casts doubt on Council's members' ability to act independently from governmental influence and interference.

The thesis later will recommend in Chapter four that the VBA's decision making process could be enhanced by incorporating an IJC-type Commission with a Reference Jurisdiction-type

³⁶⁵ Wolf & Newton, "The International Joint Commission", *supra* note 137 at 198-199. See *The Boundary Waters Treaty*, *supra* note 47 at art XII. The International Joint Commission shall meet and organize at Washington promptly after the members thereof are appointed, and when organized the Commission may fix such times and places for its meetings as may be necessary, subject at all times to special call or direction by the two Governments. Each Commissioner upon the first joint meeting of the Commission after his appointment, shall, before proceeding with the work of the Commission, make and subscribe a solemn declaration in writing that he will faithfully and impartially perform the duties imposed upon him under this treaty, and such declaration shall be entered on the records of the proceedings of the Commission. The United States and Canadian sections of the Commission may each appoint a secretary, and these shall act as joint secretaries of the Commission at its joint sessions, and the Commission may employ engineers and clerical assistants from time to time as it may deem advisable. The salaries and personal expenses of the Commission and of the secretaries shall be paid by their respective Governments, and all reasonable and necessary joint expenses of the Commission, incurred by it, shall be paid in equal moieties by the High Contracting Parties. The Commission shall have power to administer oaths to witnesses, and to take evidence on oath whenever deemed necessary in any proceeding, or inquiry, or matter within its jurisdiction under this treaty, and all parties interested therein shall be given convenient opportunity to be heard, and the High Contracting Parties agree to adopt such legislation as may be appropriate and necessary to give the Commission the powers above mentioned on each side of the boundary, and to provide for the issue of subpoenas and for compelling the attendance of witnesses in proceedings before the Commission before the Commission. The Commission may adopt such rules of procedure as shall be in accordance with justice and equity, and may make such examination in person and through agents or employees as may be deemed advisable.

³⁶⁶ Wolf & Newton, "The International Joint Commission", *ibid* at 199.

mandate where the appointed Commissioners are independent and impartial in the way they investigate and approve projects in the VRB with transboundary implications.

3.7.2 The Forum of Stakeholders

The Forum is another organ of the VBA. The question is: is the Forum similar to the IJC's use of its Reference Jurisdiction? The Forum is a support mechanism for the VBA, and as such does not "qualify" as an IJC-type structure or a Reference Jurisdiction-type mandate. For example, the Forum is under the control of the Council, and this deprives it of its ability to act independently and impartially from governmental influence.

The Forum's contribution to the VBA is under the control of the Council and by implication the VRB governments as well. This is because the Council comprises Ministers in charge of water resources in the VRB's riparian nations and subject to governmental control and influence. In contrast, the citizens' of the United States and Canada's contribution to the IJC's investigations under references are made independently without the influence of either the governments' or the IJC's Commissioners. In Chapter four, the thesis will recommend that any reformation of the VBA should incorporate the contributions of concerned citizens that are made independently of the VRB's governments and the VBA's IJC in all investigations conducted by the VBA's IJC.

3.7.3 The Committee of Experts

Another of the VBA's organs is the Committee. Article 8 of the *VBA Statutes* covers the Committee.³⁶⁷ The Committee is provided with the mandate to prepare the meetings of the

³⁶⁷ *VBA Statutes*, *supra* note 84 at art 8. Article 8 of the *VBA Statutes* provides that:

Council, and also support the activities of the Executive Directorate.³⁶⁸ The Committee like the Forum is under the direct control of the Council, and by implication the State Parties, and does not enjoy an independent mandate. The Committee lacks the structure of the IJC and it does not have a Reference Jurisdiction-type mandate.

3.8 Conclusion

The review of the VBA's organs indicates that the VBA, as presently constituted, does not incorporate an IJC-type structure that is equipped with a Reference Jurisdiction-type mandate. None of the VBA's organs has either the flexibility or applies the factors that have aided the IJC's successful use of flexibility in relation to its Reference Jurisdiction. The thesis recommends that any attempt at reforming the VBA should incorporate them to assist it to better manage the water conflicts in the VRB to the benefit of all the riparian nations.

-
- (1) The Committee of Experts, hereinafter referred to as "the Committee" shall consist of two representatives each from a State party, one of whom shall at least belong to the National Focal Bodies.
 - (2) The Committee shall be responsible for:
 - (c) Preparation of meetings of the Council;
 - (d) Supporting the Executive Directorate in the execution of its functions especially in its relationships with the National Focal Bodies and the other actors operating in the basin;
 - (3) The Executive Director shall convene the meetings of the Committee in consultation with the President of the Council as and when necessary;
 - (4) The Committee shall develop its own internal rules and procedure shall be submitted to the Council for approval.

³⁶⁸ *Ibid* at art 9. The Executive Directorate is described, *inter alia*, as "the executive body of the [VBA] and shall enforce the decisions of the Council and report regularly on their implementation."

Chapter 4: Recommending Measures to Reform the VBA to assist it to better Manage the Water Conflict in the VRB

4.1 Reforming the VBA

This thesis has noted that the creation of the VBA was a step in the right direction as the riparian States in the VRB came together to create a legal regime, to manage their water resources to prevent and address conflicts for their mutual benefit. However, the VBA, as presently constituted, is not equipped to successfully perform its mandate and address the water conflicts in the VRB. This thesis has shown that equipping the VBA with an independent fact-finding body that is equipped with a Reference Jurisdiction-type mandate is what is needed to assist the VBA to fulfill its mandate. The thesis also made other observations on how the VBA could be improved to better manage and address water conflicts in the VRB. On the basis of the analysis in this thesis, Chapter four makes specific recommendations on how to reform the VBA, to better equip it to address the water conflict in the VRB.

4.2 An Independent Water Commission for the VRB

As mentioned earlier,³⁶⁹ the analysis in this thesis has shown that one problem with the VBA, is that it lacks an independent and impartial body that is free of governmental interference in the exercise of its mandate. The three organs of the VBA, the Council, the Forum, and the Committee, which bear the closest similarity to independent bodies, are all subject to governmental interference in the exercise of their mandate, and, are therefore, not truly

³⁶⁹ See Part 2.3.2.5 where a lack of an independent fact-finding body is described as one of the weaknesses of the VBA.

independent. Yet, an independent body, similar to the IJC and with a Reference Jurisdiction-type power to investigate and report on conflicts is important for addressing the water conflicts in the VRB. Therefore, one way to deal with this problem is for the VRB to reform the VBA into an independent body similar to the IJC. To this end, the thesis recommends that the State Parties in the VRB amend the *VBA Statutes* and the *VBA Convention*, to reform the VBA into an IJC-type structure. To achieve this, the thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* create a VBA IJC-type body, with sections in all the State capitals in the VRB, with offices for Benin in Cotonou, Burkina Faso in Ouagadougou, Cote d'Ivoire in Abidjan, Ghana in Accra, Mali in Bamako, and Togo in Lome. The question is; why is the thesis recommending the creation of six VBA IJC offices and not just one office to serve the whole of the VRB? The thesis acknowledges that maintaining six offices will be a strain on the VBA's financial resources, but it is nonetheless necessary to maintain a local VBA IJC office in each of the VRB's countries to serve as a resource centre for each country, and to provide a presence for the VBA's IJC in each country. Additionally, the amendments to the *VBA Statutes* and the *VBA Convention* should permit each of the six State Parties to appoint two full-time Commissioners to their respective sections of the VBA's version of an IJC (the "VBA's IJC"). The thesis recommends the appointment of two Commissioners and not three Commissioners each as is the case with the IJC. The appointment of three Commissioners for each of the six VBA's IJC sections would have totalled eighteen, making the VBA's IJC, an unwieldy body.

