Great Lakes
St. Lawrence Seaway Study

communiqué

May 2004
Volume 1, Issue 1

Étude des Grands Lacs et de la
Voie maritime du Saint-Laurent

Great Lakes St. Lawrence Seaway Study enters busy phase

One year after the U.S. and Canada agreed to jointly conduct a comprehensive study of the Great Lakes/St. Lawrence Seaway system, three specialized project teams are well along on their respective tasks, and stakeholders will soon get the opportunity for input at a series of stakeholder engagement sessions (see page 7) early this summer.

It was on May 1, 2003 that Transport Canada and the U.S. Department of Transportation (DOT) signed a Memorandum of Cooperation to evaluate the future needs of the Great Lakes/Seaway system as it is currently configured.

A binational steering committee was seated with participation of seven Canadian and U.S. federal agencies: Transport Canada; the U.S. Department of Transportation; the Saint Lawrence Seaway Development Corp., an agency within DOT that operates the two U.S. Seaway locks; the St. Lawrence Seaway Management Corp., responsible for the management, operation and maintenance of the 13 Seaway locks owned by the Government of Canada; the U.S. Army Corps of Engineers; Environment Canada and the U.S. Fish & Wildlife Service.

Core research and analysis for the study is being carried out by three binational, multidisciplinary teams assigned to assess, respectively, the engineering, economic and environmental factors associated with current and future needs of the system as it is currently configured. Co-managers of the study are Wayne Schloop, P.E., of the civil engineering staff of the Detroit District Office of the U.S. Army Corps of Engineers, and Marc Fortin, Director of Seaway and Domestic Shipping Policy for Transport Canada in Ottawa.

As the GLSLS Study aims to project the system's needs for the next 50 years, 2004 marks the 50th anniversary of the start of construction of the St. Lawrence Seaway in 1954. When the Seaway was completed in 1959, it created a 2,400-mile/3,700km deepwater navigation route from the Gulf of St. Lawrence to the head of the Great Lakes which has since handled some 2.3 billion metric tons of cargo.

In its mandate, the binational Memo of Cooperation noted that the Great Lakes/Seaway system "is unique for the scale and sophistication of its market, and the extensive integration of its economy..." Indeed, the system serves 15 major international ports and over 50 regional ports in both Canada and the U.S., handling about 200 million tons annually.

The Memo pledged, among other things, to enhance the U.S. and Canada's "collaboration and cooperation to ensure the continued viability of the Great Lakes/St. Lawrence Seaway as a safe, reliable and efficient component of the North American transportation infrastructure."

communiqué information

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Steering Committee
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Next Steps

- Bi-national web site launched: May 2004
- Stakeholder meetings: June and July, 2004 (see page 7)

Webpage

Get the latest information about the Great Lakes St. Lawrence Seaway Study at:
www.glsls-study.com

Steering Committee represents full range of U.S. and Canadian federal interests, including environmental issues

In forming a Steering Committee for the Great Lakes St. Lawrence Seaway Study, the U.S. and Canadian federal governments made clear statements about their approaches to the project.

Five seats on the Committee were obvious ones: Transport Canada, the U.S. Department of Transportation, the U.S. Saint Lawrence Seaway Development Corp. the Canadian St. Lawrence Seaway Management Corp., and the U.S. Army Corps of Engineers. Two additional seats were added, however, reflecting Canada's and the U.S.'s acute interest in the environmental impacts of the Great Lakes/Seaway system, as well as its economic benefits. Those seats are held by Environment Canada and the U.S. Fish and Wildlife Service.

National Park Service, Indiana Dunes National Lakeshore

"We look forward to working with the Corps and Transport Canada on analyzing a full range of environmental issues associated with transportation on the Great Lakes,' said Craig Czarnecki, Michigan Field Supervisor for the U.S. Fish and Wildlife Service. "Aquatic nuisance species, fish and wildlife habitats, and contaminants are just a few areas that need our combined energies as we seek to characterize today's system."

