

## **INTRODUCTION: CANADA-UNITED STATES TRANSBOUNDARY ENVIRONMENTAL PROTECTION**

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Canada and the United States have one of the most important transboundary environmental relationships in the world. In terms of both the natural resources at stake and the policy precedents created, the significance of their bilateral relationship for international environmental protection cannot be overstated. Canada and the United States share a 5,000 mile border that includes 150 rivers and lakes. Included in these boundary rivers and lakes are the Great Lakes and St. Lawrence River, the world's largest surface freshwater system, containing 95% of the surface freshwater in the United States and 18 to 20% of the world's available surface freshwater supply.<sup>1</sup> About forty million Americans and Canadians rely on the shared boundary waters for their drinking supply.<sup>2</sup>

The shared natural resources between Canada and the United States are paralleled by a tremendous economic relationship fueled by increased trade. Canada and the United States have "the world's largest and most comprehensive trading relationship," and "[s]ince the implementation of the Canada-U.S. Free Trade Agreement in 1989, two-way trade has tripled."<sup>3</sup> In 2004, with over \$1.8 billion worth of goods and services crossing the border

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<sup>1</sup> See Great Lakes Commission for the Great Lakes States and Provinces, *Toward a Water Resources Management Decision Support System for the Great Lakes-St. Lawrence River Basin* (Ann Arbor: Great Lakes Commission, 2003) at 22, online: WRMDSS for the Great Lakes – Final Report <<http://www.glc.org/wateruse/wrmdss/finalreport.html>>; Lee Botts *et al.*, *The Great Lakes: An Environmental Atlas and Resource Book* 3d ed. (Washington, D.C.: U.S. Environmental Protection Agency and the Government of Canada, 1999) online: U.S. Environmental Protection Agency <<http://www.epa.gov/glnpo/atlas/glat-ch1.html>>.

<sup>2</sup> Canada & United States, International Joint Commission, *Protection of the Waters of the Great Lakes: Final Report to the Governments of Canada and the United States* (Washington D.C, Ottawa, Windsor: International Joint Commission, 2000) at sec. 2, online: IJC <<http://www.ijc.org/php/publications/html/finalreport.html#2>>.

<sup>3</sup> See Canada, Foreign Affairs & International Trade Canada, "The Canada-U.S. Trade and Investment Partnership" (July 27, 2006), online: Internet Archive <[http://web.archive.org/web/20061011120337/http://geo.international.gc.ca/can-am/main/trade\\_and\\_investment/trade\\_partnership-en.asp](http://web.archive.org/web/20061011120337/http://geo.international.gc.ca/can-am/main/trade_and_investment/trade_partnership-en.asp)>.

every single day, bilateral trade totaled about \$680 billion.<sup>4</sup> Canada and the United States also have “one of the world’s largest investment relationships... In 2004, U.S. direct investment in Canada was worth more than \$228 billion, while Canadian direct investment in the United States was close to \$165 billion.”<sup>5</sup>

Canada and the United States have a rich history of transboundary international environmental law and policy. The *Boundary Waters Treaty* of 1909<sup>6</sup> has provided the substantive and governance foundation for transboundary environmental protection between Canada and the United States for nearly a century. The *Boundary Waters Treaty* primarily provides for joint management and cooperation between the United States and Canada for the two countries’ shared boundary waters, including four of the five Great Lakes. It provides 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.”<sup>7</sup> The *Boundary Waters Treaty* further provides that neither country may use or divert boundary waters “affecting the natural level or flow of boundary waters on the other side of the [border]line”<sup>8</sup> without the authority of the International Joint Commission.