4.2.1 Staffing the VBA's IJC

Like the IJC, the thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* should provide for each section of the VBA's IJC, to be allowed to appoint as many

support staff as is necessary to allow the Commissioners to perform their duties effectively. This thesis further recommends that the *VBA Statutes* and the *VBA Convention* amendments should permit each section of the VBA's IJC to appoint its own chairperson from among its two Commissioners. The importance of requiring each section of the VBA's IJC to be adequately staffed is that it will ensure that each section of the VBA's IJC is provided with the resources that it requires to effectively perform its mandate.

4.2.2 Funding for the VBA's IJC

The United States and Canada, fund their own sections of their IJC. This has worked for over a hundred years for both nations. However, the thesis recommends that the VBA's IJC should not follow this method of funding. Rather than the VRB State Parties funding their own sections of their VBA's IJC, the thesis recommends that the VRB's nations should follow the provisions on the funding for the VBA, as provided under Article 11 of the *VBA Statutes*. Article 11 provides that:

- (1) The Council shall approve the annual budget of the Authority and the budget shall be in a convertible currency.
- (2) The budget of the Authority shall be made up of:
 - a) Subscriptions of State Parties,
 - b) Any other funds allocated by State Parties,
 - c) Subventions, gifts, grants and loans granted to the Authority,
- (a) Any other money accruing to the Authority in the performance of its functions.
- (3) The financial resources of the Authority shall be determined by the Council.
- (4) The State Parties shall be obliged to pay regularly their contribution to the annual budget of the Authority.
- (5) In the event of a default of a State Party to pay its contribution that State Party shall be liable to sanctions as shall be provided in the financial regulations.

(6) All the expenses of the Authority, including those of the specialized bodies of the Executive Directorate, shall be approved by the Council and chargeable to the annual budget, under conditions that shall be set forth in the financial regulations.³⁷⁰

Based on the VBA's funding provisions under Article 11, the thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* should provide that each section of the VBA's IJC should be funded from the VBA's annual budget. The importance of the funding of the VBA's IJC sections from the VBA's annual budget is that, first, it allows for continuity in the way the VBA funds all of its organs and activities. Second, it prevents the occurrence of a situation where a VRB State Party may refuse to fund its section of the VBA's IJC for whatever reason.

4.3 The VBA's IJC Rules of Procedure

The thesis recommends that the *VBA Statutes* and *VBA Convention* should be amended to allow VBA's IJC to create its own Rules of Procedure (VBA Rules) to facilitate its activities. The thesis recommends that the VBA's IJC could adopt similar rules as the IJC.

4.3.1 The Appointment of Chairpersons for the VBA's IJC Sections

As already recommended,³⁷¹ the VBA Rules should mandate for the appointment of a chairperson for each of the six sections of the VBA's IJC. The VBA Rules should also mandate for each chairperson to act as a chair for meetings in his or her respective section of the VBA's

³⁷⁰ *VBA Statutes*, *supra* note 84 at art 11.

³⁷¹ See Part 4.2.1.

IJC. This is important as it will allow the chairpersons to oversee the setting of agendas and the execution of activities for their respective sections.

4.3.2 Permanent Offices for the VBA's IJC Sections

The VBA Rules should mandate for the establishment of permanent offices for the respective sections of the VBA's IJC in their respective state capitals. The importance of these offices is that they will provide for space, equipment and materials that are necessary for all sections of the VBA's IJC to effectively carry out their mandate. The offices will also serve as resource centres for citizens to visit for information on the activities of the various VBA's IJC sections, and for the VBA's IJC as a whole.

4.3.3 The Appointment of Secretaries for the VBA's IJC Sections

Like the IJC Rules, VBA Rules should also mandate for each VBA's IJC section to appoint a secretary for its section. The duties and responsibilities of the VBA's IJC secretaries should be mandated to be similar to those of the IJC Rules.³⁷² However, unlike the IJC Rules that mandate

³⁷² The IJC, "Rules of Procedure" *supra* note 222 at rule 4 (1)-(4). Rule 4 (1)-(4) provides that:

for the two secretaries to act as joint secretaries for all the meetings of the Commission,³⁷³ the thesis recommends that only the secretary of the section of the VBA's IJC where the VBA's IJC meeting takes place, should act as the secretary for the meeting. The thesis later will explain where the VBA's IJCs annual meeting should take place. Having one secretary for the VBA's IJC meetings is better than having all six secretaries to act as joint secretaries for meetings, which would be cumbersome.

Like the IJC, the VBA's IJC secretaries shall receive and file all projects submitted to their section of the VBA's IJC and shall proceed to number all such projects in numerical order.³⁷⁴

The number assigned to a project, subsequently becomes the main file number for all papers and

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4. 1. The secretaries shall act as joint secretaries at all meetings and hearings of the Commission. The secretary of the section of the Commission of the country in which a meeting or hearing is held shall prepare a record thereof and each secretary shall preserve an authentic copy of the same in the permanent offices of the Commission.
 2. Each secretary shall receive and file all applications, references and other papers properly presented to the Commission in any proceeding instituted before it and shall number in numerical order all such applications and references; the number given to an application or reference shall be the primary file number for all papers relating to such application or reference. Each secretary shall forward to the other for filing in the office of the other copies of all official letters, documents, records or other papers received by that secretary or filed in that secretary's office, pertaining to any proceeding before the Commission, to the end that there shall be on file in each office either the original or a copy of all official letters and other papers, relating to the said proceeding. The VBA Rules should mandate each secretary of a section of the VBA IJC to make copies of all projects it receives to their secretaries of their other sections for their files. The importance of this is that it keeps all sections of the VBA IJC abreast with information on projects submitted to other sections.
 3. Each secretary shall also forward to the other for filing in the office of the other copies of any letters, documents or other papers received by that secretary or filed in that secretary's office which are deemed by that secretary to be of interest to the Commission.
 4. The secretary of each section of the Commission is directed to provide all information (including, without limitation financial information, employment information, litigation/disputes, contractual information, briefing notes and reports "the Information") to all three Commissioners of each respective section and conduct their duties with the utmost good faith, equally, to all three Commissioners. The secretary of each section shall also facilitate the provision of information by staff of their respective section office to all Commissioners equally and each staff member, advisor, and consultant are directed to provide to all three Commissioners of each respective section all Information and conduct their duties with the utmost good faith, equally, to all three Commissioners.

³⁷³ *Ibid* at rule 4 (1).

³⁷⁴ *Ibid* at rule 4 (2).

submissions regarding the project.³⁷⁵ The importance of this is that it ensures that all relevant information on a project are kept under one file name and this will make it easier for the retrieval of information on projects. Similar to the IJC Rules, the VBA Rules should also mandate each secretary to make available to the other VBA's IJC sections' secretaries all documents it receives that he or she considers to be in the interest of the VBA's IJC as a whole.³⁷⁶ The significance of this is that it ensures that all important documents that are of interest to the VBA's IJC are made available to all of its sections. Just like the IJC Rules, the VBA Rules should also mandate the secretary of each VBA's IJC section and all staff of the section, to make available all documents and information that are necessary for the two Commissioners of the section to effectively carry out their responsibilities.³⁷⁷ The importance of this is that it will ensure that there is parity in the way the secretaries and staff of the VBA's IJC sections make available documents and information to the sections' Commissioners.

³⁷⁵ *Ibid.*

³⁷⁶ *Ibid* at rule 4 (3).

³⁷⁷ *Ibid* at rule 4 (4).

4.4 Annual Meetings of the VBA's IJC

The IJC Rules sanctions the IJC to have twice yearly meetings with one in the United States and one in Canada.³⁷⁸ Likewise, the thesis recommends that the *VBA Statutes* and the *VBA Convention* should be amended to mandate for the various sections of the VBA's IJC to have joint meetings twice annually. However, unlike the IJC Rules that mandate that the meetings are held, one in the United States and one in Canada, the thesis recommends' that the twice yearly VBA's IJC meetings should be alternated among the six capitals of the VRB's State Parties. The importance of the twice-annual meetings is to allow the different VBA's IJC sections to meet to set the agenda for the VBA's IJC activities and to coordinate the activities of the different sections of the VBA's IJC. The amendments to the *VBA Statutes* and the *VBA Convention* should mandate that the secretary of the VBA's IJC section where the annual meeting takes place should act as secretary. As mentioned earlier, having all six VBA's IJC secretaries to act as joint secretaries would be unmanageable.