Within Environment Canada, two regional offices are engaged in the GLSLS Study, the Ontario Region as the study applies to Great Lakes issues, and the Quebec Region in St. Lawrence River issue areas.

Said Jacinthe Leclerc of Environment Canada's Quebec Region, "We have expertise and have done many studies on the St. Lawrence River, mainly on the biodiversity of the St. Lawrence, and the physical aspects of the river. We have people from the meteorological service, and hydrology. Those are the people who will very likely be involved the most. We also have biologists here who could help supporting Transport Canada identifying and addressing the resources of the St. Lawrence."

The Environmental Team, one of the three project delivery teams for the study, has been assigned to establish base line data, indicate critical issues and trends and identify data gaps for the environmental component of the GLSLS Study. It is working closely with the two other teams, economics and engineering, and stakeholders to identify the issues most relevant to the study's mandate.

"The GLSLS Study is truly a team effort," said Lt. Col. Thomas Magness of the Corps of Engineers' Detroit District office. "The partnership between agencies and organizations in both Canada and the U.S. will ensure that diverse interests are thoroughly represented in pursuit of environmentally sustainable solutions for the Great Lakes region."

Methodology and the role of modeling

The following report by the Economics Team of the Great Lakes St. Lawrence Seaway Study demonstrates the complexities of the issues being studied, and how modeling is a key element of the project's methodology.

Representing the Great Lakes/St. Lawrence Seaway (GLSLS) navigation system with an economic model is a challenging enterprise. The bi-national study seeks to overcome these hurdles by recognizing that Transport Canada, the U.S. Army Corps of Engineers (USACE), the St. Lawrence Seaway Management Corporation (SLSMC), and the U.S. Department of Transportation's Saint Lawrence Seaway Development Corporation (SLSDC) and Maritime Administration's (MARAD) concerns, objectives, and requirements, though not identical, exhibit considerable and important areas of overlap.