In addition to establishing legal obligations regarding the shared boundary waters, the *Boundary Waters Treaty* created the International Joint Commission, a six member investigative and adjudicative body comprised of political appointees appointed by the United States and Canada (three each).<sup>9</sup> The International Joint Commission created by the *Boundary Waters Treaty* is often commended for its objectivity and leadership on environmental issues.<sup>10</sup> Its reports, studies, and policy recommendations have proven to be very valuable in diplomatically resolving numerous international environmental disputes and crafting new policies in both countries to prevent environmental harms from occurring. As such, the International Joint Commission enjoys a well-deserved reputation for objective work, supported by the best science and

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<sup>4</sup> *Ibid.*

<sup>5</sup> *Ibid.*

<sup>6</sup> *Treaty Relating to Boundary Waters and Questions Arising with Canada*, United States and United Kingdom, 11 January 1909, 36 U.S. Stat. 2448, U.K.T.S. 1910 No. 23 [*Boundary Waters Treaty*].

<sup>7</sup> *Ibid.* at 2450.

<sup>8</sup> *Ibid.* at 2449–50.

<sup>9</sup> *Ibid.* at 2451.

<sup>10</sup> See e.g. Barry Sadler, “The Management of Canada-U.S. Boundary Waters: Retrospect and Prospect” (1986) 26 *Nat. Resources J.* 359 at 370-372.

free from political biases, and serves as an important source of information for both the public and decision-makers in the United States and Canada.

The *Boundary Waters Treaty* and International Joint Commission have provided an international model for transboundary environmental protection and management. On the eve of its centennial, it seems that the *Boundary Waters Treaty* was a hundred years ahead of its time. It provides a framework for transboundary water management that is focused on protecting the resource itself, rather than dividing the resource between the countries to use or destroy as they like. It includes measures for the protection of both water quantity and water quality, an integrated approach that neither the United States nor Canada have yet duplicated domestically. And the International Joint Commission set the bar for international governance bodies that put protection of the shared resource ahead of either country's immediate interests in any given issue or dispute.

Just as Canada and the United States established new models for transboundary treaties and governance bodies, their most famous transboundary pollution dispute established the defining precedent for international environmental adjudication.<sup>11</sup> The Trail Smelter arbitration<sup>12</sup> “laid out the foundations of international environmental law, at least regarding transfrontier pollution.”<sup>13</sup> It remains “the first decision of an international court or tribunal to deal specifically, and on the merits, with transfrontier pollution.”<sup>14</sup> The relatively simple dispute between an upwind Canadian smelter and downwind United States landowners harmed by the smelter's pollution led to the famous tribunal decision and international environmental law principle that:

[N]o State has the right to use or permit the use of its territory in such a manner as to cause injury by fumes in or to the territory of another or the properties or persons therein, when

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<sup>11</sup> See generally Noah D. Hall, “Transboundary Pollution: Harmonizing International and Domestic Law” (2007) 40 U. Mich. J.L. Reform 681.

<sup>12</sup> *United State of America v. Canada* (1938), 3 R.I.A.A. 1911 [*Trail Smelter I*]; *United State of America v. Canada* (1941), 3 R.I.A.A. 1938 [*Trail Smelter II*].

<sup>13</sup> Alexandre Kiss & Dinah Shelton, *International Environmental Law* (Ardsey-on-Hudson, NY: Transnational Publishers, 1991) at 107.

<sup>14</sup> Edith Brown Weiss, *International Environmental Law and Policy*, 2nd ed. (Gaithersburg, NY: Aspen Law & Business, 2007) at 268.

the cause is of serious consequence and the injury is established by clear and convincing evidence.<sup>15</sup>

The legal principle established in the Trail Smelter arbitration has since been incorporated into the United Nations Conference on the Human Environment, *Stockholm Declaration* of 1972,<sup>16</sup> the United Nations Conference on Environment and Development, *Rio Declaration* of 1992,<sup>17</sup> and in section 601(1) of the *Restatement (Third) of the Foreign Relations Law of the United States*.<sup>18</sup>

Canada and the United States have also led the way in incorporating citizen participation into transboundary environmental protection and governance.<sup>19</sup> Since the 1970's, the second generation (after the *Boundary Waters Treaty*) of environmental agreements between the United States and Canada demonstrate a dramatic growth in the role of citizens in achieving compliance with international environmental law. The *Great Lakes Water Quality Agreement*,<sup>20</sup> the *Air Quality Agreement*,<sup>21</sup> and the *North American*

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<sup>15</sup> *Trail Smelter II*, *supra* note 12 at 1965; "Trail Smelter Arbitral Tribunal Decision" (1941) 35 Am. J. Int'l L. 684 at 716.