4.5 The VBA's IJCs Compilation of Data on the VRB's State Parties' Use of Water Resources

As the VRB comprises six nations, obtaining accurate data on water use could be difficult, as each nation might have their own method of collecting and collating data on water use that might be different from the other countries. As a result, the thesis recommends that the created VBA Rules should mandate for the VBA's IJC to employ competent professionals to coordinate,

³⁷⁸ *Ibid* at rule 5 (1)-(2). Rule 5 (1)-(2) provides that:

5. 1. Subject at all times to special call or direction by the two Governments, meetings of the Commission shall be held at such times and places in the United States and Canada as the Commission or the chairs may determine and in any event shall normally be held each year in the United States in April and in Canada in October.
2. If the Commission determines that a meeting shall be open to the public, it shall give such advance notices to this effect as it considers appropriate in the circumstances.

facilitate and harmonize the data collected by each of the VBA's IJC sections. The idea is to allow the VBA's IJC to provide training aimed at facilitating and harmonizing the water use data collected in the VRB. Ultimately, the aim is for the appointed professionals to assist the various VBA's IJC sections to use identical protocols in collecting and collating data on water use within their respective countries. The data on water use should cover domestic, industrial, dams, irrigation, and pollution. The VBA's IJC professionals will then compile information on water use in all the six VRB nations to provide overall statistics on water use in the VRB as a whole. The importance of this is that it will offer accurate statistics on water use within the VRB.

The thesis recommends that the funding for the collection and compilation of data on water use in the various VBA's IJC sections should be drawn from the VBA's annual budget as provided under Article 11 of the *VBA Statutes*.³⁷⁹ This will ensure continuity in the way the VBA funds all of its activities and it would also guarantee that money would be available for the data compilation.

The created VBA Rules should mandate the VBA's IJC to make the compiled data on water use in the VRB available to the different sections of the VBA's IJC so that concerned citizens could access the compiled data from the various offices of the VBA's IJC sections. The importance of this is that it will provide an accurate data on the use of water resources in the VRB for all concerned citizens. Additionally, it will address the current lack of a data sharing system on water use among the VRB's riparian countries.

³⁷⁹ *VBA Statutes*, *supra* note 84 at art 11.

The VBA's IJC could use the compiled data to assist it to fulfill one of the VBA's objectives under Article 2 (5) of the *VBA Statutes* that provides that the VBA should:

(...) create and or improve the tools and networks for collection, processing, storage and dissemination of data and information necessary for the activities of scientific research, planning, development and management of the basin and in particular, its water resources.³⁸⁰

The next three sub-sections of the thesis discuss how the VBA's IJC could use the compiled data to address some of the weaknesses that the VBA currently faces.

4.5.1 Using the Compiled Data on the VRB's State Parties' Use of the VRB's Water Resources during the VBA's IJC's Annual Meetings to Deal with Water Disasters and Conflicts

The thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* should mandate the VBA's IJC to rely on the compiled data on the VRB's State Parties use of water resources, to address one of the VBA's weaknesses, that involves its inability to deal with water disasters and conflicts, for example, flooding. The amendments should mandate the VBA's IJC to act to address this weakness more effectively by using the compiled data to assist it to identify which countries in the VRB require notifications and be mandated to warn them of impending water disasters in order for them to take measures to avoid destruction to property and loss of life. For example, the VBA's IJC could rely on the compiled data to address the flooding in Ghana caused by the Bagrè dam's opening in Burkina Faso, to know the precise time the dam's floodgates would be opened in Burkina Faso, and use the information to provide advanced notice to Ghana to take preventive measures to avoid loss to life and property. The amendments to the *VBA Statutes* and the *VBA Convention* should also authorise the VBA's IJC to involve officials

³⁸⁰ *Ibid* at art 2 (5).

of Ghana and Burkina Faso in all discussions aimed at identifying the optimal times to open the dam's floodgates. The amendments to the *VBA Statutes* and the *VBA Convention* should mandate for officials in all areas of the VRB that are prone to flooding and other water disasters to meet as part of the search for solutions to deal with the disasters.

4.5.2 Addressing the Competition for Water in the VRB

Another problem the VBA faces is how to address the competition for water for hydroelectric power generation in Ghana and water for irrigation in Burkina Faso. To resolve it, the thesis recommends that the VBA's Rules should provide the VBA's IJC's with powers to use the compiled data on water use in the VRB to coordinate research activities on how best to accommodate the competing uses of water for hydroelectric power generation in Ghana and irrigation in Burkina Faso. Based on the results of the research, the VBA's IJC should be mandated to arrange a meeting with officials from Ghana and Burkina Faso, to devise a mutually acceptable way to achieve effective utilization of water to meet their competing claims for water for hydropower generation and water for irrigation.

4.6 A Reference Jurisdiction-type Mandate for the VBA

In addition to the above weaknesses, Chapter two of this thesis revealed other VBA weaknesses to include; faulty stakeholder involvement in the VBA's management processes, the VBA's unclear decision making processes and the VBA's inability to transform the *VBA Statutes* into a workable action to manage the water resources of the VRB for the benefit of all the riparian countries. These problems need to be resolved to assist the VBA to better manage the water

resources and address the water conflicts in the VRB. Based on the analysis in this thesis, it is recommended that providing the VBA's IJC with a flexible Reference Jurisdiction-type power could help address these weaknesses. To this end, this thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* should allow the VBA's IJC-type structure to have a Reference Jurisdiction-type power, and it should be based on the United States' and Canada's IJC's Reference Jurisdiction powers as shown below.

The High Contracting Parties further agree that any other questions or matters of difference arising between them involving the rights, obligations, or interests of either in relation to the other or to the inhabitants of the other, along the common frontier [among them in the VRB and relating to boundary and transboundary waters and environmental issues, questions or matters], shall be referred from time to time to the (...) [VBA's IJC] for examination and report, whenever either the Government [by half of the VRB's State Parties agreeing to refer the questions or matters, if the number of the VRB's State Parties affected by the questions or matters are two, four or six, and by two thirds of the VRB's State Parties if the number States affected by questions or matters are three or five] shall request that such questions or matters of difference be so referred. The (...) [VBA's IJC] is authorized in each case, so referred, to examine into and report upon the facts and circumstances of the particular questions and matters referred, together with such conclusions and recommendations as may be appropriate, subject, however, to any restrictions or exceptions which may be imposed with respect thereto by the terms of the reference. Such reports of the (...) [VBA's IJC] shall not be regarded as decisions of the questions or matters so submitted either on the facts or the law, and shall in no way have the character of an arbitral award. The (...) [VBA's IJC] shall make a joint report to [the VRB's State Parties] in all cases in which all or a majority of the [VBA's IJC] Commissioners agree, and in case of disagreement the minority may make a joint report to the [VRB's State Parties] or separate reports to their respective Governments. In case the (...) [VBA's IJC] is evenly divided upon any question or matter referred to it for report, separate reports shall be made by the Commissioners of respective sections to their own Government.³⁸¹

³⁸¹ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

As mentioned earlier, the recommendation for half of the number of the VRB's States Parties affected by an issue to agree to refer it to the VBA's IJC, applies to situations where the number of States involved are two, four or six. The recommendation for two-thirds of the number of the VRB's States Parties affected by an issue, to agree to refer it to the VBA's IJC, applies to situations where the numbers of States affected are three, or five. These recommendations are intended to cater for the fact that unlike the IJC that deals with referrals concerning the United States and Canada, the issues to be dealt with in a referral to the VBA's IJC, would not always affect all the State Parties in the VRB, instead it might affect only some of the VRB's States.³⁸² This recognises that while it is easier for the United States and Canada to make joint references, this might not always be possible with the six nations in the VRB as not all of the issues would affect all the VRB's State Parties.³⁸³

The appeal of the text above is that it is broad and flexible. So long as the matter or question relates to the whole of the VRB or any part of it, the affected State Parties could refer it to the VBA's IJC for investigation and report. This will enable the VBA's IJC to investigate diverse issues relating to boundary and transboundary waters and their attendant environmental issues of pollution and flooding for either the VRB as a whole or any part of the VRB. This broad mandate will allow the VBA's IJC to investigate and report on how to address all the current water conflicts in the VRB.