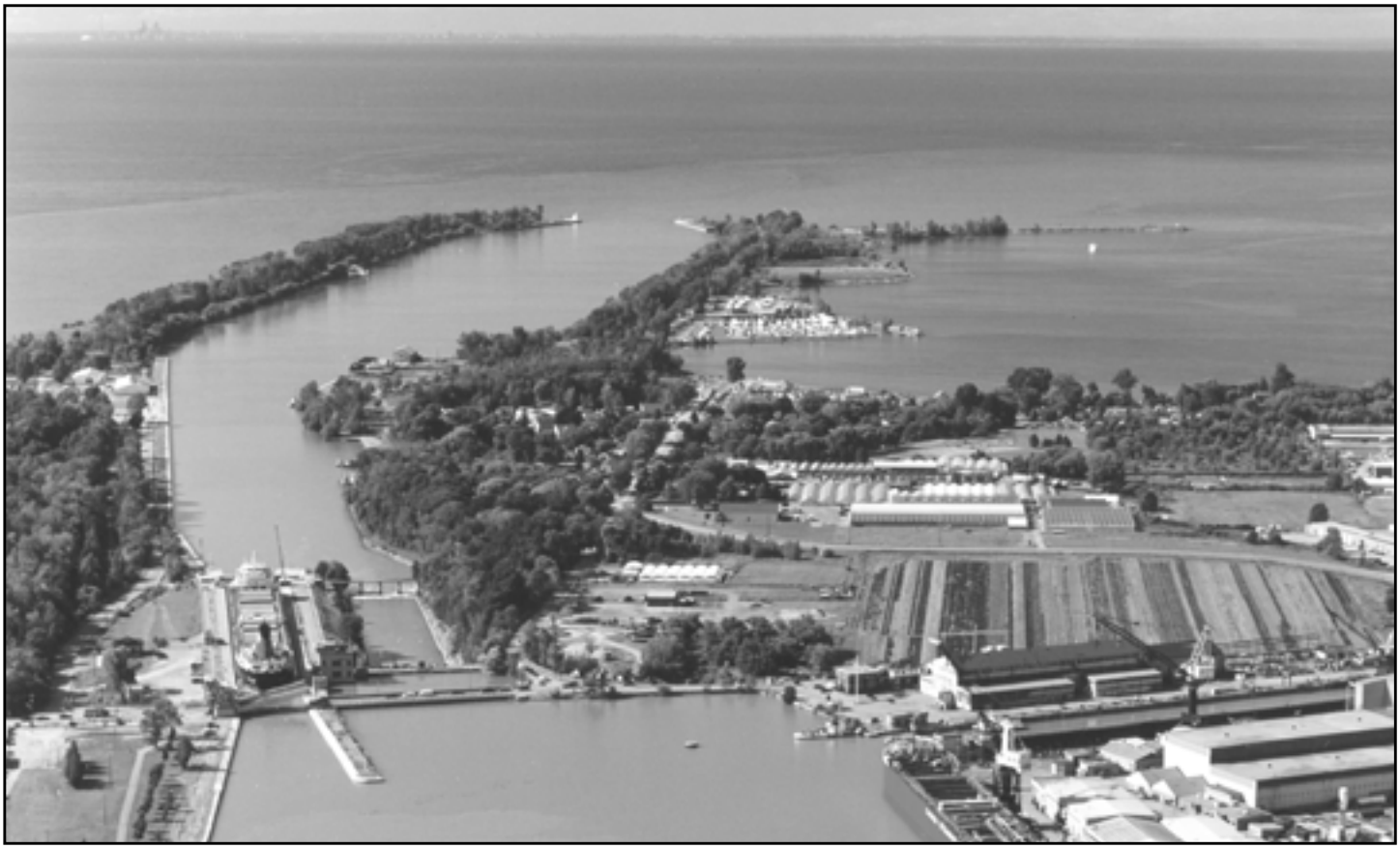
In the case of the Economics Team, uncovering these areas came through serious discussions and information gathering that took place over the course of the last nine months. It was determined that a coordinated study effort would work to the advantage of all, and an agreement was reached to jointly develop the data sets and models required to evaluate the comparative effectiveness of both alternative policies and alternative maintenance plans for the GLSLS.

This is important in that Transport Canada requires a policy analysis, while the USACE requires project-level analysis. Reaching a general consensus on the conceptual framework for the model, the data it requires, and the outputs it will produce were a significant accomplishment, and Transport Canada already has contractors building a key module.

The principal questions to be addressed by the Economic Policy Analysis Model is as follows:

What are the costs and the implications for efficiency, effectiveness and economy of alternative strategies for infrastructure investment in the Great Lakes and the St. Lawrence Seaway? Specifically, what impact will alternative investment strategies have on: vessel operating costs; costs incurred by shippers in terms of rates and reliability; highway congestion and attendant problems (delay, accidents and so on); air quality and greenhouse gas emissions; competitiveness of the domestic marine industry; and employment.

The analysis will also explore how the effects described above would be distributed between Canada and the U.S., among different regions, different transportation corridors and different industries.



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U.S. Army Corps of Engineers is part of the team tackling waterway system challenges

Lt. Col. Thomas Magness
District Engineer, Detroit
U.S. Army Corps of Engineers

The U.S. Army Corps of Engineers is a proud member of the team that helps to manage the waterway system that includes the Great Lakes and the St. Lawrence Seaway. Key to a sustainable future are programs to examine the future of the waterway system while developing and assessing cost effective, environmentally beneficial, current practices that meet the needs of the

continued on page 5

Great Lakes/Seaway traffic gaining momentum this season

The 2004 navigation season on the Great Lakes/St. Lawrence Seaway system has gotten off to a fast start, with both the U.S. and Canadian interlake trades and the international Seaway traffic running ahead of 2003 levels.

