INTERNATIONAL JOINT COMMISSION
UNITED STATES AND CANADA

Acting Chair Irene B. Brooks
Commissioner Allen I. Olson
U.S. Section, International Joint Commission of the U.S. and Canada
1250 23rd Street NW, Suite 100, Washington, DC 20440
202-736-9000

Testimony before the Subcommittee on Water Resources and Environment
U.S. House of Representatives Committee on Transportation and Infrastructure
January 23, 2008

Madame Chair Johnson, members of the Subcommittee, I am Irene Brooks, Acting Chair of the U.S. Section of the International Joint Commission (the Commission). I am very pleased to be here with my colleague, U.S. Commissioner Allen Olson. We are joined by our colleagues from Canada, the Right Honorable Herb Gray, Chair, and Dr. Jack Blaney, Commissioner. We commend the Subcommittee for its focused attention on the issue of Great Lakes water quality.

In both the United States and Canada, millions of people draw material and spiritual sustenance from the Great Lakes. Today, the Basin's residents want to know that their priceless lakes – both in their majesty and their mystery – will be there for future generations, just as they have been there for them. Of all the world's natural legacies, with what can we compare our Great Lakes?

Since the Commission was created by the Boundary Waters Treaty of 1909, we have provided advice to the governments of the U.S. and Canada regarding both water quality and water quantity issues along the boundary from coast to coast. As we approach our 100th anniversary, the Commission is pleased to note that we have successfully responded to nearly 60 requests for advice known as "references" from the governments. In our view, no current reference is more important than our ongoing responsibilities written into the U.S.-Canada Great Lakes Water Quality Agreement (the Agreement). In this capacity, we assist the governments in implementing the Agreement, alert them to emerging issues, and assess their progress as they work to "restore and maintain the chemical, physical and biological integrity of the waters of the Great Lakes Basin Ecosystem."[1]

[1] Great Lakes Water Quality Agreement of 1978, As Amended by Protocol Signed November 18, 1987, available at http://www.ijc.org/rel/agree/quality.html Reference to IJC is in Section VII.

Here is our latest assessment. Relative to the management of other world freshwater systems we have been good, but not exemplary, stewards of our lakes. The lakes today are less polluted than they were decades ago. But toxic, human, animal and industrial wastes, as well as pharmaceuticals and airborne substances, continue to pollute the lakes. Ongoing urban development, invasive species and climate change present additional challenges. The future of the Great Lakes is uncertain. That's why the Commissioner believes the time has come to make bold binational commitments and to accelerate actions to restore and protect the Great Lakes.

Today, we focus on four specific shortcomings:

- First, while progress toward cleaning up the Great Lakes has been significant in many areas, further gains are hampered by a lack of accountability, blurred lines of responsibility, lack of vigorous implementation and inadequate funding. Moreover, actions to address new threats such as invasive species are too slow and too scattered to be effective.

- Second, information needed to assess progress is often not available from governments to the Commission, and monitoring programs are underfunded, missing or inconsistent across the basin. Moreover, government reporting on Great Lakes water quality, as required by the Agreement, is inadequate and in some cases nonexistent.

- Third, the current Agreement does not provide for the players with the greatest interest in cleaning up the Great Lakes to be at the table. A broad range of stakeholders must be involved in decision-making, especially cities such as Chicago and Toronto, Native Americans and First Nations, among others.

- And fourth, the current Agreement is inadequate to meet present and growing challenges such as the effects of climate change, land use and factory farms and must be replaced with a new, action-oriented Agreement that commits to making meaningful and measurable progress, and that is signed by the President and Prime Minister and endorsed by the U.S. Congress and Canadian Parliament.

Our view is that to speed up the clean up, accountability is paramount. Responsibility for action must reside in the highest levels of both governments, with both countries making a bold commitment to specific, achievable goals and a set timetable to restore water quality in the Great Lakes so that fish are safe to eat, water is safe to drink and beaches are safe for swimming.

First signed in 1972, the Great Lakes Water Quality Agreement is the binational framework for protecting and restoring the world's largest and most precious freshwater resource. The 1972 Agreement gave priority to addressing point-source pollution from factories and sewage plants, and as a result, such pollution was dramatically reduced, at least initially. A new Agreement, signed in 1978, adopted the "ecosystem approach" and called for the virtual elimination of the discharge of any or all persistent toxic substances and the levels of many of those chemicals in birds and fish have declined substantially.

The Agreement was last revised in 1987 when the U.S. and Canada agreed to focus efforts on the restoration of water quality in the most contaminated local areas in the basin. Known as Areas of Concern (AOCs), these are 43 locations that fail to meet objectives of the Agreement where such failure has caused or is likely to cause impairment of beneficial uses. Ensuring drinkable water, swimmable beaches and fish that can be safely consumed are key goals associated with the 14 beneficial uses specifically listed in the Agreement[2]. While conditions have improved significantly in a number of AOCs, only three have been removed from the list – one in the U.S. and two in Canada—so that currently there remain 25 AOCs wholly within the U.S., five shared with Canada and 10 entirely within Canada.[3] In 2003, the Commission estimated the cost for known wastewater infrastructure and sediment remediation needs in U.S. AOCs at $7.4 billion. In this regard, the Commission notes the importance of increased funding provided by the U.S. Congress for the Great Lakes Legacy Act, which targets resources to speed up contaminated sediment removal in AOCs. With respect to Canadian AOCs, the Commission estimated costs of $1.9 billion Cdn.