One of the VBA Council's mandates under Article 2 (9) of the *VBA Statutes*, involves its authorization of "the development of infrastructure and projects planned by the State Parties and

³⁸² See Part 1.5.

³⁸³ *Ibid.*

which could have substantial impact of the water resources in the basin [VRB]”³⁸⁴ The *VBA Statutes* does not offer a definition for “substantial impact” as used under Article 2 (9) of the *VBA Statutes* above, however, the thesis notes that while there might be clear and unclear examples of projects with “substantial impact” on the VRB’s water resources, the thesis will not discuss them in detail. However, clear examples of projects with “substantial impact” on the VRB’s water resources will include projects that might cause flooding, pollution, diminished water quality and water quantity. As well, this thesis notes that the *VBA Statutes* and the *VBA Convention* do not offer rules and procedures to assist the Council to exercise this important mandate. The thesis recommends that the VBA’s Rules should mandate the VRB’s governments to refer all such projects to the VBA’s IJC for investigation and report and the VRB State Parties could use the recommendations to decide whether to approve the project. The VBA’s Rules should also mandate the VBA’s IJC to use the services of experts and boards of experts, and provide opportunities for the VRB’s concerned citizens to offer their input to the investigations. The importance of this is that the VBA’s IJC will be able to call on experts to conduct impartial and objective investigations based on scientific evidence and also obtain input from concerned citizens as part of the investigation. The VBA’s IJCs report after the investigations will provide the VRB governments with the information necessary to assist them to render a decision on whether to approve the project.

This thesis recommends that the VBA’s Rules should provide the VBA’s IJC with the mandate to use the factors that have assisted the IJC’s use of flexibility under its Reference Jurisdiction to investigate and report on references to the two governments. The next section explains how the factors could assist the VBA’s IJC in its use of its Reference Jurisdiction mandate.

³⁸⁴ *VBA Statutes*, *supra* note 84 at art 2 (9).

4.6.1 The VBA's IJC should have a Broad Mandate

As mentioned in Chapter three, and elsewhere, the appeal of the IJC's Reference Jurisdiction power is that it is a broad mandate and flexible and it allows the governments of the United States and Canada to refer "any other questions or matters of difference"³⁸⁵ relating to their common frontier to it for investigation and report. In the case of the VBA's IJC, the thesis argues that equipping it with a broad mandate that covers not only boundary waters, but also transboundary waters and environmental issues along the VRB's common frontier, would allow the VRB's governments to refer varied issues to the VBA's IJC to investigate and report on them. This could include referrals relating to the VRB's current water conflicts such as water quantity, water quality and pollution, faulty stakeholders' involvement in the VBA's management processes, the VBA's unclear decision making processes, and the VBA's inability to transform the *VBA Statutes* into a workable action to manage the water resources of the VRB for the benefit of all riparian countries. The VBA's IJC's reports after investigations could contain recommendations on how best the VRB's State Parties could address these problems.

For example, with regard to water quantity problems, the VBA's IJC could recommend to the VRB's governments, a workable system of water use that would provide for a better use of the VRB's water resources in order to cater for the competing water use for hydroelectric power generation in Ghana, and water use for irrigation in Burkina Faso, while leaving the decision of their implementation to the VRB's State Parties.

³⁸⁵ *The Boundary Waters Treaty*, *supra* note 47 at art IX.

Additionally, with regard to issues of water quality and pollution, the VBA's IJC could recommend to the VRB's governments an effective system of remedial measures that would first, treat the VRB's already polluted water resources in areas affected by the effects of past pollution, and second, also recommend to the State Parties in areas that are currently being affected by pollution to ban the use of pesticides and industrial chemicals in the VRB's waters in order to prevent current and future pollution.³⁸⁶

Concerning the faulty stakeholders' involvement in the VBA's management processes, the VRB State Parties could make a referral to the VBA's IJC first, to investigate and make recommendations on how the State Parties can plan and create policies to deal with water use and water conflicts in the VRB. This could involve the VBA's IJC recommending to the State Parties on how best they could afford wasting water on non-essential activities such as beautification projects involving the use of water for non-recyclable water fountains, washing of vehicles and the watering of lawns during periods of water scarcity. The VBA's IJC could also mandate for State Parties to have rapid response teams to offer immediate repair of burst water pipes to curtail unnecessary loss of water.

To deal with the VBA's other weaknesses of unclear decision making processes, and its inability to transform the *VBA Statutes* into a workable action to manage the water resources of the VRB for the benefit of all the VRB's riparian countries, the VRB governments could make a referral to the VBA's IJC through its broad mandate under its Reference Jurisdiction to investigate and report on how best to address these weaknesses. For example, regarding the unclear decision making processes, the VBA's IJC could make a recommendation to the State Parties that all

³⁸⁶ Green Cross International, *supra* note 30 at 43.

issues of conflict regarding the VRB's water resources, including water quantity and quality, flooding and pollution could be referred to it for investigation and report to the VRB's Governments to aid them to find solutions for them. This would address the VBA's current lack of a clear decision making process.

Regarding, the VBA's inability to transform the *VBA Statutes* into a workable action to manage the water resources of the VRB, again the governments could make a referral to the VBA's IJC to investigate and report on it. The VBA's IJC could subsequently recommend that the VBA should have a decision making system that guides all its decisions on the use of the VRB's water resources. For example, as mentioned earlier, and in times of water scarcity, the VBA's IJC could be mandated to recommend to the VRB's State Parties to prevent the waste of water for non-essential activities such as beautification projects. If this is done, it could help to preserve water for important services.

4.6.2 The IJC's Reference Jurisdiction Process Factor

The Reference Jurisdiction's Process Factor (process factor) has aided the IJC's successful use of flexibility under its Reference Jurisdiction.

4.6.2.1 The Commencement of the Process

Like the IJC that has its Rules for the exercise of its process factor, this thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* should provide the VBA's IJC with a mandate to create its own rules regarding the commencement of the reference process. As

earlier mentioned,³⁸⁷ this thesis recommends that the VBA Rules should allow half of the VRB's State Parties to refer questions to the VBA's IJC for investigation and report if the number of the VRB's State Parties involved in an issue are two, four and six. Two-thirds of the VRB's State Parties should be allowed to refer questions to the VBA's IJC for investigation and report if the number of the VRB's State Parties involved in a question are three and five. The importance of this is that it will cater for the difficulties that might occur in getting all six VRB countries to agree to refer questions to the VBA's IJC, and also allow for only the VRB States affected by an issue to refer it to the VBA's IJC for investigation and report.

4.6.2.2 The Issue Specification Process

An important aspect of the IJC's process factor is the need for a precise specification of the question or matter of difference that is covered in a reference. The IJC's Rules of Procedure mandates that drawings, maps, and plans of survey as may be necessary to illustrate the questions or matter the governments refer to the IJC for investigation and report.³⁸⁸ Likewise, this thesis recommends that the VBA's Rules should mandate the VRB's State Parties to use illustrations for the questions they refer to the VBA's IJC. This will help the VBA's IJC to know the precise subject-matter of the referral to assist it in its investigation.