<sup>16</sup> *Declaration of the United Nations Conference on the Human Environment*, UNCHE, 1972, U.N. Doc. A/CONF.48/14/Rev.1/Chapt.1; 11 I.L.M. 1416, 1420 (1972) online: UNEP <<http://www.unep.org/Documents.Multilingual/Default.asp?DocumentID=97&ArticleID=1503>> [*Stockholm Declaration*] ("Principle 21. States have, in accordance with the Charter of the United Nations and the principles of international law, the sovereign right to exploit their own resources pursuant to their own environmental policies, and the responsibility to ensure that activities within their jurisdiction or control do not cause damage to the environment of other States or of areas beyond the limits of national jurisdiction.").

<sup>17</sup> *Rio Declaration on Environment and Development*, UNCED, 47<sup>th</sup> Sess., U.N. Doc. A/CONF.151/26/Rev.1 (Principle 2); "United Nations Conference on Environment and Development: Rio Declaration on Environment and Development" (1992), 31 I.L.M. 874 at 876 [*Rio Declaration*].

<sup>18</sup> § 601(1) (West 1987) ("A state is obligated to take such measures as may be necessary, to the extent practicable under the circumstances, to ensure that activities within its jurisdiction or control . . . are conducted so as not to cause significant injury to the environment of another state or of areas beyond the limits of national jurisdiction.").

<sup>19</sup> See generally Noah D. Hall, "The Evolving Role of Citizens in United States-Canadian International Environmental Law Compliance" (2007) 24 Pace Envtl. L. Rev. 131.

<sup>20</sup> *Agreement Between Canada and the United States of America on Great Lakes Water Quality*, 15 April 1972, 23.1 U.S.T. 301, Can. T.S. 1972 No. 12; *Agreement Between Canada and the United States of America on Great Lakes Water Quality*, 1978, 22 November 1978, 30 U.S.T. 1384, Can. T.S. 1978 No. 20; *Protocol amending the 1978 Agreement between the Government of Canada and the Government of the United States of America on Great Lakes*

*Agreement on Environmental Cooperation*<sup>22</sup> rely heavily on citizens to ensure compliance and implicitly recognize that the two federal governments may have more in common with each other than with citizens and other stakeholders on both sides of the border when it comes to environmental protection and harm.

Against this backdrop of a long and successful history of bilateral approaches to resolving international transboundary pollution problems and a tremendously important U.S. – Canadian relationship, a new trend is emerging of using domestic litigation to resolve controversial transboundary pollution disputes.<sup>23</sup> In cases involving interbasin water transfers and potential introduction of aquatic invasive species (*Manitoba v. Norton*<sup>24</sup>) and retroactive liability for cleaning up toxic water pollution (*Pakootas v. Teck Cominco Metals, Ltd.*<sup>25</sup>), American courts are proving to be willing and able arbiters of transboundary pollution disputes. The trend has recently spread north of the border, as a Canadian citizen has brought a public prosecution against an American power company for mercury pollution harming Canadian fisheries in an Ontario court.

In contrast to the growing trend of domestic litigation against transboundary pollution, Canadian provinces and American states have recently finished the successful negotiation and passage of a landmark cooperative agreement to protect Great Lakes water. After a decade of discussion, negotiation, drafting, and legislative deliberation, the *Great Lakes-St. Lawrence River Basin Water Resources Compact*<sup>26</sup> has been approved by the United States Congress and signed by the President. The federal approval came after all eight Great Lakes states (Minnesota, Wisconsin, Michigan,

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*Water Quality, as amended on October 16, 1983*, 18 November 1987, T.I.A.S. No. 11551, Can. T.S. 1987 No. 32 [*Great Lakes Water Quality Agreement*].