For example, the extreme northwestern portion of Indiana, including about 13 miles of the Grand Calumet River, the Indiana Harbor Canal, and nearshore of Lake Michigan, comprises one of the most notable AOCs, the Grand Calumet River. All 14 beneficial uses are impaired in its surface waters and it is estimated that more than 16 million gallons of petroleum products are floating in groundwater within this AOC. Ninety percent of the river's flow originates as industrial or municipal effluent, cooling and process water and storm water discharges. Between five and 10 million cubic yards of contaminated sediment are present in that river system alone. Since two decades have passed since the two governments committed to cleaning up AOCs, this is hardly satisfactory.

Annex 2 of the Agreement directs the United States and Canada, working with state and provincial governments, to develop Remedial Action Plans (known as RAPs) and Lakewide Management Plans (LaMPs) to restore and protect ecosystem health in AOCs and to the open waters of the Great Lakes respectively. In the Grand Calumet River AOC, the U.S. Environmental Protection Agency, Great Lakes National Program Office and the Indiana Department of Environmental Management have shared responsibility for the development and implementation of a RAP for the Grand Calumet River AOC and a LaMP for the open waters of Lake Michigan. These plans are to embody a systematic and comprehensive ecosystem approach to restoring and protecting beneficial uses in AOCs and in open lake waters.

---

[2] Annex 2, Paragraph 1(c): "Impairment of beneficial use(s)" means a change in the chemical, physical or biological integrity of the Great Lakes System sufficient to cause any of the following: (i) restrictions on fish and wildlife consumption; (ii) tainting of fish and wildlife flavour; (iii) degradation of fish wildlife populations; (iv) fish tumors or other deformities; (v) bird or animal deformities or reproduction problems; (vi) degradation of benthos; (vii) restrictions on dredging activities; (viii) eutrophication or undesirable algae; (ix) restrictions on drinking water consumption, or taste and odour problems; (x) beach closings; (xi) degradation of aesthetics; (xii) added costs to agriculture or industry; (xiii) degradation of phytoplankton and zooplankton populations; and (xiv) loss of fish and wildlife habitat.

[3] In the Province of Ontario, Collingwood Harbour AOC was delisted in 1994 and Severn Sound AOC was delisted in 2003. The Oswego River AOC, in the State of New York, was delisted in 2006. Two AOCs are deemed to be Areas in Recovery: Spanish Harbour in Ontario and Presque Isle Bay in Pennsylvania.

Importantly, the implementation of these plans would be a significant step toward achieving Agreement goals of virtual elimination of persistent toxic substances and toward restoring and maintaining the chemical, physical and biological integrity of the Great Lakes Basin Ecosystem.

Reporting required under other programs also has not been acceptable. The Great Lakes Critical Programs Act of 1990 provided a January 1, 1993 deadline for the Administrator of U.S. EPA, in consultation with the Great Lakes National Program Office, to submit the Lake Michigan LaMP to the Commission. To date, no document has been formally submitted to the Commission for its review. Concerned by the lack of required formal reporting for the Lake Michigan and other LaMPs, the Commission has launched an assessment of the governments' progress toward achieving LaMP goals. This report will be completed later this year.

The Agreement [Annex 2, Paragraph 7(b)] also requires the federal governments to report every two years to the Commission on progress toward restoration of beneficial uses in AOCs. Since 1987, only one comprehensive binational report on the status of beneficial uses has been submitted, and that was in 1994. Concerned by the lack of reports, in 2001 the Commission began a comprehensive review of progress in developing and implementing RAPs for the AOCs. By January 2002, the governments provided some data, noting that much of the requested information was not in their control and not readily available. We would also note that, for the most part, monitoring required by the Agreement is not happening.

In its 2003 special report[4] to governments "The Status of Restoration Activities in the Great Lakes Areas of Concern", the Commission noted that at least three U.S. AOCs—the Kalamazoo River, the Grand Calumet River, and the Lower Green Bay/Fox River—remain severely contaminated and are releasing significant amounts of polychlorinated biphenyls (PCBs) and other persistent toxic substances to the open waters of Lake Michigan. The Commission urged that clean up of these sites should be a priority.

The 2003 report also recommended that the two federal governments should meet their responsibility to report formally, on a biennial basis, on the degree to which each impaired beneficial use in each AOC has been restored, as required by Annex 2 of the Agreement. Still, four years later, no report has been received. In addition, the Commission recommended that governments should report to the Commission and the public on their rationale for determining priorities for remedial measures and identify those priorities within and among the AOCs. To date, the Commission is unaware of any such report.