4.6.2.3 The Process that Follows after the IJC Receives a Reference

Another important aspect of the process factor is the stages the investigation under a reference goes through after its receipt by the IJC. This thesis recommends that the VBA's Rules should

³⁸⁷ See Part 4.6.

³⁸⁸ The IJC, "Rules of Procedure", *supra* note 222 at rule 26 (4).

mandate the VBA's IJC to adopt the same stages. The stages involve; first, VBA's IJC publication of a notice of the reference in areas in the VRB that would be impacted by the investigations and to encourage concerned citizens to participate in the investigations by providing them with opportunities at meetings to produce oral and documentary evidence to the VBA's IJC.

Second, the VBA's Rules should mandate the VBA's IJC like its IJC counterpart³⁸⁹ to form a board of experts to assist it in its investigation under references. Experts bring scientific and technical knowledge to the investigations that will help the VBA's IJC Commissioners and the public to understand the complexities involved in the subject-matter of the referral.

Third, the VBA's Rules should provide for the VBA's IJC like its IJC counterpart³⁹⁰ to make copies of the board of experts' final report to the VRB's governments and concerned citizens before holding a final hearing. During the hearing, the VBA's IJC should provide opportunities for concerned citizens to provide comments on the board of experts report.³⁹¹ At the hearing, the VBA's Rules should mandate the VBA's IJC to provide feedback mechanisms on how the concerned citizens' inputs were used as part of the investigations.

³⁸⁹ *Ibid* at rule 28 (1)-(3), which provides that: The Commission may appoint a board or boards, composed of qualified persons to conduct on its behalf investigations and studies that may be necessary or desirable and to report to the Commission regarding any questions or matters involved in the subject matter of the reference.

(2) Such board ordinarily will have an equal number of members from each country.

(3) The Commission ordinarily will make copies of the main or final report of such board or a digest thereof available for examination by the governments and interested persons prior to holding the final hearing or hearings referred to in Rule 29.

³⁹⁰ *Ibid* at rule 28 (3).

³⁹¹ *Ibid*.

Finally, like its IJC counterpart, the VBA's Rules should mandate the VBA's IJC to prepare a report on references to all the governments of the VRB after the hearing.³⁹²

4.6.3 The VBA's IJC's Commissioners should have Independence and Exercise their Mandate Impartially

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is its Commissioners' independence and impartiality. The thesis recommends that likewise, the VBA's Rules should mandate that the VBA's IJC Commissioners enjoy independence and display impartiality in the exercise of their mandate.

Regarding, the Commissioners' independence once a referral is made to the VBA's IJC, the Commissioners should be allowed to investigate it based on scientific evidence and the facts and circumstances of the issue, without further interference from the VRB's governments. To achieve this, the amendments to the *VBA Statutes* and the *VBA Convention* that establish the VBA's IJC should be drafted to ensure that there cannot be governmental interference in the way the VBA's IJC Commissioners exercise their mandate.

Concerning the VBA's IJC's Commissioners' impartiality, this thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention*, and the VBA's Rules should mandate that the VBA's IJC's Commissioners prior to taking office should take an oath declaring to faithfully and impartially perform their duties solely for the better management of the water resources of the VRB, rather than to promote their personal or national interests.

³⁹² *Ibid* at rule 29 (1).

4.6.4 The VBA's IJC should have the Mandate to Use of Boards and Experts in Joint Fact-finding

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the use of boards and experts in joint fact-finding, which was mentioned earlier under the process factor. Experts bring the scientific know how that is required to undertake investigations into complex questions that are involved in referrals. This thesis recommends that the VBA's Rules should permit the VBA's IJC to create boards of experts as part of their investigations into references. These boards of experts should not be permanent but rather should be temporary and flexible in the sense that the questions or matter involved in a referral should dictate the type of board of experts that the VBA's IJC constitutes to assist it in its investigations. Like the IJC, the boards of experts created by the VBA's IJC, should comprise equal members from each of the six nations in the VRB in order to promote consensus and support for its work by all the governments of the VRB.

4.6.5 The VBA's IJC should Support a Forum for Public Participation

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the forum for public participation in its investigations that was mentioned as part of the process factor. Likewise, this thesis recommends that the VBA's Rules must require the VBA's IJC to provide opportunities for public participation in its investigations as an alternative to the Forum. As noted in Chapter two, the Forum's contribution is made in support of the position of the VRB's State Parties, while the VBA's Rules seeks to create additional opportunities for public participation in the VBA's IJC investigations that would allow the VRB's concerned citizens' input in its investigations. In doing this, this thesis recommends that the VBA's IJC, like the IJC

should rely on flexibility to publish public notices on its investigations only in areas in the VRB that are impacted by the subject-matter of its investigations to encourage the public there to participate. The VBA's IJC should also be mandated to offer opportunities at public hearings for the VRB's concerned citizens to provide oral and documentary evidence to the Commissioners as part of the investigation.

4.6.6 The VBA's IJC should make Non-Binding Recommendations after its Investigations under References

Another factor that has assisted the IJC's use of flexibility under its Reference Jurisdiction is the IJC's non-binding recommendations for references. The thesis recommends that the amendments to the *VBA Statutes* and the *VBA Convention* that establish the VBA's IJC should provide the VBA's IJC with the mandate to make non-binding recommendations after its investigations under references. This is important as it would allow the VBA's IJC to make objective recommendations based on scientific evidence from investigations by boards of experts and input from the VRB's concerned while leaving the decision to implement the recommendations to the VRB's State Parties.

4.7 Conclusion – Reforming the VBA

The foregoing has made recommendations for improving the VBA in order to assist it to better manage the VRB's water resources to address current conflicts in water use and prevent future ones. The recommendations have so far centred on providing the VBA with an IJC-type structure that is equipped with a Reference Jurisdiction-type mandate. Additionally, the thesis

recommended the VBA's IJC to be equipped with the factors that have aided the IJC's use of flexibility under its Reference Jurisdiction.

Chapter 5: Summary and Conclusion

5.1 Summary of the Major Findings of the Thesis

On the basis of the analysis in this thesis, the following important findings are identified. First, the thesis has shown that the VBA's creation offered a great opportunity for the VRB's riparian countries to address their water conflicts and manage their common water resources to their mutual benefit. However, the VBA as presently constituted is plagued with deficiencies that limit its efficacy to address the VRB's water conflicts. The thesis identified the deficiencies in the VBA as including: the VBA's inability to deal with water disasters and conflicts; faulty stakeholder involvement in the VBA's management processes; the VBA's unclear decision making processes; the VBA's inability to transform the *VBA Statutes* into a workable action to manage the water resources of the VRB for the benefit of all riparian countries; and an absence of an independent body in the VBA's decision making processes.

Second, the thesis focused on the BWT's IJC as the legal regime that needs to be incorporated into the VBA to assist it to better deal with the water conflicts in the VRB. To this end, the analysis in this thesis showed that the IJC has indeed played a significant role in the *Boundary Waters Treaty's* successful management of the boundary waters between the United States and Canada. The IJC's success has been aided by its use of its Reference Jurisdiction mandate to investigate and report on references. The thesis also showed that the IJC's use of flexibility has aided its successful exercise of its Reference Jurisdiction mandate.

The IJC's successful use of flexibility has been aided by a number of factors that include:

- the IJC's broad mandate under its Reference Jurisdiction that allows the governments of the United States and Canada to refer varied boundary waters issues to it for investigation and report;
- the IJC's process factor that allows it to publish notices of referrals only in locations where people would be impacted by the investigations, form a board of experts to assist it in its investigations, and conduct hearings where concerned citizens are offered opportunities to participate in the investigations;
- the IJC's Commissioners' independence that allows them to investigate and report on references without governmental interference, and their impartiality in the exercise of their mandate that prevents them from championing their biased and nationalistic interests;
- the IJC's Commissioners' ability to form boards of experts as part of their investigation that allows them to benefit from the experts use of science as part of their investigations that are usually too complex for the Commissioners to investigate alone;
- the IJC's reliance on a forum of public participation, that allows it to use the participation of concerned citizens either orally or through documentary evidence as part of its investigations under references; and
- the IJC's issue of non-binding recommendations after its investigations under references that permits it to base its recommendations on scientific evidence and the facts and circumstances of the questions or matter in the references and be as objective as possible and leave the decision as to whether to implement the recommendations to the governments.