In fact, responding to continued strong demand for iron ore and other cargos, the U.S.-flag Great Lakes fleet moved 3.3 million net tons of cargo in March, more than triple the volume of a year ago, according to the Lake Carriers' Association (LCA). This represented an increase of nearly 35 percent over the month's 5-year average, and for the year, the U.S. carriage of 8 million net tons was an increase of 46 percent compared to the 5-year average for the January-March time-frame.

An upturn in the North American economy, and in the steel sector in particular, are being cited for a rebound in Great Lakes/Seaway marine trade that began to emerge in mid-2003.

"Great Lakes shipping has had a tough couple of years with the steel industry struggling, a lot of restructuring and a weak economy. Everything turned around the second half of last year," said Wayne Smith, vice president of the Canadian pooled fleet Seaway Marine Transport based in St. Catharines, Ontario, in a Great Lakes/Seaway Review report.

Total tonnage on the Seaway has averaged about 41 million metric tons the past two years, but St. Lawrence Seaway Management Corp. (SLSMC) President and CEO Richard Corfe is looking for an increase this season in the 5 to 10 percent range, which could boost traffic volume up to the 45 million ton mark.

LCA Communications Vice President Glen Nekvasil, speaking about the U.S. dry bulk commerce on the Great Lakes, told Great Lakes/Seaway Review, "The rally at the end of the year came much, much too late to have an impact on cargo totals for 2003, but at least the momentum is moving in the right direction. We're hoping the upturn in steel production is the beginning of a revival."

Both the Seaway and the Soo Locks opened for navigation March 25 following a busy winter maintenance season. This year's winter works program for the SLSMC was particularly substantial, amounting to C$7.8 million in the Montreal/Lake Ontario section and C$16.2 million on the Welland Canal. Work included improvements to bridges, locks, communications and power facilities, roads, weirs, and walls.

continued from page 4

citizens and stakeholders in the United States and Canada. Like the rest of our teammates, we understand the need to balance economic vitality and human activity with the mandate of environmental sustainability. Sustaining our waterway system, however, will require the identification of "Win/Win solutions" - those that possess both economic and environmental benefits.

Ensuring the continued viability of the waterway with such a mandate entails resolutely seeking win/win opportunities from a slate of issues and priorities typically thought of as incompatible. Some example pairings of "either/or" issues facing stewards of the waterway include: maintaining an aging infrastructure while curtailing invasive species; maintaining safe navigation channels while containing or removing contaminated sediments; addressing port capacities while restoring wetlands; and providing a competitive shipping environment while avoiding dramatic water level fluctuations. We need to take a holistic look at the waterway system, develop a shared vision for its future, and take decisive steps in that direction.

Initial steps are already being taken. President Bush's administration demonstrated its commitment to the sustainable future of this international waterway by including funding for the Great Lakes St. Lawrence Seaway Study in the 2005 Corps of Engineers budget. The United States and Canada signed a memorandum of cooperation pledging the adoption of a bi-national approach toward assessing the waterway's current and future needs. The Corps of Engineers and Transport Canada are now 12 months into an assessment of the waterway's baseline physical, environmental, and economic condition. A team of experts from the Corps of Engineers, Transport Canada, US Fish and Wildlife Service, Environment Canada, and the U.S. and Canadian Seaway authorities are collecting data for a definitive understanding of the waterway's current conditions, enabling the US and Canada to objectively evaluate benefits and costs of future scenarios.

Notwithstanding suggestions from some that we've finished learning about the complexities of the waterway and should close the door on any further examinations, the truth is we've got a long way to go. "Mining" of existing engineering, economic, and environmental information must come from all interested parties. The waterway's stakeholders, especially those in environmental, navigation, and related maritime industries, must commit to serving as part of the study team. This participation must include a commitment to meet and communicate periodically to help shape the study's direction and, ultimately, its outcomes.