Most importantly, the Commission is concerned that progress to date is threatened by lack of vigorous implementation and funding to address old threats compounded by the inability to address new ones. The U.S.-Canada Great Lakes Water Quality Agreement has not been revised since 1987, and as a result, the inspiration and vision it once provided has been diminished. The core purpose of the Agreement remains sound, but what was once thought to be sufficient to restore water quality and protect vulnerable humans, fish and wildlife no longer works.

---

[4] Available at http://www.ijc.org/php/publications/html/aoc_rep/english/report/index.html.

Science has advanced and ecosystem stressors such as climate change and invasive species are now widely recognized as real and growing threats to the Great Lakes ecosystem. For example, it appears that invasive zebra and quagga mussels have effectively reengineered physical and chemical processes in the nearshore area, promoting eutrophication and degrading water quality. Algae mats, closed beaches, and dead birds in nearshore areas of the Great Lakes signal the need for action. Indeed, the lack of adequate monitoring and failure to implement needed compliance programs for facilities that discharge to the lakes, combined with inadequate tools to address new challenges, has resulted in nearshore water quality problems that are serious in most areas of the Great Lakes.

Recently, the Commission held an expert consultation to address these growing nearshore concerns. Based on the advice of more than 50 experts, we make the following recommendations for binational action to improve nearshore areas of the Great Lakes:

- First, urban and agricultural nonpoint sources of pollution are key contributors to the continued excessive loadings of phosphorus to nearshore waters and must be reduced.

- Second, nutrient-control programs, as outlined in Annexes 3 and 13 of the Agreement, need to be funded and implemented.

- Third, most programs to monitor Great Lakes phosphorus loadings were terminated fifteen years ago because their objectives were met. The problem has returned, and this monitoring needs to be reinstated.

- And fourth, critical research must be funded to improve our understanding of the science and linkages between land sources of pollutants and the waters in the nearshore and offshore.

These recommendations regarding the nearshore builds on the comments we provided to the governments as they began the review process. In our "Advice to Governments on Their Review of the Great Lakes Water Quality Agreement" (August, 2006)[5], the Commission recommended that the governments take the opportunity of their 2007 review of the Agreement to replace it with a shorter, more action- oriented document. This new Agreement should be signed by the President and Prime Minister and endorsed by the U.S. Congress and Canadian Parliament, raising accountability to the highest levels of government.

The 2006 report focused on new institutional arrangements to improve accountability in binational Agreement implementation. For example, the Commission recommends the creation of a Binational Steering Committee that would bring together the Great Lakes Task Force created by President Bush's 2005 Executive Order with their Canadian counterparts. Reporting to that high-level political committee would be a new coordinating body of federal, state, provincial, municipal, tribal and other representatives responsible for administering the programs designed to achieve the goals of the Agreement

[5] Available at http://www.ijc.org/php/publications/pdf/ID1603.pdf

The Commission recognizes that much of the work required to implement the Agreement is carried out under domestic authorities in the two countries. Therefore, the 2006 report recommended that the new coordinating body develop a Binational Action Plan that would specify the actions to be taken and by whom, commit to timelines for implementation, include a broader array of signatory partners and provide for regular review, reporting and updating. The plan would also make provision for effective monitoring and surveillance as well as regular progress reports to the Commission and the public along with regular oversight hearings by federal legislative committees. Indeed, hearings such as this one should be held on a regular basis so that program managers can be held accountable and ineffective programs can be retooled with a focus on results.

The need for improving accountability in implementing the Great Lakes Water Quality Agreement was further articulated by the Commission in its "13th Biennial Report on Great Lakes Water Quality" (December, 2006).[6] The Commission recommended that the two federal governments create and apply in the context of the Agreement a strong accountability framework for the protection and restoration of the Great Lakes. We are pleased to report that the governments have responded to our recommendation and have agreed to work with the Commission, starting this spring, on the process for developing such an accountability framework.

However, governments are advised not to delay taking action until there is a new or revised Agreement, though we urge the governments to negotiate and sign a new Agreement as soon as possible. In the meantime, we recommend that all orders of government take positive steps to focus increased attention and resources on water quality issues in the nearshore, especially those highlighted in this presentation. We also remind governments of the need to meet our current obligations under the 1987 Great Lakes Water Quality Agreement, and urge Congress to provide adequate funding and vigorous oversight of existing programs to assess, monitor, and restore the Great Lakes.

While some see the Great Lakes as marking the boundary that divides our countries, we see them as the lifeblood connecting us. Indeed, pollution knows no boundaries, so action to clean up the Great Lakes and keep them clean must be uncommonly strong, binational and immediate. Ultimately, accountability will only be achieved to the extent that the national governments of the United States and Canada take action. And we are here today to tell you that the International Joint Commission is ready to help you act with urgency, vision and focus to get the job done. Thank you.

---

[6] Available at http://www.ijc.org/php/publications/pdf/ID1601.pdf