Finally, the thesis offered the IJC and its Reference Jurisdiction powers as the legal regime that should be incorporated into the VBA to better equip it to address the VRB's water conflicts. To this end, the thesis recommended that the *VBA Statutes* and the *VBA Convention* be amended to create an IJC-type structure to be known as the VBA's IJC and to have the mandate to create Rules in the exercise of its powers. As well, the thesis recommended that the amendments to the *VBA Statutes* and the *VBA Convention* should provide the VBA's IJC with Reference Jurisdiction-type powers to allow it to investigate and report on references from the VRB's governments. Additionally, the thesis recommended that the amendments to the *VBA Statutes* and the *VBA Convention* should provide the VBA's IJC with the mandate to rely on the factors that have assisted the IJC's use of flexibility in exercising its Reference Jurisdiction mandate. The thesis also offered other policy and management tools to assist the VBA's IJC in the exercise of its mandate such as allowing it to receive references from the particular VRB States that are affected by an issue.

5.2 Conclusion

As mentioned earlier, the creation of the VBA was a step in the right direction but it is beset with deficiencies that limit its ability to deal effectively with the VRB's water conflicts. The thesis recommended that the creation of an IJC-type structure to be called the VBA's IJC that is equipped with a Reference Jurisdiction-type mandate would better assist the VBA to manage the VRB's water conflicts. Additionally, the thesis recommended that the VBA's IJC should have the mandate to use flexibility in the exercise of its Reference Jurisdiction powers for investigations and recommendations for references. While the above recommendations would

help address the water conflicts in the VRB, they would not succeed unless there is a political will among the VRB's nations to cooperate in order to make them successful.

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Appendix I

CONVENTION ON THE STATUS OF THE VOLTA RIVER AND THE ESTABLISHMENT OF VOLTA BASIN AUTHORITY (VBA)

PREAMBLE

The Heads of State,

of the Republic of Benin,

of Burkina Faso,

of the Republic of Côte d'Ivoire,

of the Republic of Ghana,

of the Republic of Mali

of the Republic of Togo,

Considering the United Nations Organization Charter;

Considering the Treaty establishing the African Union;

Considering the revised Treaty of the Economic Community of West African States (ECOWAS);

Considering the African Convention on the Conservation of Nature and Natural Resources adopted in Algiers in 1968 and revised in Muputo in 2003;

Considering the International Convention on Internationally Important Wetlands serving especially as habitat for water birds, adopted in Ramsar (Iran), in 1971;

Considering the sub-regional, regional and international Conferences and Initiatives, in particular the commitments made within international frameworks such as:

- The West African Conference [March 1998] on Integrated Water Resources Management [IWRM] whose << Ouagadougou Declaration >> requires the Countries sharing a river basin to <<create or strengthen their basin organisation >>;

- The Assembly of the Heads of State and Government of the ECOWAS, which, during its 24th Session held in Bamako in December 2000, adopted the Regional Action Plan for Integrated Water Resources Management in West Africa (RAP/IWRM/WA) in which one component concerns the management of trans-boundary basins.
- The Assembly of the Heads of State and Government of the ECOWAS which during its 25th meeting held in Dakar in December 2001, established within the ECOWAS the Water Resources Coordinating Unit (WRCU) whose major role is to promote IWRM in West Africa.
- The United Nations Conferences on the Management of Water Resources and Environment in particular that on:
 - i. Water and Environment held in Dublin (1992), which established the basin IWRM principles;
 - ii. Environment and Development held in Rio (1992), during which a consensus emerged on a *‘new plan of action for the better management of fresh water resources on earth’*, stated in Agenda 21;
 - iii. Water and Sustainable Development held in Paris (1998), which reinforced the recognition of the major principles aimed at promoting a sustainable management of water resources and aquatic environments adopted in Rio;
 - iv. World Summit on Sustainable Development held in Johannesburg (2002), during which the International Community renewed and specified its commitment to IWRM;

Considering the need for promoting sustainable socio-economic development in their respective countries for increasing the standard of living of their peoples;

Considering that, in spite of the existence of important projects and programmes related to research and socio-economic development activities, there is continuous degradation of the natural resources of the Volta basin, especially its water resources, as a result of climate change and variations of the past decades, on the one hand, and by the negative impacts of the human activities carried out throughout the basin on the other hand;

Considering that the creation of an inter-States organization for the management of the Volta basin is essential to reinforce dialogue between the riparian countries and to effectively coordinate development actions and promote sustainable water resources management in the Volta basin.

Hereby agrees as follows:

I. GENERAL PROVISIONS

Article I:

Definition of Terms

- i. Riparian States: Riparian states of the Volta include Benin, Burkina Faso, Côte d'Ivoire, Ghana, Mali and Togo.
- ii. State Parties: The Riparian states who have ratified this Convention.

Article 2:

The Parties herein declare that Volta River including its tributaries and sub-tributaries within the territories of the Republic of Benin, Burkina Faso, the Republic of Côte d'Ivoire, the Republic of Ghana, the Republic of Mali, and the Republic of Togo, is an international river.

Article 3:

1. For the purpose of ensuring international cooperation for the rational and sustainable management of the water resources of the Volta basin and for the socioeconomic integration among the Parties herein, there is hereby established an organization called the Volta Basin Authority (VBA) hereinafter referred to as the "Authority".
2. The Authority shall have the status of an international organisation enjoying thereto the privileges and immunities of an international legal entity.

II. PRINCIPLES

Article 4:

The Parties commit themselves to cooperate closely for the rational and sustainable utilization of the water resources of the Volta Basin, on the basis of the following principles:

- (a) The use of the water resources of the basin and the participation in their development in an equitable and reasonable manner;
- (b) The general obligation to co-operate for the States sharing the same river basin;
- (c) The regular exchange of data and information among the State Parties;
- (d) The notification of planned activities that can have the negative effects, as well as the related consultations and negotiations;
- (e) Precaution and prevention;
- (f) The protection and conservation of ecosystems;
- (g) The obligation not to cause damage;

- (h) The notification of emergency situation;
- (i) The freedom of navigation on the river.

Article 5:

1. Parties may enter into agreements on any portion of the Volta basin for a project, a program or any other utilization of the water resources of the Volta basin.
2. Such agreements shall be consistent with the provisions of this Convention.

III. MANDATE AND JURISDICTION

Article 6:

The mandate of the Authority, as regards water resources and which shall be performed on the basis of the principles set forth in Article 4 of this convention shall be:

1. To promote permanent consultation tools among the parties for the development of the basin;
2. To promote the implementation of Integrated Water Resources Management and the equitable distribution of the benefits resulting from their various utilizations;
3. To authorise the development of infrastructure and projects planned by the stakeholders and which could have substantial impact on the water resources of the basin;
4. To develop joint projects and works;
5. To contribute to poverty alleviation, the sustainable development of the Parties in the Volta basin, and for better socioeconomic integration in the sub-region.

Article 7:

The Authority in the performance of its functions shall have jurisdiction over the Volta River, its tributaries and sub-tributaries, the reservoirs and lakes, groundwater and wetlands as well as the aquatic and land ecosystems linked to the basin, the estuary of the river including the zone of coastal and oceanic influences.

IV. ORGANS, SPECIFIC OBJECTIVES AND OPERATING RULES

Article 8:

1. The following shall constitute the permanent administrative organs of the Authority:
 - a) The Assembly of Heads of State and Government;
 - b) The Council of Ministers in charge of Water Resources;
 - c) The Forum of the Parties involved in the Volta basin development;
 - d) The Committee of Experts
 - e) The Executive Directorate of the Authority.
2. The Council of Ministers may, as and when necessary, establish any other organ of the Authority.