"Like the rest of our teammates, we understand the need to balance economic vitality and human activity with the mandate of environmental sustainability."

A deliberate and balanced collaboration of partners and stakeholders must determine: (1) if the current navigation system is maintained at an appropriate level to meet the needs of a growing economy; (2) if the Great Lakes navigation system is part of the regional / national / international transportation mix; (3) if there are technological solutions to help manage sediments in navigation channels in a more cost competitive yet environmentally responsible way; (4) if maritime commerce is the most environmentally sustainable and cost effective means of moving bulk commerce within the region or if investments should be made elsewhere, even if outside the navigation system; and (5) if all regional and national stakeholders are communicating effectively to help generate possible solutions and informed decisions.

We must take a similar, balanced approach as we address the state of the current navigation system. The present situation—dredging challenges and deteriorating infrastructure in the system's ports, harbors, and connecting channels—challenges our region's ability to maintain a viable maritime commerce system. This fifth straight year of low water levels in the Great Lakes only increases the pressure to collaborate and seek mutually beneficial opportunities. We must find more cost-effective ways to manage dredged material on the Great Lakes than current practices – generally two to four times the national average. We must identify sediment disposal and treatment options that enhance our environment and improve our water quality for current and future generations. With some 200 million tons of commerce moved annually on the waterway system, these are critical issues with environmental and economic security implications.

The US Army Corps of Engineers clearly cannot answer all of the questions presented here without help from others. While the Great Lakes St. Lawrence Seaway Study examines the longer term issues, addressing these more immediate challenges must similarly be the result of deliberate, balanced collaboration among interested parties. With the many diverse waterway partners and stakeholders on both sides of the border, the U.S. Army Corps of Engineers is part of the team committed to addressing these challenges to insure a sustainable waterway system that meets the current and future needs of the region.

Onsite inspections are crucial to the engineering analysis

As part of the overall assessment of the Great Lakes and St. Lawrence Seaway (GLSLS) Study, a multi-agency, multi-national engineering team has conducted on-site inspections of the infrastructure associated with the GLSLS engineered system. Engineers from the St. Lawrence Seaway Development Corporation (SLSDC), St. Lawrence Seaway Management Corporation (SLSMC), Transport Canada (TC), and U.S. Army Corps of Engineers (USACE) were part of this team. The inspections represent a first key step in helping determine the overall condition of the system and its projected long-term performance.

The SLSDC projects (Snell and Eisenhower Locks), located at Massena, NY and the SLSMC Welland Canal locks at St. Catharines, Ontario were inspected during July 2003. The SLSMC Maisonneuve Region projects (Montreal, Quebec area) and USACE Soo Locks at Sault Ste Marie, MI were inspected during September 2003. Additional on-site inspections were done at specific projects to get a more detailed look at the structures when they were dewatered for scheduled maintenance, such as the damaged miter gates at the Eisenhower and Snell Locks and the aging infrastructure of the Welland Canal. These maintenance dewatering inspections were completed during the February/March 2004 timeframe.

The intent of the inspections was to give the overall engineering team a better understanding of the system, as well as to establish a comparative basis among the various projects in different stretches of the GLSLS system.

In addition to lock facilities, other infrastructure, such as bridges, tunnels, etc. associated with the GLSLS system were also inspected as part of this effort since they are critical to safe, efficient operation of the seaway and represent a significant amount of maintenance funding to keep in proper operating condition.

Detailed discussions regarding the infrastructure were held during the on-site inspections so the engineering team could take into account individual project personnel's perspective as it relates to the condition of the structures and their long-term performance. This information will provide insight into future maintenance requirements and projected performance of critical GLSLS structures. This information will be used to assist the multi-agency engineering team in analyzing the future reliability of the system as it ages.

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Broad stakeholder input will be solicited

Recognizing the importance of stakeholder involvement in the Great Lakes St. Lawrence Seaway Study, the study's Management Team has given high priority to a stakeholder engagement strategy that will solicit input from a broad range of regional interests.