<sup>21</sup> *Agreement Between The Government of the United States of America and the Government of Canada on Air Quality*, 13 March 1991, Can. T.S. 1991 No. 3, 30 I.L.M. 676 [*Air Quality Agreement*].

<sup>22</sup> *North American Agreement on Environmental Cooperation Between The Government of the United States of America, The Government of Canada and the Government of the United Mexican States*, 8 September 1993, 32 I.L.M. 1480 [*North American Agreement on Environmental Cooperation*] (opened for signature Sept. 8, 1993).

<sup>23</sup> See generally Noah D. Hall, “Bilateral Breakdown: U.S.-Canada Pollution Disputes” (2006) 21 Nat. Resources & Env’t 18 (Summer 2006).

<sup>24</sup> *Manitoba v. Norton*, 398 F. Supp. 2d 41, 60 E.R.C. 1237 (D.D.C. 2005).

<sup>25</sup> *Pakootas v. Teck Cominco Metals, Ltd.*, 452 F.3d 1066, 62 E.R.C. 1705 (9th Cir. 2006).

<sup>26</sup> *Great Lakes-St. Lawrence River Basin Water Resources Compact*, Pub. L. No. 110-342, 122 Stat. 3739 (2008).

Illinois, Indiana, Ohio, Pennsylvania, and New York) ratified the compact in their respective legislatures. The Great Lakes compact implements a companion agreement with the Canadian provinces of Ontario and Quebec similarly titled the *Great Lakes-St. Lawrence River Basin Sustainable Water Resources Agreement*.<sup>27</sup> Under the Great Lakes compact and agreement, the world's largest freshwater resource will be protected and managed pursuant to minimum standards administered primarily under the authority of individual states and provinces. The Great Lakes compact and agreement prohibit most diversions of water out of the watershed. More significantly, they apply riparian water use rules and environmental protection standards to withdrawals for use within the watershed. Their standards represent numerous advances in the development of water use law in the region, including water conservation, return flow, prevention of environmental impacts, and uniform treatment for ground and surface water withdrawals.<sup>28</sup>

These recent successes in environmental protection and cooperation give reason for optimism that Canada and the United States can together address the greatest environmental challenge of our time – climate change. The two countries have much to lose from the impacts of climate change and much to gain from leading a global transformation from fossil fuels to clean energy. They have the resources, both natural and human, to develop new technologies based on wind, solar, and other renewable sources of energy. Most importantly, both countries have a strong tradition of environmental stewardship and an energized and engaged citizenry that will demand nothing short of success in meeting the challenge of climate change. Canada and the United States led the way in developing international environmental law in the twentieth century, and to solve the global problem of climate change, they must lead again in the twenty-first century.

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<sup>27</sup> *Great Lakes-St. Lawrence River Basin Sustainable Water Resources Agreement*, The States of Illinois, Indiana, Michigan, New York, Ohio, and Wisconsin, The Commonwealth of Pennsylvania, The Province of Ontario and The Government of Quebec, 13 December 2005, online: Council of Great Lakes Governors <[http://www.cglg.org/projects/water/docs/12-13-05/Great\\_Lakes-St\\_Lawrence\\_River\\_Basin\\_Sustainable\\_Water\\_Resources\\_Agreement.pdf](http://www.cglg.org/projects/water/docs/12-13-05/Great_Lakes-St_Lawrence_River_Basin_Sustainable_Water_Resources_Agreement.pdf)>

<sup>28</sup> See especially Noah D. Hall, "Toward A New Horizontal Federalism: Interstate Water Management in the Great Lakes Region" (2006) 77 U. Colo. L. Rev. 405 (Issue 2, Spring 2006).