3. The Executive Director of the Authority shall enjoy all the privileges and immunities granted to Heads of Diplomatic missions.

Article 9:

The Council of Ministers shall define in the Statutes of the Authority the specific objectives and the rules relating to the operation of its organs.

V. AMENDMENTS

Article 10:

1. This Convention may be amended upon the request of any State Party.
2. Such a request for amendment shall be sent in a written form to the chairman of the Assembly who shall submit it to the Assembly of Heads of State and Government for consideration.
3. A proposed amendment shall be approved by two-thirds majority of the State Parties.
4. Any amendment to this Convention shall enter into force under the same conditions as set out in the Convention.

VI. ADMISSION

Article 11:

1. Upon the coming into force of the Convention , a Riparian State may join the Authority by ratifying the Convention and shall file the ratification instrument with the Government of Burkina Faso which shall thereupon inform the State Parties accordingly;
2. The Riparian State shall become a State Party thirty (30) days after the ratification instruments are deposited.

Article 12:

1. Any State which withdraws from the Authority may apply for readmission.
2. The State shall send such a request to the Chairman of the Assembly which shall inform the other State Parties accordingly.
3. Upon the receipt of such request, the Assembly of Heads of State and Government shall examine the request at its next appropriate session and shall declare the membership to the Authority upon the votes of two-thirds of the Parties.
4. The Riparian State shall become a State Party thirty (30) days after the ratification instruments are deposited.

VII DISPUTE SETTLEMENT, WITHDRAWAL AND DISSOLUTION

Article 13:

1. Any dispute arising among the Parties shall be resolved in conformity with the provisions of the Charter of the United Nations Organization.
2. Any dispute arising among the Parties from the interpretation or enforcement of this Convention shall be resolved through conciliation and mediation within the Authority.
3. In the absence of an amicable settlement, the Parties shall submit the matter to one of the competent organs of ECOWAS or African Union and thereafter to the International Court of Justice.

Article 14:

1. A State party may withdraw from the Authority provided that such state shall inform in writing the President of the Assembly of Heads of State and Government who shall immediately notify the other State Parties.
2. The State shall enter into negotiations with the Authority on the one hand and the interested third parties on the other hand for the settlement of all existing rights and obligations as set forth in this Convention.
3. The withdrawal of a State shall become effective only after settlement agreements are signed by the Authority on the one hand and the interested third parties on the other hand.
4. The withdrawal of a party does not mean the dissolution of the Authority.

Article 15:

1. The Authority may be dissolved upon the request of at least two of the Parties.
2. Upon the receipt of such request the Assembly of Heads of State and Government shall examine the request in an extraordinary session convened within a period of one year and shall declare the dissolution of the Authority upon the votes of two-thirds majority of the Parties.
3. The Assembly, upon the dissolution of the Authority, shall define the modalities for the distribution of the assets and liabilities of the Authority.
4. The dissolution shall become effective only after all settlement agreements have been signed between the Parties and other interested third parties.

VIII. HEADQUARTERS AND WORKING LANGUAGES

Article 16:

The Authority shall have its headquarters in Ouagadougou, BURKINA FASO provided that the headquarters may be relocated to any other State Party upon the decision of the Assembly of Heads of State and Government.

Article 17:

The working language of the Authority shall be English and French.

IX. FINAL PROVISIONS

Article 18:

This Convention shall be ratified by the Parties in conformity with their constitutional rules and procedures.

Article 19:

The Convention as well as the ratification instruments shall be filed with the government of BURKINA FASO which shall inform the Parties accordingly.

Article 20:

This Convention shall enter into force thirty (30) days after the ratification instruments are deposited by the fourth State.

Article 21:

This Convention shall be forwarded to the United States General Secretariat for registration after it enters into force, in conformity with Article 102 of the United Nations Charter.

IN WITNESS WHEREOF, the Heads of States listed below have signed this Convention in Ouagadougou (Burkina Faso), on the 19th of January 2007 in six (6) original copies in English and French. Both versions shall be deemed authentic.

For the Republic of BENIN

H.E.M. Yavi BONI

For the Republic of CÔTE D'IVOIRE

H.E.M Laurent GRAGBO

For the Republic of MALI

H.E.M. Amadou Toumani TOURE

For BURKINA FASO

H.E.M. Blaise COMPAORE

For the Republic of GHANA

H.E.M. John A.K.UFUOR

For the Republic of TOGO

H.E.M. Faure GNASSINGBE

Appendix II
STATUTES
OF THE VOLTA BASIN AUTHORITY
(VBA)

PART I: Purpose

Article 1:

The purpose of these Statutes, adopted in conformity with Article 9 of the Convention on the Status of the Volta River and the Establishment of the Volta Basin Authority, is to provide for the specific objectives, rules and procedures for the operation of the organs of the “Authority”.

PART II: Specific Objectives

Article 2:

The Specific objectives of the Authority shall be:

1. To organise and reinforce consultations among the riparian countries of the Volta on the one hand and also between these riparian countries and all the development partners interested in and concerned with the development of natural resources and, in particular, the water resources of the Volta basin, on the other hand;
2. To harmonise the national policies relating to the management of the water resources of the Volta basin, through the adoption and enforcement of Integrated Water Resources Management throughout the basin;
3. To mobilise the human, technical and financial resources necessary for undertaking studies, research activities and works aimed at sustainable management of water resources for the socio-economic development of the Volta basin;
4. To coordinate studies, research activities and works initiated in the basin for the development of the water resources of the basin, especially those relating to the provision of potable water and sanitation for the population, hydro-power production, irrigation, livestock, fish farming, navigation and the preservation of aquatic ecosystems;
5. To create and or improve the tools and networks for the collection, processing, storage and dissemination of data and information necessary for the activities of scientific research, planning, development and management of the natural resources of the basin and in particular, its water resources;
6. To develop and implement the institutional mechanisms and tools for monitoring, evaluation and planning for an efficient and sustainable management of the water resources of the Volta basin;
7. To initiate any other action in the common interest of the Parties, in line with the sustainable management and utilisation of the water resources of the basin;

8. To promote cooperation between the Authority and other similar regional and international organisations;
9. To authorise the development of infrastructure and projects planned by the States Parties and which could have substantial impact on the water resources of the basin;
10. To develop joint projects and works;

PART III: Legal Authority

Article 3:

For the effective execution of its mandate and the achievement of its objectives, the authority shall have a legal status and more specifically shall have the capacity:

1. To enter into contracts;
2. To acquire and dispose of goods, movable and immovable;
3. To receive gifts, grants, legacies and other bequests;
4. To sue and be sued.

PART IV: Functions of the Organs

Article 4:

The permanent organs of the Authority as stated in Article 8 of the Convention shall be:

1. The Assembly of Heads of State and Government;
2. The Council of Ministers in Charge of Water Resources;
3. The Forum of the parties involved in the development of the Volta basin;
4. The Committee of Experts;
5. The Executive Directorate of the Authority.

Article 5:

1. The Assembly of Heads of State and Government, hereinafter referred to as the 'Assembly' shall be the supreme policy decision-making organ of the Authority.
2. The Assembly shall consist of the Heads of State and Government of the Parties or their duly mandated representatives.
3. The Assembly shall define the general framework of the cooperation and developmental policies of the Authority and shall ensure their implementation.
4. The Assembly shall meet once every two years in the State Party occupying the chairmanship of the Assembly and the quorum for all meetings shall be the simple majority of Parties.
5. The Assembly may at the request of the President or any State Party convene an extraordinary session.
6. The decisions and recommendations of the Assembly shall be adopted by consensus and shall be binding on the Authority and the State Parties.

7. The Assembly shall appoint a President in a rotational manner according to the alphabetical order of the State Parties in French for a period of two years.