Partnering as facilitators of the "stakeholder engagement" function are the Great Lakes Commission based in Ann Arbor, Michigan and the St. Lawrence Economic Development Council (SODES) of Quebec City. The two agencies have long worked together as co-secretariats of the International Association of Great Lakes and St. Lawrence Mayors and represent a combined 68 years of involvement in Great Lakes/St. Lawrence issues.

"The Management Team believes that these two entities working together in a manner similar to their existing partnership will provide an effective mechanism to solicit stakeholder feedback," said Marc Fortin, Director of Seaway and Domestic Shipping Policy for Transport Canada and co-project manager for the study.

The broad mandates to the stakeholder consultation team are to:

- Solicit stakeholders' knowledge and expertise, especially as relates to marine transport in the Great Lakes/St. Lawrence system.
- Consult the public on the study's process, content, objectives, and milestones.
- Provide ample opportunity for input from all Great Lakes/St. Lawrence interest sectors.

Among stakeholder groups being invited to participate are the U.S. and Canadian marine transport community and the industries it serves; states, provinces and local governments; First Nations and tribes; environmental stewardship organizations; universities and research entities; and economic development agencies.

The core of the consultation process will be a series of meetings to be held at a variety of locations in Canada and the U.S. early this summer (see right).

The stakeholder engagement schedule is being expedited so there is sufficient time for stakeholder input to be processed by the study's three delivery teams, environment, economics and engineering, as they develop their final products. A "front-loaded" consultation process will also allow delivery teams time to follow up with certain stakeholder groups for additional information if necessary.

In addition to the information sessions, stakeholders will be able to submit written briefs to the stakeholder facilitators through August 1.

Stakeholder Engagement Meetings

June 3, 2004
Montreal, Quebec
Holiday Inn Montreal Midtown

June 8, 2004
St. Catharines, Ontario
Quality Hotel Parkway
Convention Centre

June 15, 2004
Duluth, Minnesota
U.S. EPA Conference Center

July 6, 2004
Clayton, New York
Clayton Opera House

July 14, 2004
Chicago, Illinois
Union League Club

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Memorandum of Cooperation between the Department of Transport in Canada and the Department of Transportation in the United States

Whereas the Department of Transport of Canada and the Department of Transportation of the United States of America, hereafter referred to as "the Participants",

Desire to enhance collaboration and cooperation on transportation matters of mutual interest including the need for more frequent high-level communication regarding policy research;

And whereas the Participants recognize that the Great Lakes/St. Lawrence Seaway system represents a bi-national transportation network linking the industrial heartland of North America to international markets across the globe;

And whereas the Great Lakes/St. Lawrence Seaway system in unique for the scale and sophistication of its market, and the extensive integration of its economy, serving 15 major international ports and some 50 regional ports on both sides of the Canada/U.S. border;

And whereas the Great Lakes/St. Lawrence Seaway system has a significant impact on the North American economy, handling more than 200 million tons of cargo each year, contributing upwards of $6 billion annually and supporting roughly 65,000 jobs in both Canada and the United States;

The Participants intend to enhance collaboration and cooperation to:

- Ensure the continued viability of the Great Lakes/St. Lawrence Seaway as a safe, reliable and efficient component of the North American transportation infrastructure;
- Identify factors and trends affecting the domestic and international marine transportation industries serving the Great Lakes/St. Lawrence Seaway, including evolving intermodal linkages and transportation technologies;
- Assess the engineering, economic and environmental factors associated with the current and future needs of the Great Lakes/St. Lawrence Seaway and the transportation infrastructure on which it depends; and
- Evaluate the reliability and condition of the Great Lakes/St. Lawrence Seaway, including the relative benefits and costs of continuing to maintain the existing transportation infrastructure.

This Memorandum of Cooperation is not meant to affect the rights and obligations of the Participants under their domestic legislation or any international agreement.

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