Article 6:

- (1) The Council of Ministers, hereinafter referred to as “the Council”, shall be responsible for the formulation and control of the programmes and policies of the Authority in conformity with the cooperation and development policies defined by the Assembly and shall supervise and monitor the activities of the Authority.
- (2) The Council shall consist of the ministers in charge of Water Resources of the State Parties or their duty mandated representatives provided that these Ministers may be accompanied by other members of government.
- (3) The State Parties shall be obliged to attend meetings of the council.
- (4) Without prejudice to the powers of the Assembly, the Council shall exercise overall responsibility over all the organs of the Authority and shall legally represent the Authority in all matters provided that the Council may expressly delegate some of its powers to the Executive Director.
- (5) The Council shall control the activities of the Executive Directorate and shall approve the budget of the Authority and determine the financial contributions of the State Parties.
- (6) The Council shall approve the financial and employment regulations and shall employ the senior staff of the Authority on the recommendations of the Executive Director, among the nationals of the State Parties on the basis of competence and equitable distribution.
- (7) The Council shall examine all projects submitted to the Authority and may authorise their execution.
- (8) The decisions of the Council shall be binding on all State Parties.
- (9) The Council shall meet once a year in an ordinary session convened by its President provided that the President at the request of a State Party may convene an Extraordinary Session of the Council.
- (10) The sessions of the Council shall be held in a rotational manner among the State Parties according to the alphabetical order of the States in French.
- (11) The meetings of the Council shall be chaired by its President and the quorum for all meetings shall be two-thirds of the State Parties.
- (12) The decisions of the Council shall be adopted by consensus. In the event of persistent disagreement, decisions shall be adopted by two-thirds majority of the State Parties.
- (13) The tenure of office of a President shall be for one year and shall be appointed alternatively among the ministers in charge of Water Resources of the State Parties according to the alphabetical order of the States in French.
- (14) The President shall in between sessions of the Council represent the Council and shall take any decision within his competence in the interest of the Authority and shall report to the Council at its next meeting.
- (15) The President of the Council may, in the event of an emergency and in consultation with other members of the Council, take any appropriate measure within the jurisdiction of the Council.
- (16) The Council in all matters shall exercise its power in accordance with the mandate assigned to the Authority.

(17) The Council shall report the activities of the Authority to the Assembly through its President.

(18) The Council shall adopt its own internal rules and procedures in the performance of its mandate.

Article 7:

(1) The Forum of the stake holders involved in the development of the Volta Basin, hereinafter referred to as ‘the Forum’, shall be an advisory body instituted by the Council.

(2) The Forum shall consist of:

(a) The representatives of various categories of water uses; Civil Society involved in water resources management; and decentralised local authorities in each portion of the basin of the State Parties,

(b) The representatives of the National Focal Bodies,

(c) The representatives of the neighbouring trans-boundary basin organisations,

(d) The representatives of research centres operating in the water and environmental sector.

(3) The Forum shall meet at least once a year at the request of its President in consultation with the President of the Council.

(4) The Forum shall submit to the Council the opinions and proposals of the stakeholders involved in the development of the basin and shall inform stakeholders on the activities and achievements of the Authority.

(5) The Forum shall support the work of the Authority through the promotion of education and sensitization of the population of the basin on joint issues relating to integrated water resources management.

(6) The Forum shall develop its own internal rules and procedure which shall be submitted to the Council for approval.

Article 8:

(1) The Committee of Experts, hereinafter referred to as ‘the Committee’ shall consist of two representatives each from a State Party, one of whom shall at least belong to the National Focal Bodies.

(2) The Committee shall be responsible for:

(a) Preparation of the meetings of the Council;

(b) Supporting the Executive Directorate in the execution of its functions especially in its relationships with the National Focal Bodies and the other actors operating in the basin;

(3) The Executive Director shall convene the meetings of the Committee in consultation with the President of the Council as and when necessary;

(4) The Committee shall develop its own internal rules and procedure which shall be submitted to the Council for approval.

Article 9:

(1) The Executive Directorate shall be the executive body of the Authority and shall enforce the decisions of the Council and report regularly on their implementation.

(2) The Executive Directorate shall provide secretarial support for all the bodies of the Authority.

(3) The Executive Directorate of the Authority shall be headed by an Executive Director who shall be appointed by the Assembly upon the recommendation of the Council for a period of four years with the option to renew for another four year term only, in accordance with the procedures set forth in the Staff Regulations.

(4) The administrative structure of the Executive Directorate shall be developed by the Executive Director and shall be approved by the Council.

(5) The Executive Director shall represent the Authority mainly in its relationship with bilateral and multilateral institutions on any issue relating to the water resources of the Volta Basin. He shall take all the decisions within his mandate subject to the directives of the Council.

(6) The Executive Director shall be the budget holder of the Authority.

(7) The Executive Director shall be the head of the administration of the Authority and shall be responsible for the management of the assets and the staff of the Authority and shall have supervisory power over all the staff and activities of the Authority.

(8) The Executive Director shall report to the Council on the management and the activities of the Executive Directorate.

PART V: National Focal Bodies

Article 10:

(1) The Minister in Charge of Water Resources in each State Party shall establish a national focal body which shall be responsible for coordinating the activities of the Authority at the national level.

(2) The specific functions and composition of the National Focal Bodies shall be defined in joint agreement with the State Parties.

PART VI: Financial Provisions

Article 11:

(1) The Council shall approve the annual budget of the Authority and the budget shall be in a convertible currency.

(2) The budget of the Authority shall be made up of:

a. Subscriptions of State Parties

b. Any other funds allocated by State Parties,

c. Subventions, gifts, grants and loans granted to the Authority,

d. Any other money accruing to the Authority in the performance of its functions.

(3) The financial resources of the Authority shall be determined by the Council.

(4) The State Parties shall be obliged to pay regularly their contribution to the annual budget of the Authority.

(5) In the event of a default of a State Party to pay its contribution that State Party shall be liable to sanctions as shall be provided in the financial regulations.

(6) All the expenses of the Authority, including those of the specialised bodies of the Executive Directorate, shall be approved by the Council and chargeable to the annual budget, under the conditions that shall be set forth in the financial regulations.

PART VII: Transitional Provisions

Article 12:

The existing members of the Volta Basin Technical Committee (VBTC) shall assume the functions of members of the Committee of Experts until the setting up of the organs of the Authority.

Article: 13

The Council, upon adopting these Statutes, shall appoint an acting Executive Director till the appointment of the substantive Executive Director.

PART VIII: Final Provisions

Article 14:

(1) These Statutes may be amended upon the request of one of the State Parties and the proposed amendment shall be sent in a written form to the President of the Council who shall submit it to the Council for consideration at the next appropriate session.

(2) The proposed amendment shall be adopted upon the two thirds majority vote of the State Parties.

Article 15:

These Statutes shall enter into force as of the date signed by all the members of the Council.

IN WITNESS WHEREOF, the ministers or duly mandated representatives have signed these Statutes in Ouagadougou, on 16 November 2007, in six (6) original copies in English and French, both versions shall be deemed authentic.

For the Republic of BENIN,
For the Minister of Mines, Energy and Water,
The General Secretary

DANSOU LOKOSSOU Gabriel

For the BURKINA FASO.
The Senior Minister, Minister of
Agriculture, Hydraulic and Fishery
Resources

Salif DIALLO

For the Republic of COTE D'IVOIRE
The minister of Environment, Water and
Forestry
The Director of the Cabinet

KOUASSI KOUADIO Mermoz

For the Republic of MALI,
For the Minister of Energy, Mines
And Water,
The Minister of Environment and
Sanitation

Aghatam Ag ALHASSANE

For the Republic of GHANA,
The Minister of Water Resources,
Works and Housing

Alhaji Abubakar Saddique BONIFACE

For the Republic TOGOLAISE,
For the Minister of Water and
Fishery Resources

Yao Florent MAGANAWE